# ACR 2020
(PARIS) OCT 1-4

FIRST EVER VIRTUAL CONFERENCE

ASSOCIATION FOR CONSUMER RESEARCH

Jen Argo, Hope Schau & Tina M. Lowrey

ADVANCES IN CONSUMER RESEARCH

VOLUME XLVIII

ACR 2020 (PARIS) OCT 1-4

FIRST EVER VIRTUAL CONFERENCE

ASSOCIATION FOR CONSUMER RESEARCH

Volume XLVIII
PROCEEDINGS

Editors

Jennifer Argo

Tina M. Lowrey

Hope Jensen Schau

Advances in Consumer Research, Volume 48

Jennifer Argo, Tina M. Lowrey, Hope Jensen Schau

Preface

Jennifer Argo
University of Alberta

Tina M. Lowrey
HEC Paris

Hope Schau
University of Arizona

The 51st Annual Conference of the Association for Consumer Research (ACR) was held October 1-4, 2020 NOT in Paris, France, as originally planned, but virtually, using several platforms available to the ACR Community. This conference marked ACR's 1st-ever virtual conference, and continued the community's tradition of welcoming interdisciplinary, cross-method, international scholars sharing knowledge of consumer behavior.

Our conference theme was "Rendez-Vous in the City of Light." This theme was inspired in part by the fact that Paris, The City of Light, is known as a place embracing the values of Enlightenment, the age of reason, deep thinking, and rational thought. Together with the term "rendez-vous" which translates to "appointment" in English, our hope was that ACR 2020 would be an opportunity for scholars with different methodological approaches, paradigm perspectives, and research interests to come together to focus on consumer research related questions. Then COVID-19 hit, derailing our original plan to rendezvous in Paris; instead, the rendezvous transpired online via a conference platform and Zoom. Despite the change in venue and a move from the traditional conference approach with which we are all familiar, we believe that perhaps our theme was BETTER suited for a virtual conference. Enlightenment was achieved through the Fellows' Addresses (by David Mick and Marsha Richins), the Presidential Address (by Eileen Fischer), a pre-conference on Diversity, Equality & Inclusion, the Sheth doctoral consortium, early career workshops, the Film Festival, Knowledge Forums, competitive paper presentations, special sessions, and working paper posters. The ability to offer customizable agendas and access to all of the conference material weeks beyond the conference dates further facilitated thinking and sharing ideas. Breakout rooms in Zoom were widely used to rendezvous during Knowledge Forums and entertaining receptions spanning the globe.

The conference attracted over 1,700 participants from 41 different countries. We received 1,422 total submissions and accepted 759, which represents a 53% acceptance rate. This year's conference presented 329 competitive papers (45% acceptance rate), 65 Special Sessions (65% acceptance rate), 343 working papers (62% acceptance rate), 11 Knowledge Forums (43% acceptance rate) and 13 films (76% acceptance rate). We thank our generous sponsors: The Sheth Foundation, the Society for Consumer Psychology, the Journal of Consumer Research, and the University of Chicago Press.

So many incredible members of the ACR Community helped us make this novel conference format a success. We especially wish to thank Melissa Archpru Akaka, Joey Hoegg, and Sonia Monga (Working Paper co-chairs), Caleb Warren and Michelle Weinberger (Knowledge Forum co-chairs), Joonas Roka and Ekant Veer (Film Festival co-chairs), Brent McFerran and Karen Winterich (Early Career Workshop co-chairs), Lisa Cavanaugh and Andrea Morales (Sheth doctoral consortium co-chairs), and Raji Srinivasan and Carolyn Yoon (DEI pre-conference co-chairs). Thanks to Marie Taillard for her willingness to serve as our Special Local Arrangements Co-Chair (we, together with Marie, had selected an incredible venue for our Saturday gala in Paris, alas…). Many thanks go to our excellent Associate Editors: Simona Botti, Susan Broniarczyk, Robin Canniford, June Cotte, Kristina Durante, Colleen Harneling, Yuwei Jiang, Sarah Moore, Al Muniz, Joe Nunes, Hilke Plassman, Derek Rucker, Cristel Russell, Daiane Scaraboto, Jaideep Sengupta, Bram van den Bergh, Ela Veresiu, Henry Weijo, and Kate White. We thank our Program Committee, Competitive Paper Reviewers, and Working Paper Reviewers. Finally, thank you to our reception hosts for providing attendees a much needed opportunity to socialize with others while having some fun: Simona Botti, Giana Eckhardt, Stefano Puntoni, and Martin Schreier (Europe); Darren Dahl, Rich Lutz, and Linda Price (North/South America); Christina Anthony, Robin Canniford, Elizabeth Cowley, and Anirban Mukhopadhyay (Asia/Pacific).

Special gratitude goes to ACR Executive Director Rajiv Vaidyanathan, our Conference Planner Paula Rigling, the ACR Executive Assistant Brenda Monahan, and our graphics designer Roy Wiemann.

Finally, an extra special thanks to Eileen Fischer, ACR President 2020, for honoring and entrusting us with the responsibility of organizing ACR 2020, and for her undying enthusiasm, flexibility, and incredible support. It has been a long, strange journey, but a wonderful one for the three of us working with such amazing people from the ACR community! Thank you.

Jen Argo, University of Alberta, Canada
Tina M. Lowrey, HEC Paris, France
Hope Schau, University of Arizona, USA

2020 Conference Co-Chairs

Conference Committees & Reviewers

PRESIDENT

Eileen Fischer, York University, Canada

CONFERENCE CHAIRS

Jennifer Argo, University of Alberta, Canada
Tina M. Lowrey, HEC Paris, France
Hope Jensen Schau, University of Arizona, USA

ASSOCIATE EDITORS

Simona Botti, London Business School, UK
Susan Broniarczyk, University of Texas at Austin, USA
Robin Canniford, University of Melbourne, Australia
June Cotte, Ivey Business School, Canada
Kristina Durante, Rutgers University, USA
Bikram P Ghosh, University of Arizona, USA

Colleen M. Harmeling, Florida State University, USA
Yuwei Jiang, Hong Kong Polytechic University, China
Sarah G Moore, University of Alberta, Canada
Joseph Nunes, University of Southern California, USA
Hilke Plassmann, INSEAD, France
Derek Rucker, Northwestern University, USA

Cristel Russell, Pepperdine University, USA
Daiane Scaraboto, University of Melbourne, Australia
Bram Van den Bergh, Erasmus University Rotterdam, The Netherlands
Ela Veresiu, York University, Canada
Henri Weijo, Aalto University, Finland
Katherine White, University of British Columbia, Canada

WORKING PAPER CHAIRS

Melissa Akaka, University of Denver, USA   JoAndrea Hoegg, University of British Columbia, Canada   Sonia Monga, Rutgers University, USA

DOCTORAL SYMPOSIUM CHAIRS

Lisa Cavanaugh, University of British Columbia, Canada   Andrea Morales, Arizona State University, USA

KNOWLEDGE FORUM CHAIRS

Caleb Warren, University of Arizona, USA   Michelle Weinberger, Northwestern University, USA

FILM FESTIVAL CHAIRS

Joonas Rokka, Emylon Business School, France   Ekant Veer, University of Canterbury, New Zealand

EARLY CAREER WORKSHOP CHAIRS

Brent McFerran, Simon Fraser University, Canada   Karen Winterich, Penn State University, USA

COMPETITIVE PAPER REVIEWERS

Abraham, Ajay T., Seattle University, USA
Aggarwal, Pankaj, University of Toronto, Canada
Alexander, David, University of St. Thomas, USA
Allard, Thomas, Nanyang Technological University, Singapore
Alter, Adam, New York University, USA
André, Quentin, Erasmus University Rotterdam, The Netherlands
Ashworth, Laurence, Queens University, Canada
Askegaard, Søren Tollestrup, University of Southern Denmark, Denmark
Bakpayev, Marat, University of Minnesota Duluth, USA
Barnes, Aaron J., University of Louisville, USA
Barnett, Samuel B, ThinkAlike Laboratories, USA
Barnhart, Michelle, Oregon State University, USA
Barone, Mike, University of Louisville, USA
Basar, Berna, Marketing Evolution, USA
Basu, Shankha, University of Leeds, UK
Bennett, Aronte, Vilanova University, USA
Berg, Hanna, Stockholm School of Economics, Sweden
Bhogal-Nair, Anoop, De Montfort University, UK
Bilgin, Baler, Koc University, Turkey
Biraglia, Alessandro, University of Leeds, UK

Boettger, Tim M., IESEG School of Management, France
Boller, Daniel, University of St. Gallen, Switzerland
Bond, Samuel, Georgia Tech, USA
Botti, Simona, London Business School, UK
Brick, Danielle J, University of New Hampshire, USA
Brigden, Neil, Bow Valley College, Canada
Broniarczyk, Susan, University of Texas at Austin, USA
Brough, Aaron, Utah State University, USA
Brucks, Melanie, Columbia University, USA
Bryksina, Olya, University of Winnipeg, Canada
Calderon Urbina, Susan Danissa, University College Dublin, Ireland
Cambefort, Marine, EM Strasbourg, University of Strasbourg, France
Cambier, Fanny, NEOMA Business School, France
Canniford, Robin, University of Melbourne, Australia
Catapano, Rhia, University of Toronto, Canada
Cesareo, Ludovica, Lehigh University, USA
Chen, Charlene Y, Nanyang Technological University, Singapore
Chen, Fangyuan, Hong Kong Polytechic University, China
Chen, Rui, Tarleton State University, USA

Cheng, Yimin, Monash University, Australia
Chung, Myungjin, University of Texas at Arlington, USA
Claus, Bart, IESEG School of Management, France
Cocker, Hayley, Lancaster University, UK
Cornil, Yann, University of British Columbia, Canada
Cotte, June, Ivey Business School, Canada
Craig, Adam, University of Kentucky, USA
D'Angelo, Jennifer, Texas Christian University, USA
Danziger, Shai, Tel Aviv University, Israel
Daryanto, Ahmad, Lancaster University, UK
Davis, Derick, University of Virginia, USA
de Burgh-Woodman, Helene, Institute Mines Telecom Business School, France
Dellaert, Benedict, Erasmus University Rotterdam, The Netherlands
Deng, Xiaoyan, Ohio State University, USA
Dewitte, Siegfried, Katholieke University Leuven, Belgium
Ding, Ying, Renmin University of China, China
Ding, Yu, Columbia University, USA
Djedidi, Amina, Université Paris-Est Créteil, IRG, France
Dolbec, Pierre-Yann, Concordia University, Canada
Dommer, Sara Loughran, Georgia Tech, USA

COMPETITIVE PAPER REVIEWERS *(continued)*

Donovan, Leigh Anne, Pace University, USA
du Plessis, Christilene, Singapore Management University, Singapore
Durante, Kristina, Rutgers University, USA
Durante, Kristina, Rutgers University, USA
Ebert, Jane Jenkins, Brandeis University, USA
Edell, Julie Ann, Duke University, USA
Ein-Gar, Danit, Tel Aviv University, Israel
Emontspool, Julie, University of Southern Denmark, Denmark
Engeler, Isabelle, IESE Business School, Spain
Estes, Zachary, Bocconi University, Italy
Fernandes, Daniel, Catholic University of Portugal, Portugal
Ferraro, Rosellina, University of Maryland, USA
Fischer, Eileen, York University, Canada
Forcum, Lura, Clemson University, USA
Fumagalli, Elena, Universidad Torcuato Di Tella, Argentina
Gallo, Iñigo, IESE Business School, Spain
Gao, Huachao, University of Victoria, Canada
Gao, Leilei, Chinese University of Hong Kong, China
Garg, Nitika, University of New South Wales, Australia
Garvey, Aaron, University of Kentucky, USA
Ghosh, Bikram P, University of Arizona, USA
Givi, Julian, West Virginia University, USA
Gong, Han, Shanghai University of Finance and Economics, China
Gong, Han, Shanghai University of Finance and Economics, China
Goode, Miranda, Ivey Business School, Canada
Goulding, Christina, University of Birmingham, UK
Grant, Annetta, Bucknell University, USA
Greenberg, Adam Eric, Bocconi University, Italy
Grinstein, Amir, Northeastern University, USA
Groeppel-Klein, Andrea, Saarland University, Germany
Grossman, Daniel M, University of Cincinnati, USA
Gu, Yangjie, HEC Paris, France
Gullo, Kelley, Duke University, USA
Gunadi, Manissa, ESADE, Spain
Hadar, Liat, Coller School of management, Tel Aviv University, Israel
Hagen, Linda, University of Southern California, USA
Hagtvedt, Henrik, Boston College, USA
Hajjat, Fatima, Ithaca College, USA
Hall, Matthew James, Oregon State University, USA
Han, DaHee, McGill University, Canada
Han, Jerry Jisang, University of Technology Sydney, Australia
Hang, Haiming, University of Bath, UK
Hanson, Sara, University of Richmond, USA
Harmeling, Colleen M., Florida State University, USA
Heidig, Wibke, Albstadt-Sigmaringen University, Germany
Henry, Paul, University of Sydney, Australia
Herzenstein, Michal, University of Delaware, USA
Hingston, Sean, Western University, Canada
Hmurovic, Jillian, University of Pittsburgh, USA
Hogg, Margaret Kathleen, Lancaster University, UK
Hong, Jiewen, Hong Kong University of Science and Technology, China
Hossain, Mehdi Tanzeeb, University of Rhode Island, USA
Hsieh, Meng-Hua, Kent State University, USA
Hsu, Jen-Hsien, De Montfort University, UK

Hsu, Ming, University of California Berkeley, USA
Huang, Li, Hofstra University, USA
Huang, Xun (Irene), Nanyang Technological University, Singapore
Huang, Yunhui, Hong Kong University of Science and Technology, China
Huff, Aimee, Oregon State University, USA
Huh, Young Eun, Korea Advanced Institute of Science and Technology (KAIST), South Korea
Hyodo, Jamie D., University of Nebraska-Lincoln, USA
Ince, Elise Chandon, University of South Carolina, USA
Isaac, Mathew S., Seattle University, USA
Jahn, Steffen, University of Oregon, USA
Jain, Shailendra Pratap, University of Washington, USA
Jang, Eunyoung, Oklahoma State University, USA
Jia, He (Michael), University of Hong Kong, China
Jia, Jayson S., University of Hong Kong, China
Jia, Miaolei, University of Warwick, UK
Jiang, Yuwei, Hong Kong Polytechic University, China
Jie, Yun, Sun Yat-sen Business School, China
Jin, Zhenyu, University of South Carolina, USA
Johnson, Samuel, University of Bath, UK
Joiner, Chris, George Mason University, USA
Jung, Minah, New York University, USA
Kaikati, Andrew, Saint Louis University, USA
Kapitan, Sommer, Auckland University of Technology, New Zealand
Kapoor, Ankur, Indian Institute of Management Ahmedabad, India
Kelley, Corinne M, University of Kentucky, USA
Khamitov, Mansur, NTU Singapore/Indiana University, Singapore
Kharuhayothin, Tanyatip, University of Phayao, Thailand
Kim, Christian, Johns Hopkins University, USA
Kim, Christine, Hong Kong University of Science and Technology, China
Kim, Min Jung, Manhattan College, USA
Kim, Nicole, University of Maryland, USA
Kirk, Colleen P., New York Institute of Technology, USA
Kjeldgaard, Dannie, University of Southern Denmark, Denmark
Kokkoris, Michail, WU Vienna, Austria
Kordrostami, Elika, Rowan University, USA
Kovacheva, Aleksandra, University at Albany, USA
Krekels, Goedele, IÉSEG School of Management, France
Kronrod, Ann, University of Massachussetts Lowell, USA
Kupor, Daniella, Boston University, USA
Kurt, Didem, Northeastern University, USA
Kwong, Jessica Y. Y., Chinese University of Hong Kong, China
Lane, Kristen, University of Arizona, USA
LaTour, Kathryn, Cornell University, USA
LeBoeuf, Robyn, Washington University, USA
Lee, Hsiao-Ching, National Kaohsiung University of Science and Technology, Taiwan
Lee, Hsin-Hsuan Meg, ESCP Europe, France
Lee, Hyun Jung Crystal, Universidad Carlos III de Madrid, Spain
Lee, Jaehoon, Florida International University, USA
Lee, Saerom, University of Guelph, Canada
Levy, Eric, Queen Mary University of London, UK
Li, Jessica, University of Kansas, USA

Li, Ye, University of California Riverside, USA
Li, Yi, Macquarie University, Australia
Lieberman, Alicea, University of California San Diego, USA
Lim, Elison Ai Ching, Nanyang Technological University, Singapore
Lin, Chien-Wei, State University of New York at Oneonta, USA
Lin, Lily, Simon Fraser University, Canada
Lin, Stephanie, INSEAD, Singapore
Ling, Christopher, McMaster University, Canada
Liu, Jingshi, Business School City, University of London, UK
Liu, Maggie Wenjing, Tsinghua University, China
Liu, Peggy, University of Pittsburgh, USA
Liu, Yunxin, Katholieke University Leuven, Belgium
Loveland, Katherine, Xavier University, USA
Lowe, Michael, Georgia Tech, USA
Lowrey, Tina M., HEC Paris, France
Lu, Tong, Carnegie Mellon University, USA
Lunardo, Renaud, Kedge Business School, France
Ma, Jingjing, Peking University, China
Maimaran, Michal, Northwestern University, USA
Manchiraju, Srikant, Florida State University, USA
Mars, Matthew M, University of Arizona, USA
Matherly, Ted, Tulane University, USA
Mesler, Rhiannon MacDonnell, University of Lethbridge, Canada
Mette, Frederike Monika Budiner, PUCRS, Brazil
Mimoun, Laetitia, City University of London, UK
Min, Bora, Monash University, Australia
Min, Lauren, University of Kansas, USA
Mittal, Chiraag, Texas A&M University, USA
Moisio, Risto, California State University Long Beach, USA
Moore, Sarah G, University of Alberta, Canada
Morvinski, Coby, Ben Gurion University, Israel
Mourali, Mehdi, University of Calgary, Canada
Mourey, James A., DePaul University, USA
Mukherjee, Ashesh, McGill University, Canada
Munichor, Nira, Bar-Ilan University, Israel
Nardini, Gia, University of Denver, USA
Nelson, Noelle, University of Oregon, USA
Newton, Kathryn Jane, Ryerson University, Canada
Nielsen, Jesper H, University of Arizona, USA
Nikolova, Hristina, Boston College, USA
Norton, Michael, Harvard Business School, USA
Nunes, Joseph, University of Southern California, USA
Olivola, Christopher, Carnegie Mellon University, USA
Olson, Jenny, Indiana University, USA
Oswald, Laura R, Marketing Semiotics
Pandraud, Raphaelle Lambert, ESCP Europe, France
Pang, Jun, Renmin University of China, China
Park, Hyun Young, CEIBS, China
Parker, Jeffrey R., University of Illinois at Chicago, USA
Peck, Joann, University of Wisconsin - Madison, USA
Peluso, Alessandro M., University of Salento, Lecce, Italy
Perkins, Andrew, Washington State University, USA
Pew, Ethan, Columbia University, USA
Pfeiffer, Bruce E., University of New Hampshire, USA
Philp, Matthew, Ryerson University, Canada
Plassmann, Hilke, INSEAD, France

COMPETITIVE PAPER REVIEWERS *(continued)*

Polman, Evan, University of Wisconsin - Madison, USA
Popovich, Deidre, Texas Tech University, USA
Pracejus, John, University of Alberta, Canada
Prokopec, Sonja, ESSEC Business School, France
Putnam-Farr, Eleanor, Rice University, USA
Puzakova, Marina, Lehigh University, USA
Pyle, Martin A., Ryerson University. Canada
R, Aravind, Indian Institute of Management Kozhikode, India
Rabino, Rebecca, Texas Tech University, USA
Rahmani, Vahid, Rowan University, USA
Ratchford, Mark Brian, Tulane University, USA
Rath, Suzanne, University of Prince Edward Island, Canada
Rauf, Ateeq Abdul, Information Technology University, Pakistan
Reeck, Crystal, Temple University, USA
Reich, Brandon Jeremy, Portland State University, USA
Reimann, Martin, University of Arizona, USA
Rocklage, Matthew D, University of Massachusetts, USA
Rodas, Maria A., University of Southern California, USA
Roux, Caroline, Concordia University, Canada
Rucker, Derek, Northwestern University, USA
Rudd, Melanie, University of Houston, USA
Russell, Cristel, Pepperdine University, USA
Sadowski, Sebastian, Maastricht University, The Netherlands
Saenger, Christina, Youngstown State University, USA
Sahar-Inbar, Limor, Bar-Ilan University, Israel
Salerno, Anthony, University of Cincinnati, USA
Samu, Sridhar, Great Lakes Institute of Management, India
Sangle-Ferriere, Marion, ESCP Europe, France
Santana, Shelle, Harvard Business School, USA
Santini, Fernando De Oliveira, Universidade Do Vale Do Rio Dos Sinos - Unisinos, Brazil
Satyavageeswaran, Prakash, Indian Institute of Management Udaipur, India
Scaraboto, Daiane, University of Melbourne, Australia
Schau, Hope, University of Arizona, USA
Schultz, Ainslie, Providence College, USA
Schwartz, Daniel, University of Chile, Chile
Schwartz, Janet A, Duke University, USA
Scopelliti, Irene, City University of London, UK
Sellier, Anne Laure, HEC Paris, France
Sharma, Varun, Carnegie Mellon University, Qatar
Shen, Luxi, Chinese University of Hong Kong, China

Shoham, Meyrav, Tel Aviv University, Israel
Shrum, L. J., HEC Paris, France
Siddiqui, Rafay A, Hong Kong Polytechnic University, China
Simonson, Itamar, Stanford University, USA
Simpson, Bonnie, Western University, Canada
Sinha, Jayati, Florida International University, USA
Smith, Robert, Tilburg University, The Netherlands
Smith, Rosanna, University of Georgia, USA
So, Jane, City University of Hong Kong, China
Soster, Robin, Drury University, USA
Stamatogiannakis, Antonios, IE Business School, IE University, Spain
Stephenson, Brittney, Pacific University, USA
Stoner, Jennifer L, University of North Dakota, USA
Su, Lei, Hong Kong Baptist University, China
Suher, Jacob, Portland State University, USA
Szocs, Courtney, Louisiana State University, USA
Tan, Teck Ming, University of Oulu, Finland
Thomas, Veronica, Towson University, USA
Ting, Ding Hooi, Universiti Teknologi PETRONAS, Malaysia
Tonietto, Gabriela, Rutgers University, USA
Torelli, Carlos, University of Illinois at Urbana-Champaign, USA
Tripathi, Sanjeev, Indian Institute of Management, Indore, India
Tu, Lingjiang Lora (go by middle name), Baylor University, USA
Tu, Yanping, University of Florida, USA
Tugut, Meltem, Saint Louis University, USA
Tully, Stephanie, Stanford University, USA
Valenzuela, Ana, Baruch College, USA
Valsesia, Francesca, University of Washington, USA
VanBergen, Noah, University of Cincinnati, USA
Van den Bergh, Bram, Erasmus University Rotterdam, The Netherlands
van Herpen, Erica, Wageningen University, The Netherlands
van Horen, Femke, Vrije Universiteit Amsterdam, The Netherlands
Venkatesh, Alladi, University of California Irvine, USA
Veresiu, Ela, York University, Canada
Villanova, Daniel, University of Arkansas, USA
Vu, Tiffany, University of Michigan, USA
Wallendorf, Melanie, University of Arizona, USA
Wan, Echo Wen, University of Hong Kong, China
Wan, Fang, University of Manitoba, Canada
Wang, Yajin, University of Maryland, USA
Warmath, Dee, University of Georgia, USA
Weber, Virginia, Deakin University, Australia
Wegerer, Philipp K., MCI Management Center Innsbruck, Austria

Wei, Sarah, University of Warwick, UK
Weijo, Henri, Aalto University, Finland
Weijters, Bert, Ghent University, Belgium
Weingarten, Evan, Arizona State University, USA
Weiss, Liad, University of Wisconsin - Madison, USA
White, Katherine, University of British Columbia, Canada
White, Tiffany, University of Illinois at Urbana-Champaign, USA
Whitley, Sarah, University of Georgia, USA
Wiener, Hillary, University at Albany, USA
Winer, Russell Stuart, New York University, USA
Wu, Freeman, Vanderbilt University, USA
Xie, Guang-Xin, University of Massachusetts Boston, USA
Xiong, Jill, Southwestern University of Finance and Economics, China
Xu, Lidan, Oklahoma State University, USA
Xu, Xiaobing, Hainan University, China
Yalch, Richard, University of Washington, USA
Yang, Chun-Ming, Ming Chuan University, Taiwan
Yang, Haiyang, Johns Hopkins University, USA
Yang, Linyun, University of South Carolina, USA
Yang, Yang, University of Florida, USA
Yanit, Mehmet, University of Manitoba, Canada
Yin, Bingqing (Miranda), University of Kansas, USA
Yucel-Aybat, Ozge, Pennsylvania State University Harrisburg, USA
Zemack-Rugar, Yael, University of Central Florida, USA
zhang, Xiaodan, Peking University, China
Zhang, Kuangjie, Nanyang Technological University, Singapore
Zhang, Qi, University of Manitoba, Canada
Zhang, Yan, National University of Singapore, Singapore
Zhang, Yuli, Stockton University, USA
Zhang, Zhe, HEC Montreal, Canada
Zhao, Min, Boston College, USA
Zhou, Rongrong, Hong Kong University of Science and Technology, China
Zhu, Meng, Johns Hopkins University, USA
Ziano, Ignazio, Grenoble Ecole de Management, France
Zimmermann, Laura, IE University, Spain
Zwebner, Yonat, The InterDisciplinary Center (IDC(Herzliya, Israel
Zwick, Rami, University of California Riverside, USA

PROGRAM COMMITTEE

Agrawal, Nidhi, University of Washington, USA
Arnould, Eric, Aalto University, Finland
Arsel, Zeynep, Concordia University, Canada
Atalay, Selin, Frankfurt School of Finance and Management, Germany
Bardhi, Fleura, City University of London, UK
Belk, Russell W., York University, Canada
Bellezza, Silvia, Columbia University, USA
Bettman, James R., Duke University, USA
Bhargave, Rajesh P, Imperial College Business School, UK
Bhattacharjee, Amit, INSEAD, France
Biswas, Dipayan, University of South Florida, USA

Bradford, Tonya, University of California Irvine, USA
Buechel, Eva, University of Southern California, USA
Burson, Katherine, University of Michigan, USA
Campbell, Colin, University of San Diego, USA
Chang, Hannah, Singapore Management University, Singapore
Chaplin, Lan Nguyen, University of Illinois at Chicago, USA
Chattopadhyay, Amitava, INSEAD, Singapore
Chaxel, Sophie, HEC Paris, France
Coulter, Robin A., University of Connecticut, USA
Cowley, Elizabeth, University of Sydney, Australia

Darke, Peter, York University, Canada
De Langhe, Bart, ESADE Business School, Spain
Diehl, Kristin, University of Southern California, USA
Dobscha, Susan, Bentley University, USA
Dunn, Lea, University of Washington, USA
Etkin, Jordan, Duke University, USA
Evangelidis, Ioannis, ESADE Business School, Spain
Faro, David, London Business School, UK
Fedorikhin, Alexander, Indiana University, USA
Finkelstein, Stacey R, Stony Brook University, USA
Fuchs, Christoph, TU Munich, Germany
Gilly, Mary, University of California Irvine, USA

PROGRAM COMMITTEE *(continued)*

Goodman, Joseph K, Ohio State University, USA
Grewal, Dhruv, Babson College, USA
Gurhan-Canli, Zeynep, Koc University, Turkey
Hadi, Rhonda, Oxford University, UK
Hamilton, Rebecca, Georgetown University, USA
Häubl, Gerald, University of Alberta, Canada
Herd, Kelly, University of Connecticut, USA
Huang, Szu-chi, Stanford University, USA
Johar, Gita, Columbia University, USA
Koo, Minjung, Sungkyunkwan University, South Korea
Kramer, Thomas, University of California Riverside, USA
Kristofferson, Kirk, Ivey Business School, Canada
Labroo, Aparna A, Northwestern University, USA
Lalwani, Ashok K, Indiana University, USA
Lutz, Richard J, University of Florida, USA
Malkoc, Selin A., Ohio State University, USA
Mehta, Ravi, University of Illinois at Urbana-Champaign, USA
Meloy, Margaret, Pennsylvania State University, USA
Mittal, Sarah E, Texas State University, USA
Morrin, Maureen, Rutgers University, USA
Ordabyaeva, Nailya, Boston College, USA
Otnes, Cele, University of Illinois at Urbana-Champaign, USA
Pandelaere, Mario, Virginia Tech, USA

Paolacci, Gabriele, Erasmus University Rotterdam, The Netherlands
Parmentier, Marie-Agnès, HEC Montreal, Canada
Penaloza, Lisa, Kedge Business School, France
Pham, Michel, Columbia University, USA
Pocheptsova Ghosh, Anastasiya, University of Arizona, USA
Puntoni, Stefano, Erasmus University Rotterdam, The Netherlands
Rank-Christman, Tracy, University of Wisconsin - Milwaukee, USA
Ratner, Rebecca, University of Maryland, USA
Reczek, Rebecca Walker, Ohio State University, USA
Samper, Adriana, Arizona State University, USA
Savary, Jennifer, University of Arizona, USA
Scaraboto, Daiane, University of Melbourne, Australia
Schley, Dan, Erasmus University Rotterdam, The Netherlands
Schreier, Martin, WU Vienna, Austria
Shrum, L. J., HEC Paris, France
Smidts, Ale, Erasmus University Rotterdam, The Netherlands
Spiller, Stephen A, University of California Los Angeles, USA
Steinhart, Yael, Coller School of Management Tel Aviv University, Israel

Sweldens, Steven, Erasmus University Rotterdam, The Netherlands
Thomas, Manoj, Cornell University, USA
Thompson, Debora, Georgetown University, USA
Thomson, Matt, Western University, Canada
Townsend, Claudia, University of Miami, USA
Trudel, Remi, Boston University, USA
Tsai, Claire I., University of Toronto, Canada
Urminsky, Oleg, University of Chicago, USA
Vallen, Beth, Vilanova University, USA
Van Ittersum, Koert, University of Groningen, The Netherlands
van Osselaer, Stijn M. J., Cornell University, USA
Vohs, Kathleen, University of Minnesota, USA
Wertenbroch, Klaus, INSEAD, Singapore
Wilcox, Keith, Columbia University, USA
Wu, Eugenia, University of Pittsburgh, USA
Xu, Alison Jing, University of Minnesota, USA
Yan, Dengfeng, NYU Shanghai, China
Yang, Adelle Xue, National University of Singapore, Singapore
Yorkston, Eric, Texas Christian University, USA
Zayer, Linda Tuncay, Loyola University Chicago, USA
Zhang, Meng, Chinese University of Hong Kong, China
Zhu, Rui (Juliet), Cheung Kong Graduate School of Business, China

WORKING PAPER REVIEWERS

Akdevelioglu, Duygu, Rochester Institute of Technology, USA
Arens, Zachary, Oklahoma State University, USA
Babic Rosario, Ana, University of Denver, USA
Barasz, Kate, Harvard Business School, USA
Baskentli, Sara, Western Washington University, USA
Bayer, Rabia, Koc University, Turkey
Botelho, Delane, EAESP-FGV, Brazil
Braz Becker, Larissa Carine, University of Turku, Finland
Carrero, icarrero@comillas.edu, Universidad Pontificia Comillas, Spain
Carrington, Michal, University of Melbourne, Australia
Chai, Luxi, Missouri Southern State University, USA
Chen, Shirley S., University of Alberta, Canada
Chen, Yu-Ping, National Taiwan University, Taiwan
Chung, Sorim, Rochester Institute of Technology, USA
Cocker, Hayley, Lancaster University, UK
Cornelissen, Gert, Pompeu Fabra University, Spain
Creusen, Marielle E.H., Dalhousie University, Canada
Crolic, Cammy, University of Oxford, UK
Darveau, Jessica, Laval University, Canada
Davis, Brennan, California Polytechnic State University, USA
De Luca, Ramona, EAESP-FGV, Brazil
Deval, Helene, Dalhousie University, Canada
Dietvorst, Berkeley Jay, University of Chicago, USA
Ding, Isabel, National University of Singapore, Singapore
Doering, Tim Philipp, University of Michigan, USA
Dubelaar, Chris, Deakin University, Australia
Duffy, Kat, University of Glasgow, Scotland
Duke, Kristen, University of Toronto, Canada
Dupuis, Yves, Concordia University, Canada

El Ourabi, Hédia, École de gestion- Université du Québec à Trois-Rivières, Canada
Emile, Renu, O.P. Jindal Global University, USA
Erz, Antonia, Copenhagen Business School, Denmark
Fajardo, Tatiana Marie, Florida State University, USA
Farmer, Matthew, University of Arizona, USA
Fedorenko, Ivan, California State University East Bay, USA
Gao, Fei, HEC Paris, France
Gardner, Meryl P., University of Delaware, USA
Giuffredi-Kähr, Andrea, University of Zurich, Switzerland
Goenka, Shreyans, Cornell University, USA
Gong, Xiushuang, Jiangnan University, China
Goswami, Indranil, SUNY Buffalo, USA
Grochowska, Alicja, University of Social Sciences and Humanities, Warszawa, Poland
Grochowska, Alicja, Uniwersity of Social Sciences and Humanities, Warsaw, Poland
Gross, Barbara L, California State University Northridge, USA
Gupta, Aditya, Illinois State University, USA
Hair, Michael, Southern Illinois University Edwardsville, USA
Han, Yegyu, IE Business School, Spain
He, Stephen, West Virginia University, USA
Hernandez, Jose Mauro C., Centro Universitário FEI, Brazil
Hildebrand, Diogo, Baruch College, USA
Hodges, Brady, University of Missouri, USA
Hoelzl, Erik, University of Cologne, Germany
Hong, JungHwa (Jenny), University of Texas at Tyler, USA
Howe, Holly S, Duke University, USA
Hu, Bingyan, University of Iowa, USA
Ibrahim, Nahid, University of Alberta, Canada
Ikonen, Iina, University of Bath, UK

Isisag, Anil, University of Wisconsin - Madison, USA
Jacob, Jorge Rodrigues, Columbia University, USA
Jaspers, Esther Doriette Tamara, Massey University, New Zealand
Jeong, Haeyoung, Drexel University, USA
Jung, SungJin, INSEAD, Singapore
Kan, Christina, University of Connecticut, USA
Kang, In-Hye, University of North Carolina at Greensboro, USA
Kara, Selcan, University of Massachusetts, USA
KC, Raghabendra Pratap, Rollins College, USA
Kim, Claire Heeryung, McGill University, Canada
Kim, Dooiee, Seoul National University, South Korea
Kim, Hae Joo, Wilfrid Laurier University, Canada
Kim, Hyoseok, University of Alberta, Canada
Kim, Junghyun, NEOMA Business School, France
Kim, Sara, University of Hong Kong, China
Kleppe, Ingeborg Astrid, Norwegian School of Economics and Business Administration, Norway
Koch, Jan Andre, University of Groningen, The Netherlands
Koo, K.B., University of Alberta, Canada
Kousi, Sofia, Nova SBE, Portugal
Kulkarni, Atul A, University of Missouri, USA
Kumar, Amit, University of Texas at Austin, USA
Kuo, Tzu-Yin, Nanyang Technological University, Singapore
Kwon, JaeHwan, Baylor University, USA
Lai, Edward Yuhang, Virginia Tech, USA
Lavoie, Raymond, Merrimack College, USA
Lee, Yun, Virginia State University, USA
Leung, Ada, Pennsylvania State University, USA
Levontin, Liat, Technion University, Israel
Li, Yina, University of Science and Technology of China
Li, Yuanyuan Jamie, Southern University of Science and Technology, China

WORKING PAPER REVIEWERS *(continued)*

Li, Dajun, Tsinghua University, China

Liu, Wendy, University of California San Diego, USA

Lteif, Lama, University of New Mexico, USA

Lu, Fang-Chi, University of Melbourne, Australia

Luangrath, Andrea Webb, University of Iowa, USA

Mayer, Stefan, University of Tübingen, Germany

Mecit, N. Alican, HEC Paris, France

Melumad, Shiri, University of Pennsylvania, USA

Memmi, Sarah A., Duke University, USA

Miller, Chadwick, Washington State University, USA

Miller, Gina, Mercer University - Atlanta, USA

Mitchell, Alex, California State Polytechnic University, Pomona, USA

Monga, Alokparna (Sonia), Rutgers University, USA

Murdock, Mitch, Utah Valley University, USA

Narayanan, Priya, Indian Institute of Management Kozhikode, India

Nasa, Jayant, Indian Institute of Management Udaipur, India

Nicolao, Leonardo, Federal University of Rio Grande do Sul (UFRGS), Brazil

Oh, Ga-Eun (Grace), Open University of Hong Kong, China

Oh, Hyewon, University of Illinois at Urbana-Champaign, USA

Olson, Nicholas J., Texas A&M University, USA

Park, Jen H., Stanford University, USA

Park, Sungjun (Steven), National Chengchi Uniersity, Taiwan

Pelau, Corina, Bucharest University of Economic Studies, Romania

Pogacar, Ruth, University of Calgary, Canada

Pomies, Anissa, Emlyon Business School, France

Pontes, Nicolas Gonçalves, University of Queensland, Australia

Raju, Sekar, Iowa State University, USA

Rawal, Saurabh, University of Alberta, Canada

Robinson, Stacey, University of Alabama, USA

Rodriguez, Alejandra, Oklahoma State University, USA

Ross, Spencer, University of Massachusetts Lowell, USA

Ruvalcaba, Cecilia, University of the Pacific, USA

Ruvio, Ayalla A, Michigan State University, USA

Ruzeviciute, Ruta, University of Amsterdam, The Netherlands

Sahabeh Tabrizi, Eisa, University of Southeast Norway

Saluja, Geetanjali, University of Technology Sydney, Australia

Schaffner, Dorothea, University of Applied Sciences and Arts of Northwestern Switzerland

Schneider, Gustavo, University of South Carolina, USA

Sengupta, Rumela, University of Illinois at Chicago, USA

Shanks, Ilana, Stony Brook University, USA

Sharif, Marissa, University of Pennsylvania, USA

Sørensen, Elin Brandi, University of Southern Denmark, Denmark

Spassova, Gerri, Monash University, Australia

Stanislawski, Sumire, Tokyo International University, Japan

Steiner, Thomas Heinrich, Schloss Seeburg University, Austraia

Stornelli, Jason, Oregon State University, USA

Sun, Sijie, University of Hawaii, USA

Takhar, Jennifer, Institut Supérieur de Gestion, Paris, France

Tari, Berna, TOBB University of Economics and Technology, Turkey

Thomas, Meredith Rhoads, Florida State University, USA

Thomas, Tabitha S, Unaffiliated

Tiercelin, Alexandre, Université de Reims, France

Trujillo Torres, Lez Ecima, University of Illinois at Chicago, USA

Vaidyanathan, Rajiv, University of Minnesota Duluth, USA

Valor, Carmen, Universidad Pontificia Comillas, Spain

van der Heide, Martine, University of Groningen, The Netherlands

van der Westhuizen (maiden name Kruger), Liezl-Marie, University of Pretoria, South Africa

Waisman, Rory, University of Alberta, Canada

Werle, Carolina OC, Grenoble Ecole de Management, France

Williamson, Sara, SUNY Old Westbury, USA

Yalcin, Gizem, Erasmus University Rotterdam, The Netherlands

Yamim, Amanda Pruski, Grenoble Ecole de Management, France

Yi, John J, University of Arizona, USA

You, Yanfen, New Mexico State University, USA

Yuksel, Mujde, Suffolk University, USA

Zane, Daniel M., Lehigh University, USA

Zeng, Xianfang, University of Calgary, Canada

Table of Contents

2020 ACR Presidential Address

2020 ACR Fellows' Addresses

Competitive Papers—Full

Competitive Papers—Extended Abstracts

Special Sessions

Working Papers

Film Festival 2020

Knowledge Forums

Ann Kronrod, University of Massachusetts Lowell, USA
Grant Packard, York University, Canada
Sarah G Moore, University of Alberta, Canada
Jonah Berger, University of Pennsylvania, USA
Jeffrey Inman, University of Pittsburgh, USA
Robert Meyer, University of Pennsylvania, USA
L. J. Shrum, HEC Paris, France
Ashlee Humphreys, Northwestern University - Medill, USA
Nicholas Lurie, University of Connecticut, USA
Andrea Webb Luangrath, University of Iowa, USA
Jeff Lee, American University, USA
Matthew D Rocklage, University of Massachusetts, USA
Charles Zhang, University of California Riverside, USA
Ruth Pogacar, University of Calgary, Canada
Ivan Gordeliy, Georgetown University, USA
Shiri Melumad, University of Pennsylvania, USA
Amir Grinstein, Northeastern University, USA
Francisco Villarroal Ordenes, University of Massachusetts, USA
Guang-Xin Xie, University of Massachusetts Boston, USA
Zoey Chen, University of Miami, USA

Tiffany White, University of Illinois at Urbana-Champaign, USA
Joel Huber, Duke University, USA
Darren Dahl, University of British Columbia, Canada
Anirban Mukhopadhyay, Hong Kong University of Science and Technology, China
Laura Peracchio, University of Wisconsin - Milwaukee, USA
Sharon Shavitt, University of Illinois at Urbana-Champaign, USA

Gizem Yalcin, Erasmus University Rotterdam, The Netherlands
William Fritz, Oxford University, UK
Ana Valenzuela, Baruch College, USA
Andrew T. Stephen, Oxford University, UK
Bernd Schmitt, Columbia University, USA
Christian Hildebrand, University of Geneva, Switzerland
Donna L. Hoffman, George Washington University, USA
Klaus Wertenbroch, INSEAD, Singapore
Markus Giesler, York University, Canada
Rebecca Walker Reczek, Ohio State University, USA
Rhonda Hadi, Oxford University, UK
Robert Meyer, University of Pennsylvania, USA
Russell W. Belk, York University, Canada
Stefano Puntoni, Erasmus University Rotterdam, The Netherlands
Szu-chi Huang, Stanford University, USA
Thomas Novak, George Washington University, USA

Author Index

2020 ACR Presidential Address

Where To From Here?

Eileen Fischer, Professor of Marketing and
Anne and Max Tanenbaum Chair of Entrepreneurship and Family Enterprise, Canada

It seems fair to say that 2020 has been an "unprecedented year." Indeed, the term "unprecedented" has become so common that many people are whishing we could go back to living in some "precedented" times for a while. But there is no going backward. Our only choice ever is to go forward. So my address will take up the question "where to from here?"

Before getting to that, of course, I need to acknowledge what has made 2020 so unprecedented. How do I sum up this year in a few sentences? Of course, I can't. But to state the obvious, I want to acknowledge the seismic changes that have been wrought to the lives of everyone on the planet by the severe acute respiratory syndrome coronavirus 2 (SARS-CoV-2) and the disease it causes, COVID-19. Equally, I want to acknowledge the heightened salience of racism in general, and systemic anti-black racism in particular, in the wake of the protests following the death of George Floyd in May of this year, fast on the heals of the deaths of Ahmaud Arbery in Feburary and Breonna Taylor in March, not to mention the nearly countless others who have died owing to systemic racism in the years before this.

Perhaps most salient, in my own mind at least, is how deeply interconnected these twin pillars of 2020 are proving to be. It is impossible to ignore that the pandemic has disproportionately affected people from Black, Asian, Indigenous and minority ethnic communities. The acute plague that is COVID-19 is making it impossible *not* to pay attention to the chronic systemic racism in our societies, and to the sprawling consequences thereof. Let me summarily, then, refer to both the pandemic and every more visible prominence of systemic racism as the "tumult" that has surfaced in 2020, but that surely will continue to be a factor in all our lives as citizens and as scholars in the years ahead.

What I want to reflect on is how some learning can come from reflecting on this year that will give us some guidance, or guardrails, or even dare I say inspiration about where we go from here. I organized about this under two distinct headings. The first is: where we go from here as the academic association that is ACR? The second is: where we go from here as consumer researchers?

My read of prior presidential addresses suggests to me that most ACR presidents have talked about consumer research for the most part, not about the Association for Consumer Research itself. But this year, it seems at least as important to talk about the how ACR can and should respond to the events of 2020, so that's where I'll start.

First I want to review some the steps that ACR has taken thus far. The Board of ACR has we've tried to be responsive on a number of fronts, starting with but not limited to making a statement regarding ACR's stand against racism. It reads as follows:

ACR rejects racism, hate, intolerance, oppression, and discrimination in all its forms.

Our diverse, global membership includes scholars from populations who face threats to their human rights, including threats to their lives. To these members, we say: We see you! We hear you! We support you! You are not alone!

We recognize in particular the deep pain, fear, anger, and frustration that our members who are part of the Black community have experienced, and continue to experience, as a result of anti-Black racism directed toward them.

Although events in the U.S. are finally receiving heightened attention, racism, hate, intolerance, oppression, and discrimination are widespread, and systemic racism is pervasive and pernicious in societies around the world.

As scholars, as citizens, and most fundamentally as humans, we have a shared responsibility to speak out and act against racism and injustice and to uphold and promote the values of respect, equity, diversity, and inclusion. We know it is not enough to simply condemn anti-Black racism, or the systemic suppression of human rights in general. More must be done. It is also time to prioritize scholarship that can be conducive to better understanding and helping to alleviate, systemic racism, and the conditions of oppression.

And while this statement is an important one, what needs to be underscored is that systemic racism isn't just happening "out there." Its effects are also evident "in here" by which I mean inside ACR. This is reflected, for example, in the under-representation of many categories of scholars within our ranks.

Recognizing this fact, the ACR board has tried to find an immediate way of taking concrete action, Working with The PhD project has proven to be a great starting point. For those of you I'll just highlight some of its goals, which include:

- To inform and educate minorities about all aspects of a business doctoral program, and encourage them to follow their dream of becoming a professor; and
- To provide a nurturing support network for minorities as they navigate their doctoral program;

By a decision of the ACR Board of Directors, we have entered a partnership with the PhD Project that has already seen us offer financial support in various forms. As well, we're working with them, and with Marketing Ethnic Faculty Association, on a customized mentorship program that should launch this year.

Beyond this, ACR has supported and encouraged JACR in publish special issues relevant to both anti-racism and the pandemic. And it's making relevant materials, for example on how to be an ally, available on the ACR website. Moreover, we are seeking the approval of ACR's members to amend our by-laws in order to establish on new position on the board: An Equity, Diversity and Inclusion Champion who will help oversee more initiatives.

These steps, while worthwhile, stop short of what the association needs to do, at least in my view. It's great that we've found a way to connect with PhD students who are fortunate enough to be members of the PhD project, but the PhD project is only open to students who are American citizens and who are members of particular racial groups. We need to find ways of lowering the barriers to entry for others who are not eligible for membership in the PhD project but who are subject to systemic racism or other forms of marginalization And merely lowering barriers to entry won't be adequate, if members of marginalized groups don't feel like they can participate fully in ACR, including participating in the conferences inside and outside

North America, and participating in the leadership of ACR. It's easy to call for inclusivity, but a lot harder to achieve it, and tailored approaches are definitely required especially given that barriers to full participation in ACR are quite different from region to region.

For the Association to change for the better, it will require engagement far beyond the elected members of the Board. And there are many ways that people can get involved. For example, members of ACR can

- Bring ideas about marginalized groups that may be being overlooked to the attention of the board of ACR.
- Work with other ACR members to identify concrete initiatives that will help members of specific groups who are under-represented or marginalized in our association
- If asked to help out with an initiative, make the time to do so
- Seek greater education about systemic racism and about how to be an ally

And this list is by no means exhaustive.

To be clear, I'm not trying to say that everyone has the capacity to pitch in and help right now. I know many members of ACR are busy just trying to deal with the immediate challenges in front of them. This isn't meant to make anyone feel an extra burden at a difficult time.

It is, however, meant to be an invitation to those who are concerned to step forward.

Having discussed what I see as the way forward in terms of the Association, Ill turn my attention to some thoughts about the way forward for our research. And I'm mindful that some of what I'm going to suggest may sound a bit strangely sociological to those who come from a more purely psychological research tradition. But I believe the three suggestions I'm going to make benefit a lot of people grappling to make their work meaningful in light of issues that have surfaced in 2020.

So what issues HAVE surfaced in 2020 that weren't necessarily top of mind before?

To me, the compelling issues relate to the uneven effects of the pandemic on consumers in different sociological categories. And to address this, I have three suggestions for researchers, which are: to take intersectionality into account; to carefully attend to context; and to consider consumers as enterprising entities. I'll elaborate briefly on each.

Accounting for Intersectionality. Intersectionality refers to the fact that each and every person is positioned in society at the intersection of multiple social axes, such as race, class, and gender. Theories of intersectionality stress that every person is subject to advantages and disadvantages particular to his or her intersectional position (e.g. Gopaldas & Fischer 2012). My contention is that we probably can't develop meaningful theories that address issues related to the pandemic, to racism, or to both, without taking into account multiple social axes.

For example, any study of how the pandemic has affected women's consumption vs men's cannot generalize across all women; at a minimum race and social class must be accounted for. Consider women at various intersections of race and class deciding whether or not to send their kids back to daycare or school. Women in different race and class axes will not only have different choices in terms of what they can afford, but are likely to face different consideration sets in terms of what they're trying to achieve by sending their kids back to school or not. They're also likely to be subjected to different kinds of normative pressures. Simply put, no generalizations within gender categories should be taken for granted. More broadly, any

study that's going to explore facets of the pandemic needs to take intersections into account.

Carefully Attending to Context. I'm using the term "context "to refer to the "systemic and structuring influences of market and social systems" that consumers are typically not consciously aware of, but that nevertheless affect what they think and what they do (e.g. Askegaard and Linnet 2011). My contention is that we cannot understand situated responses to either the pandemic or institutionalized racism without understanding these systemic and structuring influences

To illustrate this, consider the highly salient case of consumers' decisions involved in whether to wear a mask or what mask to wear. We cannot understand these choices without an understanding the political and social conditions that factor into this choice. And some of those contextual conditions are likely to be deeply rooted in the history and institutional characteristics of the fields to which consumers are habituated. This means that as consumer researchers, we cannot ignore contexts that shape consumers choices, actions and reactions.

Consider Consumers as Enterprising Entities. My last suggestion has to do with how with think about consumers and consumer behaviors. Interestingly, a number of prior ACR presidential addresses have raised questions about the boundaries of the phenomena that are "inside" versus "outside" the set of those we study. My remarks follow in that tradition.

I want to make the case that our investigations of consumers, particularly now, must be broad enough to take into account the enterprising activities that people are engaging in, which are intertwined with and inseparable from those things we more conventionally define as consumption.

This is different than studying consumer "identity work" which is largely symbolic signaling. It's also different than studying co-creation or co-production or adopting a service dominant logic. Both of these are producer-centric views that draw attention to people engaged with a producer whose inputs the consumer responds to. We (also) need a person-centric view that recognizes that people engage in consumption in order to achieve things, and that much of what people buy, access or use is part of a productive process

Now there is no doubt that my perspective on this is shaped by the fact that I actually study entrepreneurial ventures as well as individual consumers. But let me be clear, I'm not asking that anyone else study both. What I am saying is that consumers are frequently engaging in consumption not as an end itself but as means to some end that is agentic, productive, enterprising.

When we arbitrarily draw a line between production and consumption or enterprise and consumption or making and consuming, we do consumers a disservice in terms of characterizing them as passive rather than agentic. Moreover, we de-contextualize their actions, which, hearkening back to my last point, is deeply problematic.

The good news here is that I am seeing increasing tendencies for both qualitative and quantitative scholars to be interested in the yin/yang relationship between what people are doing when they're consuming/producing. However, there is still a tendency for review processes to involve some "policing" of the boundaries of what constitutes consumption and what does not. And I think this is holding us back as field. And particularly given the lessons of 2020, if we're going to do meaningful relevant work that actually serves the interests of the people we study, we need to be broad-minded about the enterprise that is innate in much of what we call consumption.

I'll give JUST one example here to illustrate what I mean. I invite you to consider consumers who are turning to platforms especially now to use them not just for shopping and not just for self-expression but also to try to make money. I want to argue that

this is consumption just as surely as any shopping or online identity building is consumption. These people are consuming platforms like Etsy, Pinterest, Facebook, and Instagram. They are using platforms both to reach and to build audiences, and they are often using platforms to sell products. They are enterprising consumers

Note that we need not uncritically celebrate neo-liberal values when studying consumers as enterprising individuals. But we cannot understand well what they are doing if we think of them as "merely" consuming. And that it's consumption that—particularly now—we should not be ruling outside the boundaries of our field.

I hope that those reading these remarks will give some thought to the innate links between actions that we'd all regard as consuming and those that could be regarded as "enterprising." Even if you don't turn your attention to these actions, be open minded when you review the work of others who choose to do so, because we need research of this kind if our work is going to serve the interests of consumers in 2020 and beyond.

I'll conclude by saying that I feel extremely privileged to have served as President of ACR during this particular year. While it wasn't exactly a pleasure to participate in such decisions as the one to abandon our plans for an in-person gathering in Paris, it has been deeply engaging and educational to work with my fellow board members, and with others in the ACR community, to try to make sense of how our Association should be reshaping itself for the years that lie ahead.

Equally, it has been a privilege to have the virtual podium and reflect on how our research might need to evolve. Obviously, the suggestions that I've made are simply my views on how the lessons of 2020 might shape our research going forward. I hope they are inspiring, but not constraining. In that spirit, regardless of what each of us chooses to do next as 2020 recedes in the rear-view mirror, I hope that as scholars and members of the academy, we will remember to be kind to one other.

REFERENCES

Askegaard, Søren, and Jeppe Trolle Linnet. (2011) "Towards an epistemology of consumer culture theory: Phenomenology and the context of context." *Marketing Theory* 11(4) 381-404.

Gopaladas, Ahir and Eileen Fischer. 2012. Beyond Gender: Intersectionality, Culture, and Consumer Behavior. In C. Otnes and L. Tuncay Zayer (eds.), *Gender, Culture and Consumer Behavior*, Psychology Press, 393-410.

2020 ACR Fellows' Addresses

Callings

David Glen Mick, McIntire School of Commerce, University of Virginia, USA

INTRODUCTION

Today I am both delighted and disappointed. Delighted to receive the honor of being named a fellow in our collegial and esteemed Association for Consumer Research. When I began attending ACR conferences in the mid-1980s, I could never have foreseen this day in 2020. I thank you all very much.

But I am also disappointed, because the COVID-19 pandemic has prevented us from convening in person, as originally planned to occur in Paris, the City of Light. Paris is surely one of the most historic, beautiful, romantic, gourmet, and intellectual cities anywhere in the world at any time in the course of human settlement. If you have not yet been to Paris, or if you would like to go again and perhaps stay for a long time, keep in mind what the writer Thomas Gold Appleton once confidently proclaimed. He said that "Good Americans, when they die, go to Paris." Personally, I am equally confident that—regardless of nationality—the same destination is true for all "good consumer researchers" when they pass away.

With Paris and its allure as the backdrop, I want to address today a theme, a yearning, an enigma that we have not before given sufficient attention to. My focus is on Callings. Let me begin by clarifying what I do not mean by Callings. First, I am not pointing to something like a religious conversion or a special leap of religious faith, as when God calls the seeker to a life of spiritual piety. Yet, it is uniquely this sacred kind of Calling that gives the concept its most evocative meanings, even as they apply to something so secular as consumer research. Second, I am not addressing Callings as having to do with vocational choices, such as architecture versus horticulture or education versus business—though it is quite common for people to dedicate themselves to skill development and occupations that reward them greatly. Prior scholarship in management has developed a tripartite model of work orientation that is comprised of jobs, careers, and Callings, in which Callings express our deepest selves in our work (Rosso, Dekas, and Wrzesniewski 2010). For our context today, I will use the notion of Callings as it may apply to specific research projects that you and I conduct, which brings in some factors not as highlighted or as relevant to vocational choices as discussed in the management field.

I will address some central questions about Callings in consumer research, especially what they are, what their value seems to be, and why we should care about them in our professional lives. I want to clarify at the start that not all of our consumer research projects should or could be a Calling. And not everyone who considers my remarks here will have had a research Calling as yet. Moreover, Callings in consumer research can involve either solo or collaborative projects, and they can pertain to a single piece or a stream of manuscripts over a prolonged period. In any case, my principal goal is to excavate the meanings and the implications of consumer research Callings so that together we are better prepared to take advantage of opportunities for research Callings, and to be more fully grateful for those we have already been involved in.

In the course of these comments I will also connect the nature of Callings to two examples from my own work, though not because mine are any more special when compared to anyone else's. They are not. Instead, it is because, in the end, only each of us personally can determine whether any of our own research is a Calling. It is an idiosyncratic, subjective, and private matter. I propose two of my publications as my own Callings in hope that they may offer you some bridges of insights into your own Callings, before-now-or-next.

So, what characterizes consumer research as a Calling? As I enumerate some of the qualities, I will pause momentarily to ask you if a quality that I mention has ever applied to one of your own research projects. Keep also in mind, these qualities I mention need not be all collectively present for a research project to be a Calling. But more is almost always better. In addition, these qualities are like multiple ovals in a Venn diagram, with each quality of a Calling being simultaneously separate, overlapped, and overlapping.

QUALITIES OF RESEARCH CALLINGS

To begin, it is worth asking how the authoritative Oxford English Dictionary (OED) defines a Calling. Naturally, there are many nuances therein, and the religious denotations and connotations of a Calling appear straight-off. Other important meanings of a Calling, for my purposes, include "a meeting," "a requirement of duty," and "the strong impulse to any course of action as the right thing to do."

The strong impulse of a Calling is commonly empowered with passion, but a Calling and a passion are not the same thing. According to the OED, a passion is "an eager outreaching of the mind toward something." Thus, as implied, a passion involves only the individual who has it, originating strictly from within the person's own motives and preferences. In contrast, a Calling—by its grammatical structure and semantic foundation—necessarily implies a second being, a person or entity, that does the beckoning to do the right thing. This beckoning typically comes from something somewhere that many would identify as a "higher authority." In sum, passions are *intra*personal elements that serve to energize and sustain our Callings, whereas Callings involve *extra*-personal elements that draw our attention, direct our priorities, and stimulate our passions.

Moving on now, a Calling is customarily exclusive to each individual, since it often connects to something from one's past, including childhood experiences. My boyhood home had a bookcase, which my mother filled, and invited me to partake of, with volumes of poetry, literature, sociology, and philosophy, even though she herself had never finished high school during the American depression and World War II. I was also raised in the Roman Catholic church at a time when the liturgical language was ancient Latin, where the candles, stained glass windows, and sculptures adorned the walls and alcoves, and where the priests gazed upwards and downwards as they chanted and genuflected. I have wondered how my consumer research, including any of its Callings, has been a manifestation of my upbringing. So, I ask you, have any of your research projects as Callings actually begun when you were still quite young? How so? Callings in research are a lot about who you were already becoming a long time ago.

At its core, a research Calling is also a destiny we have with respect to the given project. It is as if the project has found us, rather than the other way around. And that destiny is something that only we can accomplish in our own manner. Our destiny in that research project is a rich encounter with synchronicity, i.e., we are inevitably

the precise person (or team) for the precise issue at the precise time. And the syncronicity does not just feel timely; paradoxically, it feels equally urgent and timeless. This may sound rather abstract or even pompous at this moment. But I am fairly certain that if you stop right now and recall your top projects, there will be one or more within which you experienced destiny and synchronicity. Take a moment and think back.

Next, a Calling is something we answer for the transcendence through which we channel something beyond ourselves, not for its ability to fortify our self-esteem or reputation. Maybe it is a hugely significant and imposing problem in business strategy, corporate ethics, or public policy. Maybe it is a gaping hole or misunderstanding in our thinking about consumer behavior. Or maybe it concerns the undeniable suffering of people, society, or earth. Have you experienced such transcendence in a research project? Think about that for a moment.

In addition, when we have a Calling in research we comport ourselves knowing that there are no compromises, no shortcuts. With a Calling there is no room for sluggishness or getting half-way and then halting. Is this a research experience that you have had as well? Callings are rarely safe and easy, or otherwise they would be just a whimsical research question and a daydream of publication.

A research Calling is also often experienced as a blend of eagerness, positive emotions, and plasticity. Together these aspects help us see as many proximal and distal insights as possible that could be pertinent to the given topic. Psychology has shown that excitement and curiosity foster mental flexibility and resourcefulness (see, e.g., Frederickson 2013). By being radically receptive, we animate originality in our thinking, our intuitions, our analyzing, our writing, our collaborations, and so on. A research Calling is a passage into multi-layered creativity.

Furthermore, an authentic Calling in research often gives us a new perspective on who we are and who especially we are growing into be. It magnifies and multiplies us. It expands our self-insights into what we are far more fully capable of, if we will just be courageous and welcome all forms of learning. When were you last nourished by new professional and personal understandings because of a research project? It happens, doesn't it?

I have reviewed some key qualities of research Callings and also hinted at how they stir us. And there are more. For one, a research Calling feels as if we are drawn by a potent magnet that we cannot escape from. For another, a research Calling is regularly constituted by psychological flow. Most of us know from Czsiksentmihalyi's (1990) work that flow is characterized by intense concentration on the task, a transformation of time (speeding up and slowing down), a loss of self-conscious rumination, and a purpose of intrinsic reward, among other qualities. Turning now to more specific illustrations, I will share two of my own research Callings, based on what I have experienced.

TWO RESEARCH CALLINGS I HAVE EXPERIENCED

When I was settling in as a newbie doctoral student at Indiana University, I heard a mentioning of its Research Center for Language and Semiotic Studies. Given my background in philosophy and literature, it sounded very intriguing to me, even though I hardly knew at the time how to spell semiotics, let alone describe it. For those who may wonder, semiotics focuses on the metaphysics and pragmatics of communication and meaning, using an array of concepts such as signifiers, icons, indices, symbols, interpretants, abductive reasoning, and many others. At that time I was enrolled in my first seminar on consumer behavior and I was tasked with producing a paper as part of the course requirements. In short order I was encouraged by my senior professor—Richard Olshavsky—to go over to the semiotics studies center and check it out. Once I met its academic leaders and began reading about semiotics, I felt remarkably invigorated, but also overwhelmed by its technical verbiage and its scope. One stage of learning catapulted me to another and then another. I lost myself for hours in an enchanting labyrinth of readings, note-takings, re-readings, and more note-takings.

A few weeks later I handed in my exploratory paper on how semiotics might advance consumer research. Fortunate for me, Professor Olshavsky liked the paper. In fact, when I mentioned submitting it for a conference presentation, he roundly objected and told me I should send it to the *Journal of Consumer Research*. I was stunned. How could I ever measure up to this senior professor and to a leading journal at such a neophyte stage of my academic career? But I trusted his judgment, and I spent the next 12 months re-vising the paper over and over.

Eventually, I submitted the paper to *JCR*, and then a few weeks later its co-editor, Hal Kassarjian, sent the reviews and his decision letter—flooring me as well as my professor. The paper was accepted for publication after just the first round of reviews (Mick 1986). Yes, you heard that right, and I still can scarcely believe it. But I must quickly assure you that in the ensuing years of my entire research career I never came close to that rare outcome again. In fact, the very next paper I submitted to *JCR* was summarily rejected on first round. Welcome to the humility club!

When I look back, even though I did not know it at the time, I think my success with the semiotics paper was due to several qualities of research Callings being present. First, it was a perfectly serendipitous situation how semiotics came upon me and exerted its charisma. Secondly, as the project progressed, I became increasingly determined to dedicate only my strongest effort, including innumerable hours combing through the library stacks. Thirdly, the intensive thinking and writing about such a byzantine topic as meaning were richly nutritive to my intellectual development. Finally, and not to be dismissed, I remember having lots of fun throughout the project.

In another instance—this one recently during the closing years of my career—I took up a research Calling that had been reverberating in me for a long time. It involved a topic that had been profoundly important to me since shortly after I graduated with my undergraduate degree in the mid-1970s. I was in a bookstore one day, perusing the philosophy section as I regularly did, and I came upon some paperback books by an author I had not heard of before, namely, Alan Watts. As some of you may know, Watts was a young man in the 1930s when he became one of the first Westerners to travel to Asia to study Buddhism and other Eastern philosophies. He then returned to the West and began writing accessible and engaging books like *The Spirit of Zen* (1936), *The Meaning of Happiness* (1940), and *The Wisdom of Insecurity* (1951). As for myself, I had been raised in a conservative blue-collar American setting, including my thorough envelopment in Roman Catholicism. As I read several of Watt's books, I felt as though someone was taking hold of my head and cranking it 180 degrees, and then slapping me in the face a few times for final good measure. I would never be the same again.

Over the next 40-plus years I built up a large personal library on Buddhism, which I continue to revere and seek guidance from. Buddhism's foundations include the Four Noble Truths and its central concepts in the Pali language include (1) *dukkha* and *samsara* (which are the nature and cycles of unsatisfactoriness in daily life), (2) the cause of unsatisfactoriness, *tanha* (which means clinging and attaching), (3) *annica* (which signifies the impermanence of everything), and (4) *annata* (which means there is no distinct ego or sepa-

rate self). Such Buddhist precepts have been in the forefront of my life for a long time now.

As I moved through my academic career I kept reading, meditating, thinking, and note-taking about Buddhism. I also kept pondering whether I would ever have the courage, ability, and commitment to write a conceptual paper about Buddhism and consumer behavior, particularly since our field was historically engrained in the modernist paradigm of the Western social sciences. I spent much time asking myself, why do you want to write this paper? The proposition felt quite risky. No one in our field except Steve Gould (e.g., 1991) had written in-depth about Buddhism, and yet too there was so much more to say. Finally, I told myself: if you start this project, do it for the joy as well as the potential spiritual maturation; do not base the effort on how much the field might admire it or you.

In time I submitted the paper, and it was rejected on first round. Then it languished for another few years, until I felt drawn again to do what I knew I had to do—revise and submit to another journal. I did so, with much assistance from several Buddhist scholars I had come to know at the University of Virginia. One of them, David Germano, invited me during that same period to accompany him on a two-week trip to Tibet, including its capital, Lhasa. Needless to say, it was one of the most enthralling, humbling, and eventful trips of my life. I came back with new resolve and resilience for facing the Buddhism paper. Ultimately, I submitted again and eventually it found a home in the *Journal of Consumer Psychology* (Mick 2017). In this paper I sought to reveal how Buddhism can question, qualify, or extend such familiar topics as materialism, ownership, self-identity, expectations, and judgments.

So, why was this project a research Calling for me? Among other aspects, it felt preordained, inspirational, daring, boundless, and wholly apropos in terms of my personal background. It was a truly opportune and fulfilling challenge for me at that time, as if I had little or no choice but to accept it.

Can Research Callings Be Cultivated?

I think the answer is a qualified yes. Most often a research Calling must first approach us. However, there are certainly some things we can do ourselves to potentiate research Callings. Although I speak figuratively, I would say first: listen to what Saint Benedict called "the ear of the heart," particularly as to what in the realm of consumer behavior matters most to you, and reflect on why. Also, ask yourself: what subject matter in consumer behavior and consumer research can you not stop thinking about? Deliberate on this also: if you had only enough life left for one more audacious research project in your career—and no more—what would it be, and why? Or alternatively: if you had all the time, money, and talent you could ask for, what new research topic would you embrace, and why? And lastly, ask yourself: what topic in consumer research have you avoided so far that actually intimidates the hell out of you, and would force you to grow in astonishing ways, and why? Perhaps one of these suggestions or questions can help you discover your next research Calling.

CONCLUSION

Ralph Waldo Emerson—the American Transcendentalist philosopher—once asserted that "Nothing great was ever achieved without enthusiasm." I admire many of Emerson's insights, but in this one he's told only part of the story. From my perspective, to achieve something that is not only great, but also valiant, enduring, venerable, and awakening, it must be a Calling. I hope my related remarks have convinced you that research Callings are distinctive, real, and worth pursuing.

So, in closing, I could wish you perpetual publications, I could wish you copious citations to your work, and I could wish you noteworthy research awards. Really, what I wish you are research Callings. If together we answer those Callings well, I think we will be emphatically good—probably better—consumer researchers. Then, when we die, we will all go to Paris.

REFERENCES

Csikszentmihalyi, Mihaly (1990), *Flow: The Psychology of Optimal Experience*, New York: Harper and Row.

Fredrickson, Barbara L. (2013), "Positive Emotions Broaden and Build." *Advances in Experimental Social Psychology*, 47, 1-53.

Gould, Stephen. J. (1991), "An Asian Approach to the Understanding of Consumer Energy, Drives, and States", *Research in Consumer Behavior*, (5), 33-59.

Mick, David Glen (1986), "Consumer Research and Semiotics: Exploring the Morphology of Signs, Symbols, and Significance," *Journal of Consumer Research*, 13 (2), 196-213.

Mick, David Glen (2017), "Buddhist Psychology: Selected Insights, Benefits, and Research Agenda for Consumer Psychology," *Journal of Consumer Psychology*, 27 (1), 117-132.

Rosso, Brent D., Kathryn H. Dekas, and Amy Wrzesniewski (2010), "On the Meaning of Work: A Theoretical Integration and Review," *Research in Organizational Behavior*, 30, 91-127.

Watts, Alan (1940), *The Meaning of Happiness: The Quest for Freedom of the Spirit in Modern Psychology and the Wisdom of the East*, New York: Harper & Row.

Watts, Alan (1951), *The Wisdom of Insecurity: A Message for an Age of Anxiety*, New York: Pantheon Books.

Watts, Alan (1957), *The Way of Zen*, New York: Pantheon Books.

2020 ACR Fellows' Addresses

Helping Consumers Consume (Well)

Marsha L. Richins, University of Missouri, USA

I am so grateful to be receiving this honor today. And beyond that, I feel immense gratitude for the career that consumer behavior scholarship has provided me. I've had a lifetime of pursuing challenging questions, meeting interesting people, and working with phenomenal students.

Consumer behavior has been a fascinating field to study, and my views of consumer behavior scholarship have been strongly influenced by my early life experiences. I grew up in an era when marketing was looked upon with some distaste. Popular books and the writings of influential social scientists, had created a sense among the public that marketing is exploitive and manipulative. And there were no countering voices to explain the positive impacts that business and our economic system (more generally) have on society.

My first years in graduate school were as a social psychologist, because I have always wanted to know why people are the way they are. There, I learned a lot about human nature--through my academic experiences, and through a social life that would have horrified my parents if they had only known.

Yet, in graduate school, I also developed concerns about the somewhat artificial nature of social psychology research, as it was practiced at that time, and when the only professor in my department who was researching more pragmatic topics left for another university, I too left and began instead to study consumer behavior. One of the psychology faculty members reacted bitterly to my change of plans. He told me I was betraying my social conscience and never spoke to me again.

Those early experiences have colored how I approach the study of consumer behavior. Through research, I have tried to better understand why consumers buy what they do and why they buy so much. But now, looking over my past decades as a consumer behavior scholar, and at the extant body of consumer behavior literature, I've come to realize how little we know about consumption itself and how much more we need to learn.

I have spent nearly all of my academic career examining consumption. In graduate school and my first years as a professor, I studied product satisfaction and how consumers give voice to dissatisfaction. Later on, I studied the emotions evoked by consumption, the transformations consumers hope to achieve with their purchases, and (most extensively) the nature and correlates of consumer materialism.

Materialism has a bad reputation, with many negative correlates that have been identified in research. However, contrary to what some might think (and contrary to accusations occasionally leveled at my work by reviewers), I am not anti-consumption; in fact, I am very pro-consumption.

THE ESSENTIAL IMPORTANCE OF CONSUMPTION

In all these years of research I have been reminded, again and again, of the essential importance of consumption to our lives. Consumption is not the actual heart of our existence, but it's pretty close to the heart—maybe the lungs or the digestive tract. Consumption is an essential support system that allows us to live and thrive.

Consumption allows us to reach some of our most cherished life goals: to stay alive and be healthy, to be safe and connected to others, and to help our children flourish. It can help us reach the heights of joy, celebrate important milestones, and communicate who we are or want to be.

We consume food, clothing, medical services, and education. We buy gifts to solidify relationships and flowers to celebrate our weddings. We spend hours shopping for the perfect job interview outfit or choosing a tent for a camping trip. We buy sunglasses, cars, espresso machines, exercise equipment, and toys for our kids. The list is almost endless. And each of these purchases is made to meet a need that seems essential, and with the hope that the purchase will improve our lives in some way or the lives of the people we love: that the new suit will help us land a job, that the family campout enabled by the new tent will bring joy to our kids and create happy memories, and that a more reliable car will reduce the number of expensive, annoying trips to the mechanic.

Consumption provides endless possibilities and an infinite number of ways to improve our well-being, our efficiency in carrying out life tasks, our relationships with others, and the amount of pleasure we experience. The possibility of future consumption gives us hope. If I buy a bigger house, my kids will squabble less. A better tennis racquet might improve the accuracy of my serve just a little. If I had an instant pot, cooking dinner would be easier and dinnertime less frazzled. We expect consumption to transform our lives, and often times it does.

LIMITATIONS ON CONSUMPTION

Many people, however, have severe limitations on their ability to consume, making it difficult for them to obtain many of the goods and services that can enrich our lives. Some are limited by their low incomes. Almost 12% of the population in the United States lives in poverty (Semega et al. 2019). That's more than 38 million people living on annual incomes less than $26,000 for a family of four. Another 55 million people have less than $37,500 per household (Bennet, Fry, and Kochhar 2020; Parker, Horowith, and Brown 2020). Even before COVID-19, which resulted in job losses or wage cuts in many households, one in four adults reported that they can't pay some of their bills or can only make a partial payment on them in a typical month (Parker et al. 2020).

Other people's ability to consume is limited by high debt loads that prevent them from purchasing what they need and want. The statistics on consumer debt are sobering. For example, and this is before COVID-19, the average debt load for an adult between the ages of 24 and 39 was more than $78,000 per person, an increase of 58% since 2015 (Stolba 2020). This has only gotten worse in recent months as people have lost income and employment. In terms of credit card debt, nearly half of adults say they carry credit card debt from month-to-month (National Foundation for Credit Counseling 2020), and the average balance carried forward is nearly $7,000 (Issa, 2019). Ten percent say it will take them longer than 10 years to pay it off this debt (Issa 2019).

In addition to these problems of low income and debt, consumers are experience unforeseen calamities that tax their resources and limit their ability to consume. Layoffs, health problems, unplanned pregnancies, and car breakdowns occur at unpredictable times and can completely overwhelm a family without financial reserves. More

than half of households don't have savings that could cover their expenses for three months (Parker et al. 2020; FINRA Investor Education Foundation 2018) and about 30% would not be able to come up with $2,000 to cover an emergency (FINRA Investor Education Foundation 2018).

Going back to my original point: consumption is highly important—it is our lungs or digestive system, without which we could not live. But the ability to consume is fragile among American consumers and severely restricted, at best, for many.

CONSUMPTION INEFFICIENCY

And even when people are able to consume, they often are not very good at it. This is true across all income levels. I will describe three examples of consumer inefficiency, although there surely are more.

First, buyer's remorse and purchase regret are so common that there are hundreds of websites on these topics. One study found that 67% of consumers had more than one purchase within the last year that they later wished they hadn't. The study further estimated that between 2 and 10% of consumers' annual spending is on regretted purchases (Skelton and Allwood 2017). As another example, the *Consumer Reports* annual survey of car owners repeatedly finds low satisfaction for some commonly purchased cars, some of which are quite expensive, another indicator of suboptimal purchasing. Every unsatisfactory purchase is a waste of consumers' limited resources.

Second, even initially satisfying purchases often lose their luster, leaving their owners unsatisfied and looking to buy something new to reclaim the pleasure associated with the initial purchase (Richins 2013). This is the hedonic treadmill of consumption (Chancellor and Lyubomirsky 2011), and consumers who live on this treadmill are using their resources in ways that don't provide lasting satisfaction.

Third, we buy too much. Alana Semuels (2018), in an arresting article in *The Atlantic*, describes how consumers fall into the easy trap of buying things on Amazon—just a click away at any time of the day or night, and with free shipping. Amazon boxes pile up unopened, or when opened reveal a forgotten purchase that's not wanted anymore. On average, consumers purchase 68 garments every year (American Apparel & Footwear Association 2019) and 8 pairs of shoes (Sapun 2019), many of which are worn only a few times and then are no longer needed or wanted.

CONSUMER SCHOLARS CAN HELP

So, we see that consumers of all income levels could use some help in finding ways to consume more effectively. We, as consumer scholars, are uniquely positioned to provide this help through our research. There are several directions this scholarship could take.

First, we could study how people can achieve desired life improvements by consumption acts that don't involve purchases. Consumers buy products to improve their lives, or the lives of the people they love, in some way. Most improvements that people hope for fall into these main categories: to have more enjoyment in life, to have better relationships with others, to be more effective in daily tasks, and to increase their worth in the eyes of others (Richins 2011; see also Holbrook 1999). While it can be easy to rely on goods to provide these life changes, and advertising constantly encourages us to do so, the fact is that improvements in each of these areas can often be achieved at little or no monetary cost.

Voluntary simplicity movements throughout history have encouraged people to meet their needs with non-purchased consumption, and consumer scholars have occasionally examined consumption downshifting (Etzioni 1998; Shaw and Newholm 2002). But we tend to view such behavior as an anomaly and usually through the lens of ethical issues or sustainability. That is all well and good, but in terms of improving people's consumption effectiveness, we could undertake rigorous studies that examine how non-purchased consumption can meet people's needs and enhance their lives. We can conduct research that finds ways to help consumers understand the value of non-purchased consumption so that when they notice a life deficit, their first impulse is not to run out and buy something.

People with severely restricted financial resources are already adept at doing without, but a large percentage of the population would benefit from learning to live with less, before a crisis strikes. Given the vulnerability of such a large percentage of the population to calamities such as COVID, recessions, and layoffs due to technological change, research that helps consumers learn to live with less, without diminishing their quality of life, would be valuable to many consumers. And it is also worth noting that buying things to achieve life improvements often fails. If our purchases actually provided the benefits we hope for, we wouldn't keep buying so many things and would step off the hedonic treadmill.

A second way scholars can help people improve their consumption effectiveness is to delve more deeply into the causes of dissatisfaction and regret that often follow the purchase of goods and identify ways these negative outcomes can more often be avoided. While there are extensive literatures on regret and satisfaction (e.g., Pieters and Zeelenberg 2007; Szymanski and Henard 2001), few studies have tried to discover how consumers can avoid making regretted purchases in the first place. Although we've learned that realistic expectations are important in creating satisfaction, we haven't much studied how to help consumers develop more realistic expectations, especially in light of commercial media that continually promise that we can transform our lives with the products they advertise.

In a similar vein, encouraging people to think more deeply before purchase may reduce dissatisfaction and regret, and research should address this possibility. There seems to be some optimal level of search and contemplation before a purchase. Too much search and agonizing over a decision can raise expectations and increase the chance of dissatisfaction. Too little thought and too much impulsiveness can result in purchases that are used once or twice and then forgotten.

In my own research, I often ask people to think about a product they hope to buy and then to complete a transformation expectations measure. In this measure, participants indicate how likely it is that having the desired product will result in a variety specific life changes. It's about 15 items long. At the end of every survey, I have a space for people to make any comments they'd like about the study they just completed. A surprising number of times, participants have used that space to say something along the lines of "Now that I've completed this survey and thought about it, I don't think I really need to buy that item after all." Less often, I get the opposite comment, that after answering those questions the participant now really, really wants to buy the item they described. Either way, the activity of thinking about transformation expectations has made those study participants more informed and thoughtful consumers and perhaps enhanced their consumption effectiveness in some way at one point in time.

A third way scholars can contribute to people's consumption effectiveness is to study the portfolio of goods and services people consume and the association of this portfolio to well-being. In 1957, Wroe Alderson introduced the concept of potency of assortment. Consumers purchase an assortment of goods and services, and additions to this assortment are made to increase or maintain assortment potency—potency being the assortment's ability to meet the consumer's present and future needs. Despite the potential richness

of this construct, it has spawned almost no empirical work among scholars (see, however, Solomon's 1991 work on consumption constellations associated with consumer roles).

Investigation of the potency-of-assortment construct holds enormous potential for increasing the effectiveness of consumption and for the study of consumer well-being. A large number of research opportunities present themselves, but the essential question is: what assortment of goods and services, and at what rates of consumption, yield the greatest satisfactions to consumers? Because consumers are a heterogeneous lot, one assortment will not serve all consumers equally well. Perhaps there are clusters or segments of consumers who will benefit from different assortments. Or perhaps assortment potency for individual consumers can be tied to personal characteristics, whether they be demographic, stage of family life cycle, personality characteristics, or other individual differences. Most importantly for lower income consumers, portfolio potency can be linked to financial resource levels to help consumers obtain as much satisfaction from their consumption choices as their resources allow.

This topic calls to mind the extensive body of literature investigating whether experiences or purchased goods result in greater satisfaction or well-being. There are many articles on this topic, generally concluding that the consumption of experiences is more satisfying than the consumption of goods, but much greater depth in this literature is needed. All experiences are not equal and all goods are not equal in affecting well-being, and survival requires that we purchase some of each. A more interesting approach is to examine which goods and which experiences lead to greater well-being and under what circumstances, and to examine the optimal balance between experiences and goods in a consumer's personal consumption assortment.

CHALLENGES

The areas of inquiry I've suggested present hard problems. They are not easy topics to investigate, and they pose difficult conceptual and methodological challenges. But consumer behavior researchers have amazing talent. Scholars in our field are creative and have the ability to create path-breaking research. And I'm greatly impressed when I see the skills and insights that young consumer behavior faculty possess. They are brimming with ideas and devotion to scholarship. I hope some of these talented young scholars, along with more seasoned researchers, will turn their attention to some of the difficult questions posed here.

The research topics I describe argue for less, but more effective, consumption, and I realize that this runs counter to the interests of business at large. While firms strive to satisfy consumers and improve people's lives with the products they produce, the basic fact is that companies want to increase their sales, which occurs when people consume more.

To carry out such research, then, might seem slightly inappropriate to the many of us who are located in colleges of business. A dean once mildly chided me for doing "anti-consumption" materialism research, reminding me that business donors provide valuable support to the college. Indeed, as time passed and I realized how starkly my research contrasts with the more business-oriented work of other faculty members in my college, I have often asked myself the question: to whom do I, as a consumer behavior scholar, owe my research allegiance? Is it to businesses? To consumers? To society at large?

While my dean was absolutely correct in noting the value of business interests to my college, I gradually came to realize that there are also larger considerations. I think about who pays my salary. I think about the cost of providing electricity to campus buildings, of operating computing facilities, mowing the lawns, and providing the host of other services that allow a university to operate. I'm employed by a public university, and these costs are borne primarily by taxpayers and by student tuition, with additional bits of support from businesses. I'm grateful to firms for making my college a better place and providing employment opportunities to our students. But I also owe an obligation to the larger society that allows my university to operate.

And, to be honest, companies don't need the help of consumer scholars to thrive. They don't need us to help them understand consumers and to better market their products. They're already doing a great job of this and are already adept at increasing consumer desire for what they sell. Corporations have professionals that advise them on optimal resource allocation to ensure their success. But consumers are in it alone, with no in-house experts to help them effectively allocate their consumption resources, and they often do it poorly.

We as consumer scholars are uniquely positioned to help people improve their quality of life through effective consumption. And I hope that some of you with bright young minds, and those with mature and thoughtful minds, who are listening today will consider ways that you can improve the quality of consumption for all consumers, but especially for those with limited resources and in precarious financial situations.

REFERENCES

Alderson, Wroe (1957), *Marketing Behavior and Executive Action*, Homewood, IL: Richard D. Irwin.

American Apparel & Footwear Association (2019), AAFA Industry Stats 2019, https://www.aafaglobal.org/AAFA/Media.aspx.

Bennet, Jesse, Richard Fry, and Rakesh Kochhar (2020), FactTank News in the Numbers, Pew Research Center, https://www.pewresearch.org/fact-tank/2020/07/23/are-you-in-the-american-middle-class/.

Chancellor, Joseph and Sonja Lyubomirsky (2011), "Happiness and Thrift: When (Spending) Less Is (Hedonically) More," *Journal of Consumer Psychology*, 21 (April), 131–38.

Etzioni, Amitai (1998), "Voluntary simplicity: Characterization, Select Psychological Implications, and Societal Consequences," *Journal of Economic Psychology*, 19, 619-43.

FINRA Investor Education Foundation (2018), National Financial Capability Study, https://www.usfinancialcapability.org/about.php.

Holbrook, Morris B. (1999) *Consumer Value. A Framework for Analysis and Research*, London: Routledge.

Issa, Erin (2019), 2019 American Household Credit Card Debt Study, Nerdwallet, https://www.nerdwallet.com/blog/average-credit-card-debt-household/.

National Foundation for Credit Counseling (2020), 2020 Annual Financial Literacy Survey, https://www.nfcc.org/resources/client-impact-and-research/2020-consumer-financial-literacy-survey/.

Parker, Kim, Juliana Mensasce Horowit, and Anna Brown (2020), The American Trends Panel Survey Methodology, Pew Research Center, https://www.pewresearch.org/fact-tank/2020/07/23/are-you-in-the-american-middle-class/.

Pieters, Rik and Marcel Zeelenberg (2007), "A Theory of Regret Regulation 1.1," *Journal of Consumer Psychology*, 17 (1), 29-35.

Pollay, Richard W. (1986), "The Distorted Mirror: Reflections on the Unintended Consequences of Advertising," *Journal of Marketing*, 50 (2), 18-36.

Richins, Marsha L. (2011), "Materialism, Transformation Expectations, and Spending: Implications for Credit Use," *Journal of Public Policy & Marketing*, 30 (2), 141-56.

Richins, Marsha L. (2013), "When Wanting Is Better Than Having: Materialism, Transformation Expectations, and Product-Evoked Emotions in the Purchase Process," *Journal of Consumer Research*, 40 (1), 1-18.

Sapen, Petar (2019), Per-capita Volume Sales in the Footwear Market Worldwide, Statista, (https://www.statista.com/forecasts/758735/per-capita-volume-sales-in-the-footwear-market-worldwide-by-country.

Semega, Jessica, Melissa Kollar, John Creamer, and Abinash Mohanty (2019), "Income and Poverty in the United States: 2018," United States Census Bureau, https://www.census.gov/library/publications/2019/demo/p60-266.html.

Semuels, Alana (2018), "We Are All Accumulating Mountains of Things," *The Atlantic*, August 21, https://www.theatlantic.com/technology/archive/2018/08/online-shopping-and-accumulation-of-junk/567985/.

Shaw, Dierdre and Terry Newholm (2002), "Voluntary Simplicity and the Ethics of Consumption," *Psychology & Marketing*, 19(2), 167-85.

Skelton, Alexandra C. H. and Julian M. Allwood (2017), "Questioning Demand: A Study of Regretted Purchases in Great Britain," *Ecological Economics*, 131, 499-509.

Solomon, Michael R. and Bruce Buchanan (1991), "A Role-Theoretic Approach to Product Symbolism: Mapping a Consumption Constellation," *Journal of Business Research*, 22 (2), 95-109.

Stolba, Stefan Lembo (2020), Debt Reaches New Highs in 2019, but Credit Scores Stay Strong, Experian, https://www.experian.com/blogs/ask-experian/research/consumer-debt-study/.

Szymanski, David M. and David H. Henard (2001), "Customer Satisfaction: A Meta-Analysis of the Empirical Evidence," *Journal of the Academy of Marketing Science*, 29 (1), 16-35.

Competitive Papers—Full

Analytical Framework For Construal Level Theory That Incorporates Discounting

Makoto Abe, The University of Tokyo, Japan
Mitsuru Kaneko, Kyoto Women's University, Japan

INTRODUCTION

Almost everyone would have "procrastinated"—for example, in the context of dieting, quitting smoking, or doing homework. And, "pre-wedding blues" is another example of preference reversal. In the planning stages, a wedding seems to be a desirable event. However, as the wedding date approaches, there might be some hesitancy about getting married. This is because despite the promise of a desirable large gain in the distant future, people often tend to prefer earning a comparatively minor gain in the immediate future.

In behavioral decision theory (BDT), this phenomenon is often explained with "hyperbolic discounting" over time (Ainslie and Haslam 1992; Frederick, Loewenstein, and O'Donoghue 2002; Laibson 1997). However, the conventional properties of discounting cannot explain "pre-wedding blues" type of preference reversal. One approach to this challenge is to use more complicated discounting models. However, this approach arouses criticisms and complications. First, it is problematic that different discount functions produce different predictions of preference and behavior (Loewenstein and Prelec 1992; Rubinstein 2003). Second, its rigorous modeling can be quite complex because of various cognitive and emotional mechanisms in human behavior (Frederick et al. 2002; Zauberman et al. 2009).

To overcome these challenges, by incorporating the concept of "discounting" into construal level theory (CLT), we formulate our framework with three propositions. They are then validated through empirical study. Our framework can explain the insoluble "pre-wedding blues" type preference reversal in a simple manner.

LITERATURE REVIEW

Discounting

Prior research has shown three well-known properties of "discounting over time" (Benzion, Rapoport, and, Yagil 1989; Loewenstein 1987; Thaler 1981).

Invalidity of exponential discounting

A discount rate is not constant: it decreases rapidly at first and more gradually later.

Magnitude effect

A discount rate is larger for a small amount of money than for a large amount.

Sign effect

A discount rate is larger for a gain than for a loss.

Unfortunately, these properties alone cannot explain certain preference reversals such as "pre-wedding blues". One decided to marry one year later because the merit of getting married (gain) exceeded the cost of various nuisances (loss). The sign effect implies that, if the gain exceeds the loss one year before marriage, the gain will be even greater than the loss on the wedding day due to greater discounting for a gain than for a loss. This is the case whether the discount function is exponential or hyperbolic. Therefore, a standard discounting model fails to explain "pre-wedding blues."

Construal Level Theory

An alternative approach to preference reversal uses CLT (Trope, Liberman, and Wakslak 2007). CLT posits that when the psychological distance is long, people mentally construe the object as being at a higher level in terms of primary, abstract, and decontextualized features. In contrast, when the distance is short, they construe the same object as being at a lower level in terms of secondary, concrete, and contextualized characteristics. Such differences in mental construal lead to different evaluations and behaviors, and thus, preference reversal over distance. Pre-wedding blue occurs because when the marriage is far (long distance), its merit (high construal) is stimulated, whereas its nuisance (low construal) is stimulated when the wedding is near (short distance).

Psychological distance applies not only to temporal, but also to social, spatial, and hypothetical distances (Fiedler 2007). Therefore, one advantage of introducing CLT is the ability to explain preference reversal along a dimension beyond time.

PROPOSITIONS

Explanations of preference reversal that feature discounting are clear and persuasive, whereas CLT can deal with preference reversal along dimensions other than time. We combine the advantages of these two approaches to explain a wider range of preference reversals with simplicity.

Magnitude Effect

Let us consider how the discount rate changes owing to changes in construal levels. One theory on affect-dependent time discounting posits affective-based value undergoes steeper time discounting than does cognitive-based value (Loewenstein 1996; Metcalfe and Mischel 1999; Mischel, Shoda, and Rodriguez 1989). And, Conflict theory (Lewin 1951; Miller 1944) assumes the means of achieving a goal undergoes steeper time discounting than does the merit of the goal itself. Trope and Liberman (2003) state that cognitive attributes, merit obtained from a goal, and the outcome itself stimulate higher-level construals, whereas affective attributes, means of achieving a goal, and waiting time promote lower-level construals. These studies suggest a negative relationship exists between the construal level and the discount rate, leading to the following proposition.

Proposition 1: Magnitude Effect

The discount rate varies depending on the construal level: the higher the construal level, the smaller the discount rate.

Sign Effect

Previous studies found that the discount rate is higher for gain than for loss (Benzion et al. 1989; Loewenstein 1987; Thaler 1981). Following the past research, our second proposition concerns this sign effect.

Proposition 2: Sign Effect

The discount rate is larger for gain than for loss.

From Propositions 1 and 2, the discount rates d(•,•) for different construal levels and signs can be ordered as follows.

d(high construal, loss)<{d(high construal, gain), d(low construal, loss)}<d(low construal, gain)

Because the order between *d(high construal, gain)* and *d(low construal, loss)* depends on the relative strength of the magnitude and sign effects, they are enclosed in {} without explicit ordering. Figure 1 clarifies how the values change with distance for high-level and low-level construals and for gain and loss.
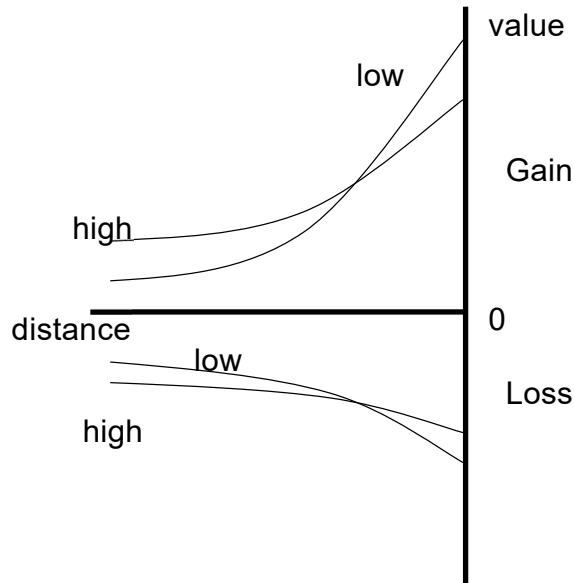
Figure 1: Discounting implied by the magnitude and sign effects

A discount rate increases with the following order.
d(high construal, loss) <{d(high construal, gain),*d*(low construal, loss)}< *d*(low construal, gain)

Generalization of Distance

In BDT, the distance is strictly time-based, whereas, our framework can be applied to various psychological distances, including that of time.

Proposition 3: Generalization of Distance

"Discounting" applies to psychological distances, including time.

IMPLICATIONS

Our framework adapts the concept of discounting into CLT, and posits the sign effect and the magnitude effect. Note that, in BDT, magnitude corresponds to the amount of money or utility, whereas in our proposition, it corresponds to the level of construal.

According to the magnitude effect, as one comes closer to experiencing an event, the relative weight of the construals used for evaluation shifts from high to low levels. If the event is a product purchase, various product attributes can stimulate construals of various levels. For example, in Study 3 of Trope and Liberman (2000), using a radio with a built-in clock, subjects were manipulated such that the sound-fidelity attribute prompted a high-level construal, whereas the clock-quality attribute aroused a low-level construal. In an evaluation of gambles, Sagristano, Trope, and Liberman (2002) confirmed from four psychological experiments that a prize-amount attribute prompts a high-level construal, whereas a winning-probability attribute arouses a low-level construal.

By focusing the input and output of CLT, our framework bypasses the complicated and arguably controversial inner mechanism/process of human perception (Trope et al. 2003). Our propositions allow us to predict more easily how preferences would shift as distance varies, thus providing a useful analytical framework for pragmatic applications (Salisbury and Feinberg 2010). The advantages are summarized as follows.

a. Our framework can explain preference reversal along dimensions other than time.
b. When the distance is limited to time and the construal level is limited to a monetary amount, our framework coincides with ordinary "discounting" in BDT, and thus possesses the magnitude and sign effects.
c. When different levels (especially more than two levels) of construal exist and they are related either to gains or losses, our framework can explain and predict with simplicity how evaluation, preference, and behavior change as psychological distances vary.
d. The functional form of discounting, such as exponential or hyperbolic, need not be specified.

EMPIRICAL STUDY

To test the three propositions, we conduct a survey and collect data on how people's choice change with psychological distance. 416 students from a large university and 416 participants from online panel at a marketing research firm take part in the survey.

The survey asks participants to choose one of two lotteries with the same expected return: one with a higher prize amount and the other with a higher winning probability. We selected a lottery because previous research found that, in lottery choices, the prize amount and the winning probability leads to a high- and low-level construal, respectively (Sagristano et al. 2002; Trope et al. 2007).

We choose social and temporal distances as psychological distance. Social distance is manipulated through a lottery that is purchased either for oneself (short distance) or for a prize at a party (long distance). Temporal distance is manipulated through a lottery whose outcome is known either the next day (short distance) or one month in the future (long distance).

Magnitude Effect and Generalization of Distance

First, we test the magnitude effect (Proposition 1) and generalization of distance (Proposition 3). We compare the proportion of respondents who chose Lottery A (prize amount = $500, winning probability = 2%) vs Lottery B (prize amount = $100, winning probability = 10%) between distances within subject. The result summarized in Panel A of Table 1 shows that for both social and time distances, in both samples, as the distance becomes shorter, the respondents' preference shifts from Lottery A (high-level construal) to Lottery B (low-level construal). A paired McNemar test confirms that the proportion of respondents valuing a prize amount (high-level construal) over a winning probability (low-level construal) varies by distance at the 1% significance level. The exception is the case with a time distance for the web sample, which is supported at the 10% significance level. Therefore, the result supports Propositions 1 and 3.

Additional Evidence for the Magnitude Effect

To strengthen the first result, we scrutinize the magnitude effect (Proposition 1) under two scenarios of gain and loss. Here we investigate whether, with respect to deviation from a reference point, individuals place relatively more weight on a high-level construal than on a low-level construal when the distance is long, and vice versa.

Table 1: The Result of Studies

Panel A								
Distance		Student Sample				Web Sample		
		N	choice of A	p		N	choice of A	p
Social	Long	211	55.0%	<.001		208	37.0%	.010
	Short		35.1%				26.4%	
Time	Long	205	48.3%	<.001		208	31.3%	.078
	Short		30.2%				26.9%	

Panel B									
Distance & Frame			Student Sample				Web Sample		
			N	choice of A / C	p		N	choice of A / C	p
Social	Gain	Long	205	62.9%	.002		208	47.6%	.046
		Short		46.8%				39.4%	
	Loss	Long		63.9%	.017			54.3%	.033
		Short		53.2%				46.2%	
Time	Gain	Long	211	51.7%	.193		208	47.1%	.430
		Short		46.9%				44.2%	
	Loss	Long		57.3%	.557			50.0%	1.000
		Short		55.5%				50.5%	

Panel C									
Distance	Switch From	N	% of switch	χ^2		N	% of switch	χ^2	
Social	A	44	56.8%	.004		34	47.1%	.001	
	B	59	27.1%			70	12.9%		
Time	A	39	53.8%	<.001		33	21.2%	.017	
	B	57	15.8%			71	4.2%		

In survey, each respondent is asked to imagine buying Lottery R (prize amount = $500, winning probability = 2%); this creates a reference point in his/her mind. Under the gain scenario, due to a special campaign of double the expected return, Lottery A (prize amount = $1000, winning probability = 2%) and Lottery B (prize amount = $500, winning probability = 4%) are available, whereby the gain is from doubling the prize amount and the winning probability, respectively. Then, respondents are asked to choose Lottery A or B.

Under the loss scenario of half the expected return, Lottery R was sold out on account of its limited quantity; for the same price,

Lottery C (prize amount = $500, winning probability = 1%) and D (prize amount = $250, winning probability = 2%) are available, whereby the loss is from halving the winning probability and the prize amount, respectively. Then, respondents are asked to choose Lottery C or D.

Comparison of the two value functions, high and low, in Figure 1 predicts preference shift from A (high) to B (low) for gain and C (low) to D (high) for loss, respectively, as distance becomes close. The result of a paired McNemar test (Panel B) confirms that, for social distances, as the distance shortens, the respondents' prefer-

ences shift from A to B and from C to D, in both samples at the 5% level. For the case of a time distance, however, the test results are not significant although the directions are correct. Here, under both gain and loss scenarios, we find that for a social distance, the respondents' construal level is higher when the distance is long, and vice versa. The result supports the magnitude effect (Proposition 1), but only for a social distance.

Sign Effect

Secondly, we test the sign effect (Proposition 2). A respondent is first asked to choose one lottery from Lottery A (prize amount = $500, winning probability = 2%) and Lottery B (prize amount = $100, winning probability = 10%) under a long distance. The survey then asks whether he/she would switch from his/her initial choice as the distance becomes short.

A switch from Lottery A to Lottery B trades off the loss in a high-level construal (prize amount) over the gain in a low-level construal (winning probability). The sum of this loss and gain represents the net value of switching to Lottery B. For those respondents who chose Lottery A initially when the distance was long, this net value was negative. However, due to the difference in discount rates—$d(low\ construal, gain) > d(high\ construal, loss)$ —the net value increases rapidly as the distance becomes shorter. When the net value turns positive, preference reversal to Lottery B occurs. In Figure 1, this situation corresponds to summing two value functions, [low; gain] and [high; loss].

Likewise, the net value of switching from Lottery B to Lottery A is the sum of the loss in a low-level construal (winning probability) and the gain in a high-level construal (prize amount). For those respondents who chose Lottery B when the distance was long, this net value was initially negative. This time, however, the difference in discount rates between $d(high\ construal, gain)$ and $d(low\ construal, loss)$ is minor. Consequently, the net value does not change much as the distance becomes shorter. If the net value turns positive, Lottery A becomes more attractive than Lottery B under a short distance. With the small change in the net value, however, preference reversal is less likely to occur than in the previous case. In Figure 1, this situation corresponds to summing two value functions, [high; gain] and [low; loss].

The result (Panel C) shows that, in both samples, for social and time distances, a switch from Lottery A to Lottery B is more likely to occur than a switch from Lottery B to Lottery A as the distance becomes shorter. A chi-square test shows the proportion of respondents switching from Lottery A is larger than that switching from Lottery B at the 5% level, for both social and time distances in both samples. Therefore, the result supports the sign effect (Proposition 2).

GENERAL DISCUSSION

In BDT, discounting is often used to explain preference reversal. However, discounting cannot explain preference reversal such as "Pre-wedding blues". The current research incorporated discounting into CLT to explain such preference reversal.

We presented three propositions that were statistically validated. Proposition 1 pertains to the magnitude effect. Panels A and B largely supported the magnitude effect. Proposition 2 pertains to the sign effect. Panel C supported the sign effect. Proposition 3 pertains to a generalization of distance. For time and social domains, Panels A~C supported this generalization statistically.

The advantages of our approach are two folds. First, our framework can predict preference shifts and behavioral changes as distance varies in a simple manner, providing a useful analytical framework for pragmatic applications. Second, preference reversal over more general distance beyond a time axis can be accommodated.

There are various research possibilities for extending our framework. First, validating other psychological distances such as spatial and hypothetical distances is an obvious next step. Second, by calibrating parameters at the individual level, heterogeneity in the magnitude and sign effects among people can be better understood. This enables us to understand differences in their preferences and behaviors more precisely. Such knowledge would be especially useful in the areas of marketing and policy-making.

REFERENCES

Ainslie, George and Nick Haslam (1992), "Hyperbolic Discounting," in *Choice Over Time*, ed. George Loewenstein and Jon Elster, New York, NY: Russell Sage Foundation, 57–92.

Benzion, Uri, Amnon Rapoport, and Joseph Yagil (1989), "Discount Rates Inferred from Decisions: An Experimental Study," *Management Science*, 35(3), 270–84.

Fiedler, Klaus (2007), "Construal Level Theory as an Integrative Framework for Behavioral Decision-Making Research and Consumer Psychology," *Journal of Consumer Psychology*, 17(2), 101–6.

Frederick, Shane, George Loewenstein, and Ted O'Donoghue (2002), "Time Discounting and Time Preference: A Critical Review," *Journal of Economic Literature*, 40(2), 351–401.

Laibson, David (1997), "Golden Eggs and Hyperbolic Discounting," *The Quarterly Journal of Economics*, 112(2), 443–78.

Lewin, Kurt (1951), *Field Theory in Social Science*, New York, NY: Harper.

Loewenstein, George (1987), "Anticipation and the Valuation of Delayed Consumption," *The Economic Journal*, 97(387), 666–84.

Loewenstein, George (1996), "Out of Control: Visceral Influences on Behavior," *Organizational Behavior and Human Decision Processes*, 65(3), 272–92.

Loewenstein, George and Drazen Prelec (1992), "Anomalies in Intertemporal Choice: Evidence and an Interpretation," *The Quarterly Journal of Economics*, 107(2), 573–97.

Metcalfe, Janet and Walter Mischel (1999), "A Hot/Cool-System Analysis of Delay of Gratification: Dynamics of Willpower," *Psychological Review*, 106(1), 3–19.

Miller, Neal E. (1944), "Experimental Studies of Conflict," in *Personality and the Behavior Disorders*, ed. J. McV Hunt, New York, NY: Ronald, 431–65.

Mischel, Walter, Yuichi Shoda, and Monica I. Rodriguez (1989), "Delay of Gratification in Children," *Science*, 244(4907), 933–938.

Rubinstein, Ariel (2003), ""Economics and Psychology"? The Case of Hyperbolic Discounting," *International Economic Review*, 44(4), 1207–16.

Sagristano, Michael D., Yaacov Trope, and Nira Liberman (2002), "Time-Dependent Gambling: Odds Now, Money Later," *Journal of Experimental Psychology: General*, 131(3), 364–76.

Salisbury, Linda C. and Fred M. Feinberg (2010), "Rejoinder: Temporal Stochastic Inflation in Choice-Based Research," *Marketing Science*, 29(1), 32–39.

Thaler, Richard (1981), "Some Empirical Evidence on Dynamic Inconsistency," *Economics Letters*, 8(3), 201–7.

Trope, Yaacov and Nira Liberman (2000), "Temporal Construal and Time-Dependent Changes in Preference," *Journal of Personality and Social Psychology*, 79(6), 876–89.

Trope, Yaacov and Nira Liberman (2003), "Temporal Construal," *Psychological Review*, 110(3), 403–21.

Trope, Yaacov, Nira Liberman, and Cheryl Wakslak (2007), "Construal Levels and Psychological Distance: Effects on Representation, Prediction, Evaluation, and Behavior," *Journal of Consumer Psychology*, 17(2), 83–95.

Zauberman, Gal, B. Kyu Kim, Selin A. Malkoc, and James R. Bettman (2009), "Discounting Time and Time Discounting: Subjective Time Perception and Intertemporal Preferences," *Journal of Marketing Research*, 46(4), 543-556.

In the Flow: Materiality, Value and Rubbish in Lagos

Precious O. Akponah, University of Leicester, UK
Ai-Ling Lai, University of Leicester, UK
Matthew Higgins, University of Leicester, UK

INTRODUCTION

In this paper, we invite consumer researchers to rethink the place of rubbish in the co-production of values in everyday life, with disposal conceptualised as a recursive practice which is inextricably entangled with the processes of consumption and production (Parsons and Maclaran, 2009; Hetherington, 2004). According to Parsons (2007) and Benton (2015), consumer researchers have tended to overlook disposal as an area of study, instead favouring studies pertaining to the acquisition and consumption of goods.

When disposal is explored, there is a tendency to consider such a practice to be a final act in a linear sequence following production, acquisition and consumption (see Gregson et al, 2010; Sherry, 1990). Such a view presumes that the value (of goods), once produced, is stabilised through consumption rituals and practices (e.g. be it through rituals of possession, gift-giving, sharing) until the onset of value exhaustion that leads subsequently to depreciation and disposal (Parsons, 2007). Rubbish is thus considered to be of 'no value' (Thompson, 1979) and is therefore a dirty post-consumption residual (Tudor et al., 2011; Douglas, 1966; Munro, 1992) that must be 'moved along' (Gregson et al, 2007; see Gabel, Mansfield and Westbrook, 1996; Phillips and Sego, 2011) and/or repurposed (see Cherrier, 2009; Trudel, Argo and Meng, 2016; Ture and Ger, 2011; Albinsson and Perera, 2009; Laitala, 2014). While the repurposing of rubbish (through practices of reusing and recycling) extends the value of goods – suggesting a 'circularity in the movement of goods' (Figueiredo and Scaraboto, 2016; Parsons and Maclaran, 2009: 301;) – these studies nevertheless maintain the 'absenting' of rubbish from everyday life until they are given a new lease of life (Hetherington, 2004). Indeed, failure to 'move things along' is considered to be a disruptive act (e.g. hoarding, cluttering) that brings about disorder in domestic spaces and material culture (see Maycroft, 2009; Cherrier and Ponnor, 2010). These studies, thus, reflect a modernist agenda predicated on practices aimed at systematically managing the boundaries that hold rubbish in abeyance (Tomic, Trumper and Dattwyler, 2006). Such a modernist agenda is particularly prevalent in discourses on waste management and environmentalism in the developed worlds (Gregson et al, 2010). As Arnould (2014) observes, consumer studies' pre-occupation with advanced capitalist market economies has blinkered our theorisation of value as being predicated on market exchange, and thus, has obscured human creativity (sociality) as the cornerstone of value creation. In short, a modernist view of waste management in advanced consumer society risks overlooking 'rubbish' as constitutive of value creation and production (O'Brien, 1999, 2008) whilst discounting the performative role of rubbish in generating the social and political dynamics of everyday life.

Through an ethnographic study of waste handling in Lagos, Nigeria, we follow the 'flow of rubbish' (Appadurai, 1986; Gregson et al, 2010) to explore the value entanglement between urban dwellers (which include householders and scavengers) and the materiality of rubbish. As in most developing economies, rubbish occupies a prominent material presence in the mundane spaces of everyday life in Lagos. Here, rubbish not only fuels the socio-economic lifeblood of urban dwellers, it is also integral to the formation of informal market that often shapes the social life of these actors (see Samson, 2015; Rogerson, 2011; Lepawsky and Billah, 2011). This paper, in some way, responds to Gregson et al's (2010: 846) call to 'follow the flow of things' down the value chain to 'less developed worlds,' where the value of things are never fully stabilised as they constantly undergo endless processes of assembly disassembly and reassembly.

In this paper, we ask what it is like to carve out a living amidst rubbish. To what extent has a modernist discourse of waste management infiltrated the everyday life of urban dwellers in a developing economy like Nigeria? How do values circulate, become contested and flow in such an economy? How do practices of disposal shape the social relations of those who are entangled with it? To address the above questions, we draw on Appadurai (1986) and Arnould's (2014) practice theory of value creation to shed light on how values are contingent upon the relational entanglement between social and material relations.

Towards a Practiced-Based theory of value creation

Most marketing and consumer studies that address the value of objects have built upon Arjun Appadurai's (1986) reappraisal of Marx's (1976) conception of value – i.e. as a product of the sum of labour required to produce things and with a focus on how such value might be measured in qualitative or quantitative terms. For Marx, the 'usefulness of things' does not necessarily translate into commodity; instead a thing only becomes a commodity if it produces use-value for others and, in a market system, this is predominantly transferred through monetary exchange. Appadurai (1986), however, cautions against limiting the conceptualisation of value creation to market exchange (Appadurai, 1986; Kopytoff, 1986). Instead, he calls for the need to attend to social and material relations by 'following the circulation of things', which at times also embrace other forms of value regimes (such as bartering, gift-giving or market relations).

Appadurai (1986) argues that value creation is contingent upon mundane social interactions and that it is through such a relational approach that objects animate and take on a 'social life'. Such a view problematises conventional understandings of use value in marketing as either residing in the object or in individual perception of said object (Karababa and Kjeldgaard, 2014; Arnould, 2014). It also calls into question the agency attributed to marketers, who appropriate use value as a resource for identity-construction as necessarily accomplished through a systemic top-down process of meaning transfer (ibid: 2014; see McCracken, 1986; see also Curasi, Price and Arnould, 1998).

Concurring with Appadurai (1986), Arnould (2014) proposes the need to employ a practice-based approach to studying value creation. Such an approach assumes value as an outcome that is contingent on practices of production and consumption, and that such practices are enacted through co-ordinating a web of human and material relations. In other words, it is practices, rather than individuals or institutions that assume the performative role as a 'carrier of values' (ibid: p.130) as well as (we may add) the producer/destroyer of values. For Arnould, 'the interaction of productive and consumptive moments is key to the realisation of use values' (ibid: 131). Productive moments involve the process where materials are offered as forms of resources while consumptive moments entail the reception of such resources. It is in these moments of cross interaction that active and inactive carriers of practice (subjects, objects and networks) come together to perform the work of value co-production/co-destruction.

As Arnould (2014) suggests, instead of asking 'who' and 'what system[s]' produce values, we should instead question what kind of values are produced in particular forms of regime. For instance, to fully capture the regimes of value creation in market economies, we must ask, what affords an object its commodity candidacy (Appadurai 1986)? For Appadurai, such a question must be addressed by tracing the social life, practices and politics that become enmeshed with the commodity during moments of exchange. By attending to the cultural biographies of things (Kopytoff, 1986), researchers are able to observe how an object moves in and out of its commodity state. In the context of this study, we similarly ask, what regime of value shapes the movement of objects and commodities in and out of their 'rubbish' state? What values are produced in regimes where exchange is performed outside of formal market exchange?

METHODS

This paper presents findings derived from a 6-months ethnographic study with six key stakeholders involved in the organisation of rubbish in Lagos (i.e. Lagos Waste Management Authority [LAWMA], householders, itinerant scavengers, dumpsite scavengers, junk artists and Wecyclers [a social enterprise promoting recycling]). Utilising multiple data collection methods, which include participant observations, self-reflexive observations, field interviews, diaries, photographs and videos, we traced the social life of rubbish, particularly its trajectory as it moves across different spaces (i.e. from households to landfill and sometimes recursively back to households). Our methodology follows a more-than-representation approach (see Hill et al. 2014), which emphasises the pre-reflexive and embodied immersion in the onflows of everyday life in the production of knowledge (Thrift, 2007). Through a more-than-representational approach, we incorporate both textual (representational) and corporeal (non-representational) accounts of how values are created, produced and circulated through different spaces in different interactional encounters.

CONTEXT AND FINDINGS

In this paper, we discuss two regimes of value in our ethnographic data: (1) the social shaping of the informal economy and (2) embodied categorisation of value.

The Regime of Value and the Social Shaping of the Informal Economy

As Lagos faced continual struggle with their handling of mounting waste in the city (Oyeniyi, 2011), the Lagos State Government established the Lagos Waste Management Authority (LAWMA) in 1991. Through the Cleaner Lagos Initiative (CLI), LAWMA is entrusted with the responsibility to implement waste management policies befitting of a modern city, whereby Western practices of reducing, reusing and recycling of waste are reinforced (Ezeamalu, 2017; Akiyode and Sojinu, 2006). Despite such an initiative, the crisis persisted as household rubbish remained uncollected, prompting urban dwellers to seek alternative channels to deal with the overflow of waste. This has spawned the flourishing of an informal waste industry, wherein cart pushers, scavengers and social enterprises step in to undertake waste collection for householders in return for fees (Araba, 2010). It is under such a condition that our ethnographic data reveals the emergence of a mutually beneficial relationship between the householders and the informal actors, which is predominantly driven by economic exchange, as exemplified by our observation of Mary:

"I tell my children to look out for the aboki's[1] [itinerant scavengers] because they normally come to our street. So, we sell most of (the) rubbish to them…I reserve my plastic bottles for the bicycle boys [Wecyclers][2] so that I can at least I get something from them no matter how little… something is better than nothing. The rest we throw into the bush." (Mary, slum dweller, on-site interview)

Living in the slum, Mary's dwelling is often overflowing with rubbish. Although the handling of waste in her slum is 'formally' operationalised by LAWMA, however, this has often been neglected as the Lagos Government is more inclined to deploy resources to sanitise more prominent neighbourhoods (Ezeamalu, 2017). Most slum dwellers, like Mary, would often resort to 'selling their rubbish' to informal actors, particularly the itinerant scavengers, who are themselves economically disadvantaged. At the same time, Mary also attempts to extract value from rubbish by pushing it through social enterprises, which provide her with an alternative source of income. For these actors, rubbish assumes a recursive presence (Hetherington, 2004) that yields 'a continuous return', and therefore its value is unstable as it oscillates in and out between rubbish and commodity states interchangeably (Appadurai, 1986).

In the event where rubbish fails to 'move along' (Gregson et al, 2007) the formal and informal channels, they will then be removed from domestic spaces to interstitial spaces (which are usually located within close proximity – e.g. bush, kerbside, gutter) through practices of fly-tipping. In turn, such a space becomes a treasure trove for itinerant scavengers to retrieve rubbish and to resell it to actors with buying power (e.g. buyers, scrap-dealers). This is exemplified below by Jide:

"I started picking (in the streets) before I became the number one destroyer…This job is important because if you buy an engine (broken) and don't know the difference between iron, metal, and copper you will not be able to extract the value…You have to take the objects apart piece by piece, everything… You need to separate (aluminium from iron) so that you don't end up selling something worth N50.00 for N10.00. We sell in kilos so if you don't destroy (dismantle) it, the entire engine will be sold as iron even though there is more valuable aluminium within it." (Jide, itinerant scavenger, on-site interview)

According to Jide, an experienced itinerant scavenger would possess the know-how in distinguishing the values of different materials. In this instance, aluminium is considered by buyers/scrap-dealers to be more lucrative compared to iron as it commands better exchange value. To maximise their resell value, itinerant scavengers must also engage in the work of disassembly (see Figure 1) by segregating the valuable materials from the 'not-so-valuable', and the former will in turn be reassembled by the buyers/scrap-dealers into a profitable commodity (Gregson et al, 2010). As will be witnessed in Theme 2, informal scavenging would soon come under threat due to the privatisation of waste management.

---

1   Aboki is a Hausa term which means 'friend'. It is also a word that is often used in a derogatory way to refer to poor migrant workers engaging in lowly paid jobs.

2   Wecyclers operates a reward programme that is points-based. Households earn points for plastics given to Wecyclers and these points are redeemed quarterly by receiving items like toasters, irons and cooking utensils.

FIGURE 1: Itinerant scavengers dismantling broken engines in a scrapyard

Scavenging in the Landfill: Embodied categorisation of value and social hierarchy

In October 2004, the Lagos State Government privatised their waste management practices through a new reform, which saw the establishment of the Private Sector Participants (PSPs). The PSPs attract private businesses who receive remuneration from LAWMA to oversee the management of waste. Consequently, this instantaneously criminalised practices of itinerant scavenging. In an attempt to avoid prosecution, many informal scavengers were forced to retreat to state-owned landfills to eke out a living. From the government standpoint, such a move is welcomed as the once informal scavengers can be 'hidden away' in the spaces of the landfills as part of the initiative to remove the unsightly and the undesirable other from the streets of Lagos. Unlike scavenging on the streets, retrieving materials in the landfill is a competitive business that requires an embodied know-how in categorising objects and their values. This is explained by Efe below:

"If you come to the business of scavenging (in) the dump...just with my eye, I will tell you this is gold, and this is not gold. If you look at this ring, to the ordinary eyes, they don't know what it is. But this is white gold, I saw it from the dump, and I just picked it in seconds. I can sell it for N20,000 (£41) depending on the area. If I don't want to go far, if I want to sell it in Ajegunle, I can sell it for like N6,000 (£13) or N7,000 (£15)." (Efe, landfill scavenger, on-site interview)

Efe emphasises how the cultivation of embodied skills become integral to identifying and categorising objects in the landfill. Such corporeal engagement with objects is necessary in a space where scavengers jostle for valuable materials. According to Efe, engaging with the tactile qualities of objects is conducive to deciding the geographical locations where the value of his foraging can be maximised. Once a landfill scavenger acquires bodily and territorial competence, they are likely to ascend the social hierarchy within the landfill, and for the successful few, go on to become a buyer.

CONCLUSION

This paper sets out to conceptualise the act of rubbishing as more than a final act of disposal, rather it entails recursive processes of value creation and destruction that shape the social relations between different actors. While many studies assume the absenting of rubbish from everyday life, our study reveals how the conspicuous presence of rubbish (in the developing world) becomes interwoven into the fabric of social relations, as evident in the market formation of an informal economy and landfill hierarchy. Unlike previous studies, we find that rubbish does not always constitute the destruction of value; rather its status as a 'valuable' object is always coming-into-being and its candidacy as a commodity is variously contested.

REFERENCES

Akiyode, Oluwole, O. and Sojinu, Olasunkanmi S. (2006). Assessment of Private Sector Participation (PSP) in Solid Waste Management Practices in Nigeria. (Case Study of Lagos State, Nigeria).

Albinsson, Pia A. and Perera, Yasanthi, B. (2009). From trash to treasure and beyond: the meaning of voluntary disposition. *Journal of Consumer Behaviour: An International Research Review*, *8*(6), pp.340-353.

Arnould, Eric, J. (2014). Rudiments of a value praxeology. *Marketing Theory*, *14*(1), pp.129-133.

Appadurai, Arjun (1986). *The social life of things: Commodities in cultural perspective*. Cambridge University Press.

Araba, Adebisi, O. (2010). *Household Attitudes to Solid Waste Management in Developing Country Cities: A Case Study of Lagos, Nigeria* (Doctoral dissertation, Centre for Environmental Policy, Imperial College London).

Benton, Raymond, Jr (2015). Reduce, reuse, recycle... and refuse. *Journal of Macromarketing*, *35*(1), pp.111-122.

Cherrier, Helene and Ponnor, Tresa (2010). A study of hoarding behavior and attachment to material possessions. *Qualitative Market Research: An International Journal*, *13*(1), pp.8-23.

Cherrier, Helene (2009). Disposal and simple living: exploring the circulation of goods and the development of sacred consumption. *Journal of Consumer Behaviour: An International Research Review*, *8*(6), pp.327-339.

Curasi, Carolyn F. Price, Linda L and Arnould, Eric J. (1998). *"A Meaning Transfer Model of the Disposition Decisions of Older Consumers", in E - European Advances in Consumer Research Volume 3, eds. Basil G. Englis and Anna Olofsson, Provo, UT: Association for Consumer Research, Pages: 211-221.*

Douglas, Mary (1966). *Purity and Danger – an analysis of the concepts of pollution and taboo*, London: Routledge

Figueiredo, Bernardo, and Scaraboto, Daiane, 2016. The systemic creation of value through circulation in collaborative consumer networks. *Journal of Consumer Research*, *43*(4), pp.509-533.

TABLE OF FINDINGS

Themes	Descriptions	Participant Data
The Regime of Value and the Social Shaping of the Informal Economy	This theme explores how rubbish circulates and moves along informal channels. Here, rubbish assumes a recursive presence in the spaces of everyday life, both as a source of economic return as well as a problematic object. This theme reveals the formation of social relations surrounding practices of disposal that bypass the formal channel.	
	Precarious social tension between informal actors (itinerant scavengers) and law reinforcement agents [i.e. police, LAWMA, Kick Against Indiscipline (KAI)]. The latter are charged with policing the informal activities of scavenging.	"(If you) look at this rim, it is damaged but if I pick it (up from the gutter to be wheeled to the scrap-dealer), the police will accuse me of stealing it …if you think of the stress (of dealing with the police)…. we just pay them." (Bayo, itinerant scavenger, in-depth interview).
		"Our challenges are KAI, LAWMA, and (the) Police…they make life unbearable for us. KAI's challenge is that they know that we are paying tax to the Lagos State Government. The Lorries we use in loading our scraps are paying revenue, do you understand? And our boys (itinerant scavengers) before they go to work they will buy a sticker from the state government that allows them to push the carts….If they see a scavenger without one, they will arrest him, and you will pay a fine of N4, 500 (£16) before they will give you your cart back. As the State Government know that each Local Government has their own sticker, they have to leave us to do our business because they are collecting money for the sticker. We pay our taxes, but we still have challenges…although, we have already solved the problem with KAI for up to 10 years now" (Idris, scrap dealer, in-depth interview).
	The informal dealings between householders and informal actors (itinerant scavenger, junk artist, social enterprise)	"I picked up this odo (discarded mortar) on the street in 'Alagumeji' (slum). I am not sure why I picked it…but…it would be useful for my work. I use it as a base for my painting brush and board and nothing more." (Peter, junk artist, in-depth interview).
Scavenging in the Landfill: the embodied categorisation of value and social hierarchy	This theme explores how regime of values is contingent upon embodied and material interactions. In this theme, we observe the competitive nature of scavenging in state-own landfill and how possessing an embodied know-how in categorising the value of rubbish can enable scavengers to ascend the social hierarchy in the landfill. We also witness how such competitive scavenging in landfills is structured along gendered line.	"The practice of scavenging does not only require the expenditure of physical energy. Knowing the right tactics can make one's life easy in the dumpsite. It is always better to have a sack quarter-filled with brass, aluminium, and copper than a sack filled with iron. It is difficult to move in the dump because of the soft, sinking and sloppy surface of the dump" (Field Diary – 29/08/2015, shadowing a landfill scavenger).
		"The women cannot stand that because if they try to go for the metals, copper, it's too expensive. They won't see it because the men are stronger, they will guide them and collect it. The boys leave the plastic and some of the cans and the nylons for them" (Ade, landfill scavenger, on-site Interview).
		"We are friends. But when we are working, there is no friendship because it's a jungle. The dump is a jungle where the lion goes for the big kill. After the lion feeds, the hyenas and the vultures can then come in. In the dump, the lions are the strong boys. They go for the truck, they scatter, and they fight. We fight ourselves to get it. After that, the ones who are not that strong, who don't like struggling, would stay behind. These are the hyenas. Some women still come close but when the truck leaves, the women will be crying to the boys, 'Egba mi Fun mi eleyi, Egba mi Fun mi eleyi' (meaning please give me this, please give me this). So these are the vultures because they feast on the remnants, they wait to take the food off after the lion is satisfied" (Efe, landfill scavenger, in-depth interview).

Kegan Paul Ezeamalu, Ben (2017). No going back on Lagos waste management reforms – Ambode – Premium Times Nigeria. [Online] Premium Times Nigeria. Available at: https://www. premiumtimesng.com/regional/ssouth-west/222976-no-going-back-lagos-waste-management-reforms-ambode.html [Accessed 22 Nov. 2017].

Gabel, Terrance G. Mansfield, Phylis and Westbrook, Kevin (1996). *"The Disposal of Consumers: an Exploratory Analysis of Death-Related Consumption", in NA - Advances in Consumer Research Volume 23, eds. Kim P. Corfman and John G. Lynch Jr., Provo, UT : Association for Consumer Research, Pages: 361-367.*

Gregson, Nicky (2007). Living with things. *Ridding, accommodation, dwelling.* Oxon, UK: Sean Kingston Publishing.

Gregson, Nicky, Crang, Mike, Ahamed, Farid, Akhter, Nargis and Ferdous, Raihana (2010). Following things of rubbish value: End-of-life ships, 'chock-chocky'furniture and the Bangladeshi middle class consumer. *Geoforum*, *41*(6), pp.846-854.

Gregson, Nicky, Metcalfe, Alan and Crewe, Louise (2007). Moving things along: the conduits and practices of divestment in consumption. *Transactions of the Institute of British Geographers*, *32*(2), pp.187–200.

Hetherington, Kevin (2004). Secondhandedness: consumption, disposal, and absent presence. *Environment and planning D: society and space*, *22*(1), pp.157–173.

Hill, Tim, Canniford, Robin and Mol, Joeri (2014). Non-representational marketing theory. *Marketing Theory*, *14*(4), pp.377–394.

Karababa, Eminegul and Kjeldgaard, Dannie (2014). Value in marketing: Toward sociocultural perspectives. *Marketing Theory*, *14*(1), pp.119–127.

Kopytoff, Igor (1986). The cultural biography of things: commoditization as process. *The social life of things: Commodities in cultural perspective*, *68*, pp.70–73.

Laitala, Kirsi (2014). Consumers' clothing disposal behaviour–a synthesis of research results. *International Journal of Consumer Studies*, *38*(5), pp.444-457.

Lepawsky, Josh and Billah, Mostaem (2011). Making chains that (un) make things: waste–value relations and the Bangladeshi rubbish electronics industry. *Geografiska Annaler: Series B, Human Geography*, *93*(2), pp.121-139.

Maycroft, Neil (2009). Not moving things along: hoarding, clutter and other ambiguous matter. *Journal of Consumer Behaviour: An International Research Review*, *8*(6), pp.354-364.

Marx, Karl (1867/1976). *Capital Volume 1: A Critique of Political Economy*. 1st ed. London: Penguin Books.

McCracken, Grant (1986). Culture and consumption: A theoretical account of the structure and movement of the cultural meaning of consumer goods. *Journal of consumer research*, *13*(1), pp.71–84.

O'Brien, Martin (1999). Rubbish values: Reflections on the political economy of waste. *Science as Culture*, *8*(3), pp.269–295.

O'Brien, Martin (2008). *A crisis of waste? Understanding the rubbish society*. Routledge.

Oyeniyi, Bukola, A. (2011). Waste management in contemporary Nigeria: the Abuja example. *International Journal of Politics and Good Governance*, *2*(2.2), pp.1–18.

Parsons, Liz (2007). *"Thompson's Rubbish Theory: Exploring the Practices of Value Creation", in E - European Advances in Consumer Research Volume 8, eds. Stefania Borghini, Mary Ann McGrath, and Cele Otnes, Duluth, MN : Association for Consumer Research*, Pages: 390-393.

Parsons, Elizabeth and Maclaran, Pauline (2009). 'Unpacking disposal': introduction to the special issue. *Journal of Consumer Behaviour: An International Research Review*, *8*(6), pp.301-304.

Phillips, Barbara, J. and Sego, Trina (2011). The role of identity in disposal: Lessons from mothers' disposal of children's possessions. *Marketing Theory*, *11*(4), pp.435-454.

Rogerson, Christian, M. (2001), April. The waste sector and informal entrepreneurship in developing world cities. In *Urban Forum* (Vol. 12, No. 2, pp. 247-259). Springer-Verlag.

Samson, Melanie (2015). Accumulation by dispossession and the informal economy–Struggles over knowledge, being and waste at a Soweto garbage dump. *Environment and Planning D: Society and Space*, *33*(5), pp.813-830.

Sherry John, J.F (1990). A sociocultural analysis of a Midwestern American flea market. *Journal of consumer research*, *17*(1), pp.13-30.

Thompson, Michael (1979). *'Rubbish Theory'*. Oxford: Oxford University Press.

Tomic, Patricia, Trumper, Ricardo and Dattwyler, Rodrigo, H. (2006). Manufacturing modernity: Cleaning, dirt, and neoliberalism in Chile. *Antipode*, *38*(3), pp.508-529.

Trudel, Remi, Argo, Jennifer J. and Meng, Matthew D. (2016). The recycled self: consumers' disposal decisions of identity-linked products. *Journal of Consumer Research*, *43*(2), pp.246-264.

Tudor, Terry, Robinson, Guy, M. Riley, Mark, Guilbert, Steven and Barr, Stewart, W. (2011). Challenges facing the sustainable consumption and waste management agendas: perspectives on UK households. *Local Environment*, *16*(1), pp.51–66.

Ture, Meltem and Ger, Guiliz (2011).*"An Exploration of Consumers' Use of Disposing Practices in Their Daily Lives", in NA - Advances in Consumer Research Volume 39, eds. Rohini Ahluwalia, Tanya L. Chartrand, and Rebecca K. Ratner, Duluth, MN: Association for Consumer Research, Pages: 32-33*

Türe, Meltem (2014). Value-in-disposition: Exploring how consumers derive value from disposition of possessions. *Marketing Theory*, *14*(1), pp.53-72.

Thrift, Nigel (2007). *Non-representational Theory: Space, Politics, Affect*. London and New York: Routledge.

Volatile Bodies in the Digital Age. Consumer Vulnerability and Resistance in Online Bodily Experiences of Pregnancy.

Camille Anin, Université Grenoble-Alpes, France

INTRODUCTION

From everyday life choices to more occasional choices, consumption plays a key role in negotiating one's identity as a pregnant woman and in affirming its future role of mother (Sevin & Ladwein, 2008 ; Min & Peñaloza, 2019): buying maternity clothing (Ogle, Tyner & Schofield-Tomschin, 2013), organizing a baby shower (Fischer & Gainer, 1993), preparing the child bedroom, having the maternity bag ready (Sevin & Ladwein, 2008), modifying its food consumption (Sevin & Ladwein, 2008) and its beauty routines (Marie, 2016). Nowadays, most of the experiences of pregnancy can be mediated through the use of digital technologies. In addition to blogs and forums, self-help groups of mothers and mothers-to-be are flourishing on social media. And mobile apps offers the possibility to follow the growth of the foetus through personalized 3D pictures, in addition to providing access to information ranging from advice to schedule medical appointments to the characteristics and underlying reasons of bodily changes.

Despite a growing literature on the effects of technology on consumers' lives (Venkatesh, Meamber and Firat, 1997; Mick & Fournier, 1998; Schau & Gilley, 2003; Belk, 2013, 2014; Bardhi & Eckhardt, 2017) and on consumers' bodies (Buchanan-Oliver & Cruz, 2009; Belk, 2013; Roux,& Belk, 2019; Matich et al, 2019), no research in consumer behavior, to the best of our knowledge, addresses the consequences of digital technologies on the experiences of pregnancy. Yet, pregnancy is a liminal state during which power balance between consumers and the marketplace are particularly likely to evolve, potentially endangering the "*affects personal and social perceptions of self* " (Baker et., 2005).

This paper considers there is a need to conduct research in this area in order to have a better understanding of the digital experiences of contemporary mothers-to-be and its consequences on the power balance and its consequences on the power balance between consumers and the marketplace. To this aim, we chose to explore how reembodiment in digital settings shape the experiences of pregnancy, paying a specific attention to both consumer resistance (Mikkonen et al., 2011; The Voice Group, 2012) and consumer vulnerability (Baker et., 2005; The Voice Group, 2010).

To further investigate the effects of digital technologies on the experiences of pregnancy, we conducted 18 semi-structured interviews and participant online observation on pregnancy-related Facebook groups, in order to explore the effects of digital technologies on the bodily experiences of pregnancy building on literature on body and embodiment in consumer research (Belk, 2013 ; Matich et al, 2019) so as feminist literature (Grosz, 1993). Firstly, we will shortly review the literature on the transition to motherhood and on the digital technologies and the body in consumer research. Then, we will present our methodology and findings. Finally, we will discuss the implications and limitations of our results before making suggestions for future research.

TRANSITION TO MOTHERHOOD

Feminist researchers were the first to look at pregnancy as both an individual experience and a social construction (Rich, 1977; Oaxley, 1979) and more contemporary researchers (Miller, 2005 ; Nash, 2012) continue to provide a sociological account on this understudied feminine experience. Since the 1990's, transition to motherhood as a research object in consumer behavior is receiving a growing amount of attention (Fischer & Gainer, 1993; Jennings & O'Malley, 2003 ; Sevin & Ladwein, 2008 ; Prothero et al., 2006; Min & Peñaloza, 2010, 2019; The Voice Group, 2010, 2012; Tonner, 2012; Ogle, Tyner & Schofield-Tomschin, 2013). Pregnancy is described as a key moment of identity transition where consumption plays a key role in the material, emotional and social preparation of motherhood (Sorensen & Thomsen, 2006). Banister & Hogg (2010) highlight the experience of possible selves during the transitional phase of pregnancy. Being pregnant implies navigating across different discourses, whether media, medical, social and political discourses on motherhood (The Voice Group, 2010). The aspirational rhetoric of marketing discourses on pregnancy and motherhood may contribute to create gaps between the ideal and actual experiences of women, leading to consumer vulnerability (The Voice Group, 2010) and to consumer resistance (The Voice Group, 2010 ; Tonner, 2012). Both the Voice Group (2010) and Tonner (2012) refers to Rich's distinction between motherhood as a set of ideals and mothering as actual experiences of being a mother (Rich, 1977). The power of cultural discourses and social norms in negotiating one's identity, through consumption, as pregnant women can also be observed in the bodily practices and pregnant embodiment (Min & Peñaloza, 2019). The concept of agentic body highlights the importance of the body in the routines and behaviors of mothers-to-be and the complex dynamics of embodiment and disembodiment that structures pregnancy in terms of bodily experiences - and associated bodily management (Min & Peñaloza, 2019).

DIGITAL TECHNOLOGIES & THE BODY IN CONSUMER RESEARCH

Embodiment is particularly important regarding digital technologies. If the relationships between self-identity and the body has been a central question in Western philosophy and were mostly envisioned through the lens of the Cartesian mind/body dualism, the emerging of digital technologies encouraged researchers to reconsider materiality and corporeality. A view of the digital body that posits an entanglement between embodiment and digital subjectivity has been developed by Hayles (1999) and has had a considerable influence on how researchers envisioned digital environments (Belk, 2014 ; Matich et al, 2019). Nowadays, if this cartesian conception is still part of the cultural narratives, it is increasingly discussed by academic researchers regarding both offline (Roux & Belk, 2019) and online environments (Hayles, 1999 ; Shilling, 2005; Belk, 2014; Buchannan-Oliver & Cruz, 2009). According to Belk (2013), digital technologies induce five main changes: dematerialization, reembodiment, sharing, co-construction of self and distributed memory. Reembodiment is related to the experiences related to embodiment/disembodiment related to digital environments that enables "new constructions and definitions of the self." (Bolter, 1996, quoted by Belk, 2013). Matich and colleagues (2019) highlights, through the case of Free The Nipple, how bodies can be appropriated in digital environment as places of transgression and contestation of existing order without actually leading to political changes in real life, questioning how reembodiment is structured by power struggles in digital environments. The ubiquity of technology in consumers' lives blurred the distinctions between the mind and the body, the body and technology, underling identity concerns and the tensions between control and freedom as particularly relevant aspects of body

and technology (Foucault, 1995 ; Buchannan-Oliver & Cruz, 2009). By considering the body as a Mobius strip and using the plural bodies, Grosz (1993) uncovers the ability of the body to be psychically appropriated through physical experiences ("inside out") and physically appropriated through psychological experiences ("outside in") without the possibility to isolate one from the other. Such framework may help to have a better understanding of the impact of digital technologies on bodily experiences and provide an interesting perspective on technology and consumer well-being (Andreasen, Goldberg, & Sirgy, 2012).

METHOD

In order to investigate the impact of digital technologies on the experiences of pregnancy, we conducted 18 semi-structured interviews on various themes: the experiences of pregnancy, the changes and maintenance of consumption routines, the use of digital technologies and mobile apps related to pregnancy, pregnancy and motherhood ideals. Respondents (aged from 19 to 40 y.o) were recruited in prenatal classes and through online posts on Facebook pregnancy support groups in order to ensure socio-demographic diversity of the sample. Interviews were conducted face-to-face or over the phone. Due to our research topic, an ethnographic approach to digital media was also considered valuable (Coleman, 2010). Online participant observation of Facebook Group was a key material to be familiar with online experiences of pregnancy as topics included most of the online and offline experiences of pregnancy. Observations were made from October 2019 to February 2020. Due to intimate character of those online digital material and to the ethical concerns about collecting online data on such sensitive topic, no raw material was collected as such. Online field notes were exclusively made of observation and reformulated verbatim. Permission was asked to use such quotations in a research work. Interviews were conducted and analyzed building on Kvale's guidelines (1996 ; 2006) and online research complied with Elgesem's ethical principles (2002).

FINDINGS

In interviewees narratives, digital environments echoes a lot of different environments from blogs to specialized website, Instagram accounts and Facebook groups to pregnancy apps. We purposefully chose to closely investigate Facebook groups and pregnancy apps as it was reported by interviewees as digital environments that shaped their bodily experiences all along the pregnancy. Although all interviewees of our sample were part of private Facebook groups of mothers-to-be, it is worth being noted that not all interviewees were using pregnancy apps. Yet, most of them did and emphasize the role of the app(s) in their transition to motherhood, whether when it was their first child or not. Facebook groups and pregnancy apps offer pregnant women new opportunities to experiences liminality, liminality being defined as the second phase of a rite passage which consists in distancing oneself from its former role to incorporate a new one (Van Gennep, 1909). As underline Fischer & Gainer (1993) with their investigation on baby showers, the absence of traditional rites of passage leads Western women to create new rites of passage in this transition of pregnancy. Yet, these rites are a small number and pregnancy in post-modern societies can be experienced as a stressful event. A plethora normative discourses on pregnancy shape personal and social expectations, still it is perceived the mother's own responsibility to create her rites of passage which very often requires acts of consumption. Facebook groups and pregnancy apps are depicted by interviewees as ways to renegotiate their bodily experiences during this transition phase by escaping normative discourses on pregnancy, « feeling » pregnant and learning how to be a literate consumer.

Escaping normative discourses on pregnant bodies

Women need to navigate across powerful discourses on pregnancy that carry specific norms about pregnant embodiment and bodily management during pregnancy (The Voice Group, 2010, 2012 ; Nash, 2012). Interviewees considered digital environments as « safe spaces » that give them an opportunities to espace from normative discourses on pregnant bodies. The narrative of women highlight medical, commercial and social discourses on pregnancy are heavily structured around pregnancy a period of happiness, resistance to pain and endorsement of health behaviors for the sake of the future child. Such discourses may lead to disembodied experiences of pregnancy or shame from current bodily experiences. Online support groups offer alternative spaces where it is possible to voice and heard voices of actual bodily experiences of pregnancy that often break with those discourses on pregnancy as Angélique (32) noted and help coping with liminal state : "*No one talks about it, everyone says pregnancy is a fulfilling period, everyone is happy, it's beautiful, it's joyful. But in the end, no, the first trimester is complicated and the fact that it is quite taboo is quite hard to accept. (...) Precisely, the girls do not hesitate to share about their first trimester so they say: "I have nausea", "I went to the hospital because I had ligament pain". We are more aware that the word is free here, on the internet rather than in real life.*". To this regard, reembodiment through alternative subjectivities seem to be based on sharing and reading authentic everyday life experiences that enables a greater acceptance of a body that may seems « out of control ». Yet, alternative subjectivities forged in digital environment often coexist with exposure to targeted ads in highly emotional situations, whether positive (*e.g.* sharing of the first ultrasound, looking at photos of a child birth) or negative experiences (*e.g.* anxious waiting due an amniocentesis test, perinatal grief). Pregnant reembodiment on digital environment are structured by a tension between consumer resistance and consumer vulnerability that may be often difficult to disentangle : interviewees acknowledged an imbalance between themselves and brands (or apps) in their digital experiences considering it, most of the time reluctantly, as "the price to pay" to benefit from digital journey that help them during their pregnancy.

« Feeling pregnant » : reembodiment through digital reenactment of liminality

The ability to connect with its future child away from medical discourses and to create new bodily experiences in embracing pregnancy as a liminal journey on the app is praised by many respondents who were highly enthusiastic about the app. Despite partnerships with brands, pregnancy apps, by offering 3D pictures of the foetus are also considered, are considered as an escapism from normative and, in particular, medical discourses. Digital environments give the feeling to women to consider their bodily experiences under their own terms through digital reenactment of liminality, with no need to buy pregnancy related goods and services, nor to take a medical appointment. Lena (27) notes "*it has been a very useful mobile application, it shows the evolution of the pregnancy, without necessarily waiting for medical appointments.*". In the same vein, Adèle (19) says "*i love how the applications follow our pregnancy week after week, we feel all the more close to my baby when we know its evolution every week.*" To this regard, some women did not hesitate to compare the app with a caring close one, truer and, sometimes, more compassionate that medical staff. When asking for the reasons of such enthusiasm, the fact that the app enables to « feel » pregnant was very important. Some argue that, in their professional life and, even, in their private life that may « forget » about their pregnancy and fail to fully realize they have a baby in their belly. By creating a 9-month

experience that is difficult, if not impossible, to enact offline, digital environments enables a form of reembodiment based on the self-affirmation of its identity as a pregnant women. Yet, the « intrusion » of apps within the prenatal imaginary in an almost symbiotic manner is a double-edged sword. If it enables a sort of self-awareness of the women using such apps, it both creates a great control over women's own embodiment and disciplines the pregnant reembodiment as a triangular relationship mother-app-child. The personal stories of some interviewees reveal that reembodiment in the digital world seem particularly important for women who went through particular difficult events regarding previous pregnancies (miscarriage, child death) or experienced social vulnerability during their pregnancy (lack of social support, separation or divorce). For them, the benefits of those digital environments seem high and interviewees who experienced difficult events may be likely to be more engaged than others. At the same time, these are the ones who report feeling the most vulnerable to marketing discourses and predatory practices. How transformative consumer researchers could build on the strengths of digital technologies, alleviating potential vulnerability? By looking at the entanglement between individual characteristics, individual states, external conditions and experiences of pregnancy on consumer and market responses (The Voice Group, 2010), we uncover the role of digital environments in reshaping levels of literacies.

"Learning" consumption : pregnant women and the pursuit of higher level of literacies

Pregnancy is an unsettling experience that disrupts women' consumption routines and requires new knowledge and new skills (Sevin & Ladwein, 2008). Yet, knowledge is not always power unless individual has the ability to contextualize the knowledge she received and to produce himself meaning with the cultural settings it evolves, which is associated with high level of literacy. Literacy in participants narratives are associated with health literacy (Nielsen-Bohlman, Panzer, & Kindig, 2004), brand literacy (Bengtsson & Firat, 2006), food literacy (Colatruglio & Slater, 2014) so as with marketplace literacy (Viswanathan, Sridharan, Gau & Ritchie, 2009). Facebook groups and mobile apps are depicted by interviewees as participating in shaping their strategies to cope with feeling of powerlessness and anxiety related with changes in consumption routines and medical discourses about healthy lifestyle through increased access to information embedded into the experiences of others like them. To this regard, digital technologies may enable help to develop individual and collective strategies to build literacy capabilities regarding what food to eat, what cosmetic to use or what to put on the maternity bag. Social media support groups are also a valuable source of information to guide mothers-to-be in their consumption choices and bodily experiences as notes Marie (37) : "*It has allowed me to learn a lot from mothers who are more advanced in pregnancy than I am, or who have already had a child. I was able to anticipate a lot of things (useful and useless things to buy for example) and also learn about administrative procedures that I didn't know about. It also allowed me to realize at what stage I would start to feel baby, or what the mucous plug was etc.*" Information are not just delivered as a something to be learned but as the outcomes of contextual and personal experiences. Women's coping strategies when facing a lack of information as consumers are often a kind of « bricolage » based on prior knowledge and information found online (from one or different sources). It is worth being noted that, despite a certain attention to identify inaccurate information, the acknowledgement of mixed emotions related to the struggle with bodily experiences contribute to both contextualization and credibility of the information. Our data do not enable us to say if such credibility is related to the era of doubt

and skepticism toward institutions or if it is related the multiple opportunities for reembodiment that create a feeling of authenticity. We can only note that the over-reliance on digital technologies as a tool for personal control may endanger consumer power and well-being and even provide disembodied experiences of pregnancy as Charlotte (25) puts very simply, without considering ceasing to use pregnancy apps : "*Sometimes we rely too much on these applications instead of really experiencing our pregnancy.*". Digital opportunities for reembodiment definitely affect the balance of power between consumer and the marketplace, subverting the relationships between resistance and vulnerability. The intimacy with one's own body leads individual to bear the responsibility of their own vulnerability, despite the fact that digital reembodiment is created out of an interaction between individuals and digital technologies.

DISCUSSION

The present research adds to the academic research on consumer vulnerability and resistance during pregnancy by shedding light on the different sources of digital reembodiment in specific digital environments (Facebook groups of mothers-to-be and mobile apps) structured by an inner tension between consumer resistance and consumer vulnerability that makes them often difficult to properly disentangle. Digital environments are perceived as ways for mothers-to-be to renegotiate their bodily experiences during this transition phase by escaping normative discourses on pregnancy, by « feeling » their pregnant body and by learning how to be a literate consumer in caring about themselves and their future child. The present framework of sources of reembodiment offers a promising area for future research to further explore power balance between mothers-to-be and market actors in digital environments and associated coping strategies, through a close attention to bodily experiences at the intersection between resistance and vulnerability. To this regard, the Mobius strip metaphor is useful to conceptualize the multiplicity of these bodily experiences, their entanglement and their importance for consumer's self. These findings further validate the notion of « *proteus effect* » (Belk, 2013) as one of the major consequence of reembodiment (*i.e.* the ability of online experiences to impact offline experiences), which is not without consequences in terms of consumer resistance, nor vulnerability. Some limitations should be underlined. Pregnant women were only interviewed once and methods such as projective techniques (The Voice Group, 2012) or participatory research techniques (Crockett, 2013) would have provided further information on the investigated topic. Future researche could develop innovative data collection adapted to investigate power balance between consumers and market actors in online settings as it may help to gain greater insight on consumer resistance, vulnerability and strategies to advance their own well-being. With regard to the topic of reembodiment in digital environments, a fruitful dialogue between consumer research and nursing research (Lupton, 2016) could advance academic knowledge of the transformative potential of digital environments for the well-being of mothers-to-be. By enhancing the need to take into account the experiences of pregnancy in online environments, this paper calls for more respectful online marketing practices that do not play on factors of vulnerability and actually align with pregnacy-related market actors rhetoric that are structured around an attention to well-being of mothers-to-be.

Table 1. Sources of Reembodiment in Online Experiences of Pregnancy.
SUMMARY TABLE

Sources of reembodiment	*Escaping normative discourses on pregnant bodies*	*Opportunities for increased literacies*	*Digital reenactment of liminality*
Consumer resistance practices	• Healing power of reading and writing bodily experiences in women' own terms shared online. • Feeling of empowerment resulting from digital storytelling and access to alternative bodily subjectivities.	• Rebuilding literacy capabilities through increased access to information. • Sharing and coping with feeling of powerlessness and anxiety related with changes in consumption routines and medical discourses about healthy lifestyle.	• Ability to connect with its future child away from medical discourses. Pregnancy-related mobile apps are considered as a tool to be connected with one's own baby without having to rely on medical appointments. • Creation of new bodily experiences of pregnancy that forges digital forms of liminality.
Factors of consumer vulnerability	• Simultaneous exposure to pregnancy advertising and to narratives of intense affective experiences whether positive (e.g birth) or negative (e.g perinatal grief). • Personal histories of women show that reembodiment in the digital world seem particularly important for women who went through particular difficult events regarding previous pregnancies (miscarriage, child death) or experienced social vulnerability during their pregnancy (lack of social support, separation or divorce)	• Consumer anxiety due to imbalances between consumers and the marketplace and a sense of powerlessness arising from individual-environment interactions. • Over-reliance on digital technologies as a tool for personal control may endanger personal power and well-being and create disembodied experiences of pregnancy. Pregnancy-related mobile apps and online support groups may be detrimental to appropriation of bodily experiences in shifting women's concerns away from their self to only focus on information.	• Exposure to marketing stimuli in highly emotional situations that may unconsciously affect consumers' choices. • « Intrusion » of digital technologies within the prenatal imaginary.

REFERENCES

Andreasen, Alan R., Marvin E. Goldberg, and M. Joseph Sirgy (2012), 'Foundational research on consumer welfare', in Mick, David Glen, Simone Pettigrew, Connie Pechmann, Julie L. Ozanne (Ed) Transformative consumer research for personal and collective well-being. New York: Routledge, 2012.

Atakan, S. Sinem, and Meltem Ture (2017). « Catching the Health Wagon: Consumers' Strategies of Control in Healthy Food Consumption ». *ACR North American Advances* NA-45.

Baker, Stacey, James Gentry, et Terri Rittenburg (2005). « Building Understanding of the Domain of Consumer Vulnerability ». *Journal of Macromarketing* 25 : 128-39.

Banister, Emma N., Margaret K. Hogg, and Mandy Dixon(2010). « Becoming a Mother: Negotiating Discourses Within the Life-Framing Identity Project of Motherhood ». *ACR North American Advances* NA-37.

Bardhi, Fleura, and Giana M. Eckhardt (2017). « Liquid Consumption ». *Journal of Consumer Research* 44, nº 3: 582-97.

Belk, Russell (2014). « Digital consumption and the extended self ». *Journal of Marketing Management* 30, nº 11-12: 1101-18.

Belk, Russell. « Extended Self in a Digital World ». *Journal of Consumer Research* 40 (2013): 477-500.

Bengtsson, A., et Firat, F. (2006). « Brand Literacy: Consumers' Sense-Making of Brand Management ». *ACR North American Advances* NA-33.

Bengtsson, Anders, and Fuat Firat (2006). « Brand Literacy: Consumers' Sense-Making of Brand Management ». *ACR North American Advances* NA-33.

Buchanan-Oliver, Margo, and Angela Cruz (2009). « The Body and Technology: Discourses Shaping Consumer Experience and Marketing Communications of Technological Products and Services ». *Advances in Consumer Research* 36.

Colatruglio, S., et Slater, J. (2014). « Food Literacy: Bridging the Gap between Food, Nutrition and Well-Being », 37-55.

Coleman, Gabriella(2010). « Ethnographic Approaches to Digital Media ». *Annual Review of Anthropology* 39.

Commuri, Suraj, and Ahmet Ekici (2008). « An Enlargement of the Notion of Consumer Vulnerability ». *Journal of Macromarketing* 28 : 183-86.

Crockett, David, Hilary Downey, A. Fuat Fırat, Julie L. Ozanne, and Simone Pettigrew (2013). « Conceptualizing a Transformative Research Agenda ». *Journal of Business Research* 66, nᵒ 8 : 1171-78.

Elgesem, Dag (2002). « What Is Special about the Ethical Issues in Online Research? » *Ethics and Information Technology* , 4, nᵒ 3: 195-203.

Fischer, Eileen, and Brenda Gainer (1993). « Baby Showers: A Rite of Passage in Transition ». *ACR North American Advances* NA-20.

Foucault, M. (1995). Discipline and punish : The birth of the prison (2nd Vintage Books ed). Vintage Books.

Grosz, Elizabeth (1994). *Volatile bodies: toward a corporeal feminism*. Theories of representation and difference. Bloomington: Indiana University Press.

Hayles, N. K. (1999). How we became posthuman : Virtual bodies in cybernetics, literature, and informatics. University of Chicago Press.

Hoffman, Donna L., and Thomas P. Novak (2018). « Consumer and Object Experience in the Internet of Things: An Assemblage Theory Approach ». *Journal of Consumer Research* 44, nᵒ 6 : 1178-1204.

Jennings, Rob, and Lisa Malley (2003). « Motherhood, Identity and Consumption ». *ACR European Advances* E-06.

Jensen Schau, Hope, and Mary C. Gilly (2003). « We Are What We Post? Self-Presentation in Personal Web Space ». *Journal of Consumer Research* 30, nᵒ 3 : 385-404.

Kvale, Steinar (2016). « Dominance Through Interviews and Dialogues »: *Qualitative Inquiry*.

Kvale, Steinar (1994). *InterViews: An introduction to qualitative research interviewing*. InterViews: An introduction to qualitative research interviewing. Thousand Oaks, CA, US: Sage Publications.

Lupton, D. (2016). The use and value of digital media for information about pregnancy and early motherhood : A focus group study. *BMC Pregnancy and Childbirth*, 16.

Nielsen-Bohlman, Lynn , Allison M. Panzer, and David A. Kindig (2004). *What Is Health Literacy?* National Academies Press (US).

Marie, Cécile, Sophie Cabut, Françoise Vendittelli, and Marie-Pierre Sauvant-Rochat. « Changes in Cosmetics Use during Pregnancy and Risk Perception by Women » (2016). *International Journal of Environmental Research and Public Health* 13, nᵒ 4: 383.

Matich, M., Ashman, R., & Parsons, E. (2019). #freethenipple – digital activism and embodiment in the contemporary feminist movement. *Consumption Markets & Culture*, 22(4), 337-362.

Mick, David (2006). « Meaning and mattering through transformative consumer research ». *Advances in Consumer Research* 33.

Mick, David Glen, and Susan Fournier (1998). « Paradoxes of Technology: Consumer Cognizance, Emotions, and Coping Strategies ». *Journal of Consumer Research* 25, nᵒ 2 : 123-43.

Mikkonen, Ilona, Nikhilesh Dholakia, Johanna Moisander, and Anu Valtonen (2011). « Consumer Resistance as Struggle over Subjectivity ».

Miller, Tina (2005). *Making sense of motherhood: a narrative approach*. Cambridge ; New York: Cambridge University Press.

Min, Hyun Jeong, and Lisa Peñaloza (2010). « Catch Me If You Can: Rethinking the Relationship of Body and Self Through Pregnancy ». *ACR North American Advances* NA-37.

Min, Hyun Jeong, and Lisa Peñaloza (2019). « The agentic body in immigrant maternal identity reconstruction: embodiment, consumption, acculturation ». *Consumption Markets & Culture* 22, nᵒ 3: 272-96.

Nash, Meredith (2012). *Making « postmodern » Mothers: Pregnant Embodiment, Baby Bumps and Body Image*. Houndmills, Basingstoke: Palgrave Macmillan.

Oakley, Ann. *Becoming a Mother* (1979). New York: Schocken Books.

Ogle, Jennifer Paff, Keila E. Tyner, and Sherry Schofield-Tomschin (2013). « The Role of Maternity Dress Consumption in Shaping the Self and Identity during the Liminal Transition of Pregnancy ». *Journal of Consumer Culture* 13, nᵒ 2: 119-39.

Pink, Sarah, Heather Horst, John Postill, Larissa Hjorth, and Tania Lewis (2015). *Digital Ethnography: Principles and Practice*. Los Angeles: SAGE Publications Ltd.

Prothero, A., Davies, A., Dobscha, S., & O'Malley, S. G. O. (2006). Special Session : Researching Motherhood: Experience, Empowerment and Embodiment. *ACR Gender and Consumer Behavior*, GCB-08.

Rich, Adrienne C (1995). *Of Woman Born: Motherhood as Experience and Institution (*1977). Reissued ed. Women's Studies. New York: Norton.

Roux, D., Belk, R., Morwitz, V., Campbell, M., & Ger, G. (2018). The Body as (Another) Place : Producing Embodied Heterotopias Through Tattooing.

Sevin, Elodie, and Richard Ladwein (2008). « To Start Being…. The Anticipation of a Social Role Through Consumption in Life Transition: The Case of the First-Time Pregnancy ». *ACR North American Advances* NA-35.

Shilling, Chris (2005). *The Body in Culture, Technology and Society*. London.

Sørensen, Elin Brandi, and Thyra Uth Thomsen (2005). « The Lived Meaning of Symbolic Consumption and Identity Construction in Stable and Transitional Phases: Towards an Analytical Framework ». *European Advances in Consumer Research* 7 : 571-76.

The VOICE Group (2010). « Motherhood, Marketization, and Consumer Vulnerability ». *Journal of Macromarketing* 30, nᵒ 4: 384-97.

The VOICE Group (2012). « Buying into motherhood? Problematic consumption and ambivalence in transitional phases ». *Consumption Markets & Culture* 13, nᵒ 4: 373-97.

Tonner, Andrea (2012). « When Motherhood Is Too Hard to Face: Anti-Consumption in Difficult Pregnancy ». In *NA - Advances in Consumer Research Volume 40*, 357-62.

Venkatesh, Alladi. « Cyberspace as the Next Marketing Frontier (?)-Questions and Issues », 2000.

Vidgen, Helen Anna, and Danielle Gallegos (2014). « Defining Food Literacy and Its Components ». *Appetite* 76: 50-59.

Yngfalk, Carl, and Anna Fyrberg Yngfalk (2015). « Creating the Cautious Consumer: Marketing Managerialism and Bio-Power in Health Consumption ». *Journal of Macromarketing*.

Consumer Creativity: Materializing the Moleskine Notebook in Digital Space

Christiane Aufschnaiter, MCI The Entrepreneurial School, Austria

INTRODUCTION

In a time where digital technologies have entered almost every sphere of consumers' everyday life, consumer researchers are observing a re-emergence of analogue consumption objects such as vinyl, Polaroid cameras, or paper notebooks (Bartmanski and Woodward 2015; Humayun and Belk 2020; Minniti 2016; Sax 2016). Some findings reveal symbolic aspects of these forms of retro-consumption and consumers' nostalgic desires (Alexis 2017; Reynolds 2011; Sax 2016), while others focus on consumers' need to disconnect from the digital (Humayun and Belk 2020; Thorén et al. 2019). Recent studies highlight that a sharp delineation of the physical and the digital (Jurgenson 2012), or offline and online identities (Šimůnková 2019) is no longer possible. The boundaries are blurring and "no one lives an entirely digital life and [...] no digital media or technology exists outside of networks that include analogue and other media technologies" (Horst and Miller 2012, 16). Thus, studies of analogue consumption objects should not be limited to physical space but include processes that take place across digital and physical space (Magaudda and Minniti 2019)in short, ?retromedia?.

This study focuses on the Moleskine paper notebook, an object that was originally deeply rooted in physical space both as an object and regarding its associated practices such as writing or drawing. Today, Moleskine successfully combines the myth of its origins with the positioning as a brand that accompanies contemporary creative nomads with digital and analogue tools (Humayun and Belk 2020; Moleskine 2019). This paper explores digital traces of consumers' ways of using and relating to the Moleskine notebook on Twitter. Prior research on the Moleskine notebook has either focused on contrasting the use of an analogue object and a digital alternative (Humayun and Belk 2020) or on writing practices in physical space (Alexis 2017). By following the Moleskine notebook into the digital space, this study aims to investigate how consumers integrate an analogue object into their everyday life across digital and physical space. Drawing on theories of consumer creativity and materiality, this study examines not only symbolic and discursive aspects of these forms of consumption but links them with material aspects and related creative practices. The findings reveal three creative practices that show how consumers materialize an analogue object that seemed to be outdated and obsolete in the digital era.

THEORY

Consumer creativity

The imperative to be creative, the so-called creativity dispositif, is currently reshaping and restructuring society as a whole and consumption specifically (Reckwitz 2017). As a response to the lack of affect in modernity, creative practices that have previously been specific to the artistic field have now spread throughout society and the economy. The internet enables consumers to expose themselves to and express their creativity. As a platform for creative works, it facilitates the circulation of "everyday creative products" (Literat 2019, 1169). Furthermore, digital platforms and online communities enable consumers' collective creativity (Kozinets, Hemetsberger, and Schau 2008) as they "trigger new interpretations and new discoveries" (Kozinets et al. 2008, 341) in a dynamic process of combining "self- and collectively sustained curiosity and drive" (Kozinets et al. 2008, 351).

This study builds on these understandings of creative consumers as active agents in an ongoing process of innovating consumption objects and related practices (Shove and Pantzar 2005)it is not enough to show that goods are symbolically and materially positioned, mediated and filtered through existing cultures and conventions. Twisting the problem around, the further challenge is to explain how practices change and with what consequence for the forms of consumption they entail. In this article, we suggest that new practices like Nordic walking, a form of 'speed walking' with two sticks, arise through the active and ongoing integration of images, artifacts and forms of competence, a process in which both consumers and producers are involved. While it makes sense to see Nordic walking as a situated social practice, such a view makes it difficult to explain its growing popularity in countries as varied as Japan, Norway and the USA. In addressing this issue, we conclude that practices and associated cultures of consumption are always 'homegrown'. Necessary and sometimes novel ingredients (including images and artifacts. The study extends these perspectives by linking consumer creativity with theories of materiality and focusing on the consumption object as an element that shapes and is shaped by consumers.

Materiality & consumer-object relations

The role of objects in shaping consumers' identities has been studied extensively in consumer research (Ahuvia 2005; Belk 1989; Csikszentmihalyi and Rochberg-Halton 1981; Wallendorf and Arnould 1988; Woodward 2011). More specifically, scholars have focused on the material aspects of consumer-object relations to account for the co-constitutive and co-creative relationship between objects and consumers (Bartmanski and Woodward 2015; Borgerson 2005, 2013; Mardon and Belk 2018; Miller 2005, 2008). In a process of objectification, consumers rework objects to support their identity projects and thus, are transformed by the objects themselves (Ferreira and Scaraboto 2016; Miller 2005).

Following new materialism, consumption objects should not be viewed as fixed and finished entities but as constantly evolving and in a state of becoming (Ingold 2012). The material substance of objects is an important element in the consumer-object relation and should be seen as a potential "for further making, growth, and transformation" (Ingold 2012, 435). Thus, the materiality of objects shapes the ways in which objects can be used as it invites or discourages certain behaviors (Mardon and Belk 2018). Theories of materiality and consumer-object relations offer a theoretical lens that allows a deeper understanding of consumers' "culturally situated material interactions" (Ferreira and Scaraboto 2016, 192) with the Moleskine notebook.

METHODOLOGY

This study uses a netnographic approach (Kozinets 2020). The author observed and participated in Moleskine consumers' conversations on social media platforms (Facebook, Reddit, Twitter) for six months to gain insights into what people talk about, how they use, and how they integrate the paper notebook into the digital space. Data collection was narrowed down to Twitter, as a first exploratory analysis has revealed a large variety of practices on this platform. 1,682 tweets were collected via the Netlytic app (keyword Moleskine, language English) in January and February 2020. After excluding retweets, tweets that were not related to the Moleskine notebook brand, promotional content, and content that was not generated by

consumers, 738 (self-)expressive tweets were classified according to the Moleskine product category they refer to: *paper notebooks/planners, digital devices/apps, pens/pencils, bags/accessories,* or *others.* The subsequent qualitative analysis focuses on the 570 tweets that show or mention the product category *paper notebooks/planners.* Data includes consumer-generated text and images. Tweets were analyzed in an iterative process of inductive categorization and abstraction (Marwick 2014; Spiggle 1994). Images were analyzed using critical visual content analysis techniques (Rose 2012).

FINDINGS

The author identified three recurrent practices that show how consumers express their use of and relation with the Moleskine notebook on Twitter. In the following, these practices are described in detail (Table 1).

Nourishing an image of the creative self through making analogue practices visible in digital space

The analysis reveals that the Moleskine notebook enters the digital space in the reproduced form of a digital image (Minniti 2016; Neef and van Dijck 2011) as consumers share images of their creative works on Twitter. This act of displaying is a communicative strategy that "delivers the personal to the public" (Noy 2019, 3). There is little interaction among consumers and posts often include a URL to images on Instagram, where the purpose of the tweets is to frame the images (Noy 2019) and increase their visibility (Arvidsson and Caliandro 2016; Marwick 2014).

Some images depict analogue creative works such as drawings, paintings, or handwritten texts without any other material elements. In these cases it is impossible to tell whether consumers indeed use a Moleskine notebook or only mention the Moleskine brand as a vehicle for publicity (Arvidsson and Caliandro 2016). However, most images also depict additional material elements that are involved in analogue practices of producing creative works. These images reveal various strategies how consumers "transform digital reproductions into meaningful carriers of analogue practice[s]" (Minniti 2016, 37) and make these otherwise rather private, creative practices visible in digital space: Consumers explicitly show the Moleskine notebook and highlight its distinctive characteristics such as the rounded corners or the elastic page-holder. Images focus on the material substance of the paper or include other material elements such as pens or body parts, mostly the hand. Furthermore, images are placed in the environment where they were drawn, showing, for instance, a desk or the original motif of the drawing. Digital post-processing such as applying filters or adding digital text is limited. Thus, consumers emphasize the "analogue experience" (Minniti 2016, 37) and materiality of digital images in order to authentically present themselves and their creativity online.

Deriving meaning from expanding the creative use of the notebook

Furthermore, the findings show that consumers use Twitter as a platform to discuss their ways of using the Moleskine notebook with other consumers. They collectively enhance their creative skills, integrate new material elements, and thus establish new ways of using the Moleskine notebook in both digital and physical space. Consumers derive enjoyment from skillful engagement with objects (Csikszentmihalyi and Rochberg-Halton 1981; Watson and Shove 2008). As the case of the Moleskine notebook shows, engagement with an analogue object is not limited to physical space but extended to digital space. Consumers discuss how the material affordances of the notebook, that is its material surface, its fillability, its mobility, and

the related aura of authenticity (Noy 2019), structure their creative practices. These affordances can either enhance or limit consumers' ways of using the notebook, as the following examples show: *"beyond excited to start filling in my new @moleskine wonder how fast I can finish this one !!"; "You're going to laugh at me, but I've used Moleskine notebooks for 20+ years even though my favorite pens bleed through the pages."*
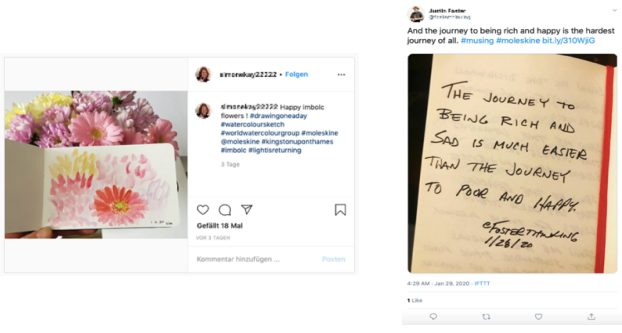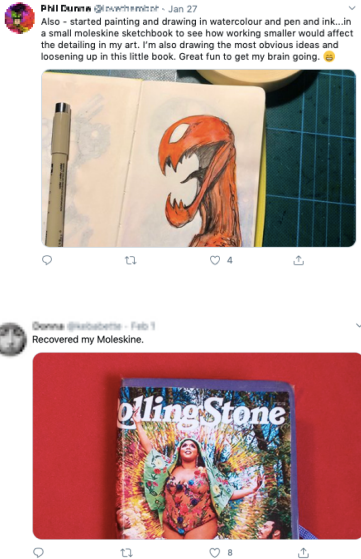
The creative use of the notebook involves the active integration of material elements and skills (Shove and Pantzar 2005). Consumers develop relevant skills not only through physical engagement with the notebook but also through seeking advice from other consumers and drawing inspiration from their ways of using the Moleskine notebook on Twitter. Consumers describe their creative practices and the involved objects in detail. Some practices relate to the main functional purpose of notebooks such as writing, note-taking, drawing, painting, sketching, or journaling, while others are more innovative such as transferring analogue content to a digital form. Other practices highlight how consumer invest symbolic meaning in their notebooks by engaging in rituals such as customizing the cover or collecting notebooks (McCracken 1986; Wallendorf and Arnould 1988; Woodward 2012). Further objects involved in these rituals are, for instance, writing tools such as pens or pencils, decorative items such as stickers or washi tapes, and also digital devices or apps. Consumers emphasize how they skillfully combine various objects and how the integration of these material elements results in creative practices in digital and physical space.

Relating to the notebook as a companion across digital and physical space

The Moleskine notebook can be seen as a transitional object (Ferreira and Scaraboto 2016; Winnicott 1971) that has the capacity to support consumers' identity projects across digital and physical space and through time. Interactions between consumers and transitional objects are "capable of producing [...] imagination, emotions and desires for self-transformation" (Ferreira and Scaraboto 2016, 195). The findings suggest that the Moleskine notebook is an object that provokes emotions as consumers express their love (*"Forever a @moleskine fan"*) or dislike (*"I'm in the embarrassing position of being totallysick of the Moleskine aesthetic"*) in emotional, affective tweets. They show their attachment by talking about "*my moleskine*" or "*my moleskine family*". Consumers assign almost human properties to the notebook and state that they could not live without the notebook: "*I've become the person who can't go a single day without their moleskine.*" Also, consumers reveal the importance of the Moleskine notebook by naming it as one of the five things they could not live without or would never leave the house without. Not having the notebook with them or losing it, makes consumers feel distressed and incomplete as if the notebook were a part of themselves (Belk 1989).

Some consumers express ambivalent feelings regarding the use of the Moleskine notebook. The material substance of the notebook, images and descriptions of other consumers' creative practices, and Moleskine's positioning as a brand that "accompanies the creative and imaginative professions of our time" (Moleskine 2019) seem to put consumers under pressure to produce aesthetic, creative works themselves. They believe that they cannot live up to these expectations and are reluctant to write into the notebook: *"I wish I was one of those artists that could fill up a sketchbook in a couple of weeks, that tells a remarkable story [...]."* As this quote suggests, the Moleskine notebook may induce a desire for the consumers' self-transformation.

Table 1: Findings – Three creative practices

Creative practices	Examples
Nourishing an image of the creative self through making analogue practices visible in digital space - Digital circulation of paintings, drawings, handwritten texts, collages or a combination - Depicting material elements involved in the analogue creative practice, emphasizing analogue experience and materiality of digital images o Making the notebook and additional writing tools visible o Showing the environment where the pictures were drawn o Limiting digital post-processing	
Deriving meaning from expanding the creative use of the notebook - Developing new ways of using the Moleskine notebook through active integration of material elements and skills o Drawing on the notebook's material affordances o Enhancing creative skills by seeking advice and drawing inspiration from other consumers o Establishing new creative practices through skillful integration of material elements	
Relating to the notebook as a companion across digital and physical space - The Moleskine notebook as transitional object that supports consumers' identity projects across digital and physical space and through time o Expressing strong attachment to and humanizing the notebook o Expressing ambivalent feelings associated with the perceived pressure to be creative	

DISCUSSION

The case of the Moleskine notebook shows that understanding the re-emergence of this analogue object only as a nostalgic return to analogue forms of consumption leaves important aspects underresearched. Instead of "escaping the digital realm through postdigital consumption" (Humayun and Belk 2020, 3), Moleskine consumers derive meaning from creatively combining digital and analogue aspects of consumption. This study contributes to our understanding of this phenomenon by focusing on the co-constitutive relationship between consumers and objects on the one hand and the digitalization of materiality in social media on the other hand. Rather than rendering the analogue notebook obsolete, digitalization plays an important role in reconfiguring the materiality of the notebook (Minniti 2016).

The study identifies three creative practices regarding consumers' use of and relation with the Moleskine notebook that can be observed on Twitter: First, consumers make their analogue creative practices visible in digital space through displaying authentic images of the notebook, creative outcomes, and related creative practices. Thus, an analogue object that used to be associated with private content (Noy 2019) is transformed into an object of public display that supports consumers in their aim for gaining attention in digital space (Arvidsson and Caliandro 2016; Eckhardt and Bardhi 2020) through conveying a favorable, and sometimes probably just desired image of a creative, artistic self. Second, consumers inspire other consumers or draw inspirations from their creative expressions on Twitter, and thus expand their use of the Moleskine notebook in digital and physical space. These innovative, creative practices concern the functional use of the notebook and, even more importantly, ways of turning a mass-produced notebook into a singularized, meaningful object with a high symbolic and emotional value for consumers (Csikszentmihalyi and Rochberg-Halton 1981; Epp and Price 2010; Kopytoff 2014). Third, the findings show how consumers refer to the notebook as a meaningful companion across digital and physical space, thus challenging literature on the vanishing importance of material objects in liquid modernity (Bardhi and Eckhardt 2017; Bardhi, Eckhardt, and Arnould 2012). On the one hand, the materiality of the Moleskine notebook gives consumers the flexibility to invest the notebook with new meanings and to use it in innovative and creative ways. On the other hand, it provides a sense of continuity and structure to consumers' lives and supports their identity projects across digital and physical space and through time.

This paper shows that in order to better understand the recent success of analogue objects such as the Moleskine notebook, future research should look at consumers' individual and collective creative practices across digital and physical space in more detail. Consumers enact these practices, and thus materialize a seemingly outdated, analogue object as a meaningful, desired object that plays an important role in both digital and physical space. The study has two main limitations. First, it focuses on one brand and data from one digital platform. Second, this study only investigates creative practices that were observed online. Thus, further research should examine consumers' creative practices evolving around other brands in both online and offline field sites.

REFERENCES

Ahuvia, Aaron C. (2005), "Beyond the Extended Self: Loved Objects and Consumers' Identity Narratives," *Journal of Consumer Research*, 32(1), 171–84.

Alexis, Cydney (2017), "The Symbolic Life of the Moleskine Notebook: Material Goods as a Tableau for Writing Identity Performance," *Composition Studies*, 45(2), 32–54.

Arvidsson, Adam and Alessandro Caliandro (2016), "Brand Public," *Journal of Consumer Research*, 42(5), 727–48.

Bardhi, Fleura and Giana M. Eckhardt (2017), "Liquid Consumption," *Journal of Consumer Research*, 44(3), 582–97.

Bardhi, Fleura, Giana M. Eckhardt, and Eric J. Arnould (2012), "Liquid Relationship to Possessions," *Journal of Consumer Research*, 39(3), 510–29.

Bartmanski, Dominik and Ian Woodward (2015), "The Vinyl: The Analogue Medium in the Age of Digital Reproduction," *Journal of Consumer Culture*, 15(1), 3–27.

Belk, Russell W. (1989), "Extended Self and Extending Paradigmatic Perspective," *Journal of Consumer Research*, 16(1), 129–32.

Borgerson, Janet L. (2005), "Materiality, Agency, and the Constitution of Consuming Subjects: Insights for Consumer Research," *Advances in Consumer Research*, 32, 439–43.

——— (2013), "The Flickering Consumer: New Materialities and Consumer Research," *Research in Consumer Behavior*, 15, 125–44.

Csikszentmihalyi, Mihaly and Eugene Rochberg-Halton (1981), *The Meaning of Things: Domestic Symbols and the Self*, Cambridge: Cambridge University Press.

Eckhardt, Giana M. and Fleura Bardhi (2020), "New Dynamics of Social Status and Distinction," *Marketing Theory*, 20(1), 85–102.

Epp, Amber M. and Linda L. Price (2010), "The Storied Life of Singularized Objects: Forces of Agency and Network Transformation," *Journal of Consumer Research*, 36(5), 820–37.

Ferreira, Marcia Christina and Daiane Scaraboto (2016), "'My Plastic Dreams': Towards an Extended Understanding of Materiality and the Shaping of Consumer Identities," *Journal of Business Research*, 69(1), 191–207.

Horst, Heather A. and Daniel Miller (2012), "The Digital and the Human: A Prospectus for Digital Anthropology," in *Digital Anthropology*, London: Berg, 3–35.

Humayun, Mariam and Russell Belk (2020), "The Analogue Diaries of Postdigital Consumption," *Journal of Marketing Management*, 1–27.

Ingold, Tim (2012), "Toward an Ecology of Materials," *Annual Review of Anthropology*, 41(1), 427–42.

Jurgenson, Nathan (2012), "When Atoms Meet Bits: Social Media, the Mobile Web and Augmented Revolution," *Future Internet*, 4(4), 83–91.

Kopytoff, Igor (2014), "The Cultural Biography of Things: Commoditization as Process," in *The Social Life of Things*, Cambridge University Press, 64–92.

Kozinets, Robert V. (2020), *Netnography. The Essential Guide to Qualitative Social Media Research*, 3rd ed., London: Sage Publications.

Kozinets, Robert V., Andrea Hemetsberger, and Hope Jensen Schau (2008), "The Wisdom of Consumer Crowds: Collective Innovation in the Age of Networked Marketing," *Journal of Macromarketing*, 28(4), 339–54.

Literat, Ioana (2019), "Make, Share, Review, Remix: Unpacking the Impact of the Internet on Contemporary Creativity," *Convergence*, 25(5–6), 1168–84.

Magaudda, Paolo and Sergio Minniti (2019), "Retromedia-in-Practice: A Practice Theory Approach for Rethinking Old and New Media Technologies," *Convergence*, 25(4), 673–93.

Mardon, Rebecca and Russell Belk (2018), "Materializing Digital Collecting: An Extended View of Digital Materiality," *Marketing Theory*, 18(4), 543–70.

Marwick, Alice (2014), "Ethnographic and Qualitative Research on Twitter," in *Twitter and Society*, ed. Katrin Weller, Axel Bruns, Jean Burgess, Merja Mahrt, and Cornelius Puschmann, New York: P. Lang, 109–22.

McCracken, Grant (1986), "Culture and Consumption: A Theoretical Account of the Structure and Movement of the Cultural Meaning of Consumer Goods," *Journal of Consumer Research*, 13(1), 71–84.

Miller, Daniel (2005), "Materiality: An Introduction," in *Materiality*, ed. Daniel Miller, Durham: Duke University Press.

——— (2008), *The Comfort of Things*, Cambridge: Polity Press.

Minniti, Sergio (2016), "Polaroid 2.0 Photo-Objects and Analogue Instant Photography in the Digital Age," *Tecnoscienza-Italian Journal of Science & Technology Studies*, 7(1), 17–43.

Moleskine (2019), "The History," https://mymoleskine.moleskine.com/journalist/press/the_history.pdf.

Neef, Sonja and José van Dijck (2011), "Sign Here! Handwriting in the Age of Technical Reproduction: Introduction," in *Sign Here! Handwriting in the Age of New Media*, ed. José van Dijck, Sonja Neef, and Eric Ketelaar, Amsterdam: Amsterdam University Press, 7–19.

Noy, Chaim (2019), "Voices on Display: Handwriting, Paper, and Authenticity, from Museums to Social Network Sites," *Convergence*, 1–18.

Reckwitz, Andreas (2017), *The Invention of Creativity: Modern Society and the Culture of the New*, Cambridge: Polity Press.

Reynolds, Simon (2011), *Retromania: Pop Culture's Addiction to Its Own Past*, London: Macmillan.

Rose, Gillian (2012), *Visual Methodologies: An Introduction to Researching with Visual Materials*, London: Sage Publications.

Sax, David (2016), *The Revenge of Analog: Real Things and Why They Matter*, New York: PublicAffairs.

Shove, Elizabeth and Mika Pantzar (2005), "Consumers, Producers and Practices: Understanding the Invention and Reinvention of Nordic Walking," *Journal of Consumer Culture*, 5(1), 43–64.

Šimůnková, Klára (2019), "Being Hybrid: A Conceptual Update of Consumer Self and Consumption Due to Online/Offline Hybridity," *Journal of Marketing Management*, 35(1–2), 40–74.

Spiggle, Susan (1994), "Analysis and Interpretation of Qualitative Data in Consumer Research," *Journal of Consumer Research*, 21(3), 491–503.

Thorén, Claes, Mats Edenius, Jenny Eriksson Lundström, and Andreas Kitzmann (2019), "The Hipster's Dilemma: What Is Analogue or Digital in the Post-Digital Society?," *Convergence*, 25(2), 324–39.

Wallendorf, Melanie and Eric J. Arnould (1988), "'My Favorite Things': A Cross-Cultural Inquiry into Object Attachment, Possessiveness, and Social Linkage," *Journal of Consumer Research*, 14(4), 531–47.

Watson, Matthew and Elizabeth Shove (2008), "Product, Competence, Project and Practice: DIY and the Dynamics of Craft Consumption," *Journal of Consumer Culture*, 8(1), 69–89.

Winnicott, Donald W. (1971), *Playing and Reality*, London: Routledge.

Woodward, Ian (2012), "Consumption as Cultural Interpretation: Taste, Performativity, and Navigating the Forest of Objects," in *The Oxford Handbook of Cultural Sociology*, ed. C. Alexander, Jeffrey, Ronald N. Jacobs, and Philip Smith, Oxford: Oxford University Press, 671–97.

——— (2011), "Towards an Object-Relations Theory of Consumerism: The Aesthetics of Desire and the Unfolding Materiality of Social Life," *Journal of Consumer Culture*, 11(3), 366–84.

From Aesthetic to Epistemic Consumption: Analyzing Knowledge Practices in Consumption Collectives

Jan-Hendrik Bucher, University of St. Gallen, Institute for Customer Insight, St. Gallen, Switzerland

Niklas Woermann, University of Southern Denmark, Department of Marketing & Management, Odense, Denmark

Johanna Gollnhofer, Institute for Customer Insight, St. Gallen, Switzerland

INTRODUCTION

Inspired by consumers' current concerns with climate and health sciences, we follow the popular insight that we live in a knowledge society (Stehr 2012). This knowledge orientation even manifests in everyday consumption. Daily, consumers collectively create, legitimize, share, accumulate, and consume *epistemic knowledge*, i.e. explicit, tangible, and objective knowledge that manifests in data, facts, and information. Prior research acknowledges that knowledge is essential for collective consumption, but primarily examines a cultural conception of knowledge in a tacit sense focusing on cultural dispositions such as aesthetics or taste (cf. Kozinets, Patterson, and Ashman 2016; Maciel and Wallendorf 2016; Schau, Muñiz Jr, and Arnould 2009; Seregina and Weijo 2016). This paper explores the collective pursuit of epistemic (quasi-scientific) knowledge practices as a consumption activity. We present a comparative case study of two highly-specialized knowledge-intensive consumption collectives, game-breakers and drone racers, to show that practicing quasi-scientific knowledge can likewise drive and structure consumption collectives. Linking our findings to the rich literature on consumption collectives, we ask: *How is Epistemic Knowledge Practiced in Consumption Collectives?*

New insights into knowledge-intensive consumption collectives allow us to better understand consumption phenomena in contemporary consumer culture such as expert systems (Latour and Deighton 2018), nerd- or geek- cultures (Seregina and Weijo 2016), self-trackers (Etkin 2016; Lupton 2014), online forums and communities (Arvidsson and Caliandro 2015; Kozinets, Hemetsberger, and Schau 2008; Mathwick, Wiertz, and De Ruyter 2008; Stokburger-Sauer and Wiertz 2015; Woermann and Kirschner 2015), open-source movements (Arvidsson 2011; Hemetsberger and Reinhardt 2009; Ratto 2005), hacker cultures (Thomas 2002), fandom (Busse 2006; Kozinets 2001, 2007), and consumers communing around complex focal objects (Muniz and Schau 2005; Zwick and Dholakia 2006a, b). This literature has shown us that collective consumption is intertwined with knowledge practices and that there are no consumption collectives not pervaded by knowledge.

THEORY

We employ a practice-theoretical analytical approach (Reckwitz 2002; Schatzki 2002) to classify focal knowledge-practices in consumption collectives. We base our classification on the distinction between tacit cultural forms of knowledge (i.e. about aesthetics or taste) versus explicit epistemic forms of knowledge, as well as on collectives focusing on sharing versus crafting knowledge. Our simplified two-dimensional view emphasizes the interplay of epistemic and aesthetic collective consumption. Our analytical classes are not intended to be entirely orthogonal or exhaustive, and neither mutually exclusive.
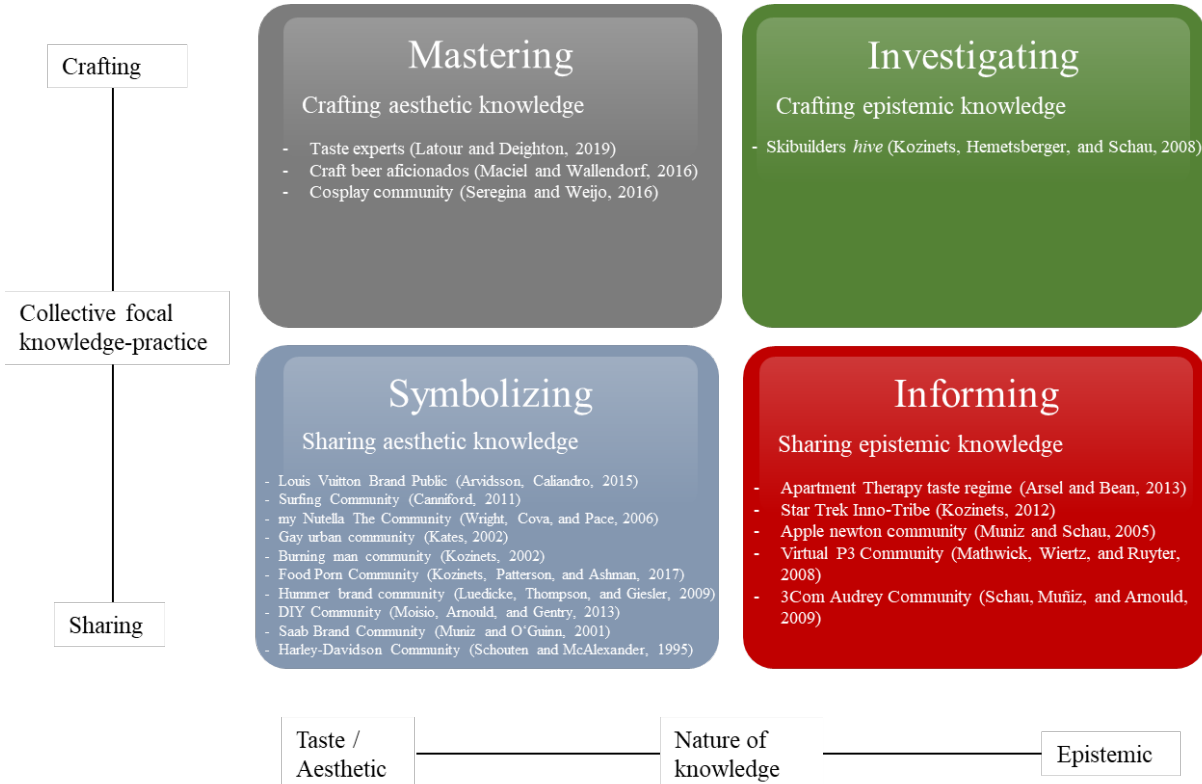
Figure 1: Focal knowledge-practices in consumption collectives

The two-dimensional structure yields four ideal types of focal knowledge-practices in consumption collectives: *Symbolizing*, *Informing*, *Mastering*, and *Investigating*.

We determine s*ymbolizing* as the focal practice of consumption collectives that share knowledge of taste or aesthetics. These consumers primarily engage in collective consumption to define their identity and/or to establish interpersonal relations. Here, the focal object is perceived as a carrier of (cultural) meaning symbolizing identity and status (Arnould and Thompson 2005). Consumption collectives sharing taste and/or aesthetic knowledge are studied diversely and profoundly in the rich literature strand of *Consumer Culture Theory* as most literature in this research stream falls into this broad class.

We further identified *informing* as focal knowledge-practice in certain consumption collectives. Consumers share epistemic knowledge in the form of *peer-to-peer* problem solving to build social capital (Mathwick et al. 2008) and hereby idealize the focal consumption object (Muniz and Schau 2005; Schau et al. 2009). As in the consumption collectives focusing on *symbolizing*, in this class, the object primarily serves as a carrier of meaning. However, its complexity is perceived as high due to the epistemic character of tangible knowledge that consumption with the object yields. Research has partially covered collective consumption phenomena whereby an analytical focus is on continuing discontinued market offerings (Kozinets 2007; Mathwick et al. 2008; Muniz and Schau 2005; Schau et al. 2009).

Consumption collectives focusing on *mastering* practice taste or aesthetics to craft knowledge. Here, the focal objective in collective consumption is to become *connoisseurs*. Knowledge is generated through the endeavor of reaching or approaching *mastery*. As with consumption collectives focusing on *symbolizing,* knowledge is defined in a Wittgensteinian sense of (sub)cultural competence (Schatzki, 1996; Warde, 2005) and thus of a tacit nature. The focal object is perceived as a complex carrier of information that can be analyzed and interpreted. Most research in this field explicitly focuses on taste (of high-class beverages) yet (Latour and Deighton 2018; Maciel and Wallendorf 2016).

Finally, we identify consumption collectives that craft explicit epistemic knowledge with the focal objective of *investigating*. Consumption collectives in this class unite around a focal knowledge project that is complex enough to generate questions and to be unfolded and explored (almost) indefinitely. Consumers enjoy the intellectual challenge of collectively and creatively exploring complex (technical) consumption objects to overcome limitations and to achieve novel and clever outcomes. Thus, as opposed to the other classes, we define the collective innovation orientation in terms of crafting *new* knowledge as high. Compared to consumption collectives interested in *symbolizing* or *mastering*, taste and aesthetics are rather unimportant for these consumption collectives. Since *investigating* is the focal practice in these consumption collectives the structuring forces of knowledge are exceptionally high.

Having organized focal knowledge-practices in consumption collectives, we conclude that knowledge practices decisively shape collective consumption. We see that collective consumption is intertwined with knowledge and that there are no consumption collectives not pervaded by knowledge practices. However, most research focuses on knowledge in a Bourdieuian sense of accumulable field-specific disposition (Bourdieu 1984) or in a Wittgensteinian sense of (sub)cultural competence (Schatzki 1996; Warde 2005) (as it is the case with consumption collectives interested in *symbolizing* and *mastering*). Inspired by consumption collectives crafting epistemic knowledge we spot a research gap. With this study we propose an analytical *knowledge-based* approach to studying, categorizing, and understanding knowledge-intensive consumption collectives.

CONTEXTS

To study the focal knowledge practice of crafting epistemic knowledge in consumption collectives, we comparatively analyze two highly-specialized knowledge-intensive consumption collectives where epistemic practices are vividly exposed.

First, we studied drone racing, a competitive team sport notable for its demand for engineering skills, scientific understanding, and highly-intense adrenalin-drenched races at the intersection of e-sports and real-live racing. Drone racing or 'FPV' (first-person view) racing is one of the "fastest-growing sports in the world" (Stock 2015) where pilots control their small quadcopters remotely while wearing goggles which display the video signal from a small camera mounted to the drone in real-time. In races, up to ten pilots compete against each other. The race track is usually built out of various kinds of gates which the drones have to pass reaching speeds up to 130 km/h (Rohe 2017). Crafting and advancing the racing drone is not only directly linked to a competitive advantage in races but also a crucial step in legitimizing oneself as a member. As practitioners research, tinker, test, and experiment, community-specific knowledge is created, bundled, and shared. Ultimately, much more time, energy and resources are invested in crafting drones as compared to racing them.

Second, we studied game-breaking, a highly demanding activity of crafting understanding of games through collaborative quasi-scientific processes with the goal of optimizing for speed, minimum number of a-button presses, or the like. What they all have in common is that they do not operate within the logic of the game intended by the designers, but follow their own arbitrary rules. Therefore, we define game-breaking as a metagame, a game of optimization that transcends outside of the prescribed intentions of the video game. *Game-breakers* are well-connected and engaged technology enthusiasts who are keen to experiment. They enjoy the intellectual challenge of creatively exploring the game to overcome limitations and to optimize playthroughs. To reach their goal of optimization they collectively, dedicatedly, patiently, and persistently engage in, sometimes painstaking, quasi-scientific processes for hundreds over hundreds of hours of exploring, analyzing, and deconstructing the focal object. To craft understanding, game-breakers commonly figure out how games are programmed to reverse-engineer them and break them apart aiming to solve the *puzzle* of finding the most optimal way to *beat* it. Game-breaking exists since video games have been around. However, once an underground hobby conducted by video-game players exchanging footage through obscure internet forums, since 2010 it has become an ever more rapidly growing global phenomenon, having occupied a significant place within game culture, reaching broader public attention, and even influencing the multi-billion dollar video game industry (Escobar-Lamanna 2019; Ford 2018; Lewis 2020; Scully-Blaker 2016; Warman 2019). Worldwide, game-breakers actively discuss in forums and via livestreaming platforms and stream and upload videos, with the most popular videos viewed tens of millions of times.

EMPIRICAL APPROACH

We conducted a comparative case analysis to discern similarities and differences of context-specific knowledge practices to develop our key theoretical themes with coherence and consistency.

In the fall of 2017, we joined a racing drone collective where we conducted a two-year multi-sited ethnographic study (Belk, Fischer, and Kozinets 2013) including participant observations on many

different occasions like test sessions, building meetings, race practices, social gatherings, and competitions. Additionally, throughout the project, we derived a multi-sited netnography (Kozinets 2009) from publicly available user-generated content (e.g., posts of various kind in social networks like *Facebook* or *Instagram*, on discussion boards, on blogs, and on *YouTube*), as well as from content published in (semi-)private contexts like closed Facebook groups, closed Instagram profiles, or private messages.

Additionally, we followed game-breakers for two years online as well as on fairs, resulting in numerous hours of netnographic investigation, as well as in ten ethnographic interviews and eight recorded in-depth interviews. Since knowledge practices are hidden in socio-structural characteristics of both consumption collectives, we combined various methods such as ethnography, netnography, in-depth interviews, ethnographic interviews, photo, video, and audio recording in natural settings that can be used for an in-depth analysis of practices around knowledge (Canniford and Shankar 2013; Gobo 2008; Valtonen, Markuksela, and Moisander 2010).

FINDINGS

Building on Lévi-Strauss' (1966) pioneering analysis of human (problem-solving) thinking, we emphasizing the collective (questioning) mindset "that uses knowledge, experimentation, and speculation to solve problems and reach goals" (Maciel and Wallendorf 2016) in consumption collectives. Hereby, we find that the consumption collectives we studied craft, legitimize, archive, and disseminate knowledge. Our data show that drone racers and game-breakers use epistemic knowledge (e.g. in the form of complex formulas or advanced theoretical understanding), epistemic practices (such as conducting controlled tests and/or experiments), and epistemic tools (such as simulation software or data analysis programs). Engaged in an enduring cycle of theorization/hypothesizing and testing/experimenting drone racers and game-breakers successively unfold the focal object and gain explicit knowledge (Zwick and Dholakia 2006a, b), which is incorporated back into the local respectively the global collective. Hereby, a finely-meshed network of circulating knowledge flows evolves.

Although we define both as epistemic consumption collectives, they are fundamentally different. Both have in common that they center around a knowledge project. Further, the focal knowledge project is never ultimately finished but remains in a permanent *beta*-state in the constant process of becoming a future aspiration (Zwick and Dholakia 2006a, b). However, both collectives differ in structure. Even though racing drone pilots inform themselves online and engage in online communities, they primarily practice epistemic knowledge offline in their local community. Their *knowledge system* is rather closed as they maintain crafted knowledge within the community and only share knowledge which is of a general nature and does not directly lead to competitive advantage. In contrast, game-breakers primarily engage online with the worldwide community. In this open knowledge system, game-breakers share (almost) all acquired knowledge publicly, including specialized cutting-edge knowledge. In other words: While drone racing collectives have sealed knowledge systems operating in parallel, game-breaking collectives constitute one common unrestricted open knowledge system. Due to the nature of the knowledge system, the focal knowledge project is discrete in racing drone collectives while it is joint in game-breaking collectives. Further, we find that drone racing pilots engineer the drone by adding, changing or manipulating components, while game-breakers reverse-engineer the focal game by breaking and unfolding it. In both approaches to crafting epistemic knowledge weak-points are identified as starting points for further

investigation. However, while drone racers identify weak-points by evaluating them against the background of the current technological possibilities and aspire to diminish them, game-breakers try to further expose and exploit them[1]. To advance their focal knowledge project drone racers are partially dependent on the market (i.e. they wait for better batteries to be developed). In contrast, game-breakers are independent of the market as they work against market development.

CONCLUDING DISCUSSION

Consumption in game-breaking and drone racing collectives is fueled by epistemic knowledge. We extend the state of research as we identify crafting epistemic knowledge as focal practice for certain consumption collectives. Hereby, we learn (1) how individuals communize[2] around knowledge-intensive domains provoking complex consumption activities, and (2) how the epistemic dimension of consumption decisively shapes collective consumption practices. By focusing on knowledge practices in the epistemic sense (Knorr Cetina 1999) we contribute to the analysis of *know-how* (Maciel and Wallendorf 2016; Seregina and Weijo 2016), of consumption knowledge (experiential expertise) (Clarkson, Janiszewski, and Cinelli 2012), and of tacit knowledge (Arsel and Bean 2012) in consumption collectives. We uncover that consumers craft *epistemic knowledge* in quasi-scientific ways internally in consumption collectives. Building on the vast literature strand interested in consumption collectives focusing on sharing a tacit cultural form of knowledge (i.e. about aesthetics or taste) we show that consumption collectives focusing on crafting epistemic knowledge do not only practice knowledge for building social status (c.f. Kozinets 2001; Schouten and McAlexander 1995), for establishing interpersonal relations (c.f. Cova 1997, 1999), or for defining their identity (Arnould and Thompson 2005) but that crafting epistemic knowledge itself (at least partially) guides their passion.
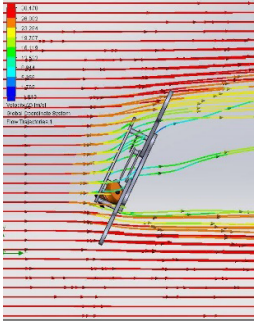
To acknowledge this accelerating consumer movement, we propose studying consumption collectives practicing (epistemic) knowledge. Our data show that knowledge-intensive consumption collectives decisively challenge the market as they shape and co-create market offerings through developing, improving, or breaking the focal object or project and thereby continuously push the market boundaries. Through joining individual expertise and engaging in epistemic practices of crafting understanding, a finely-meshed network of circulating knowledge flows evolves. The goal of collective consumption is to continuously improve understanding of a focal consumption object at the hub of the community.
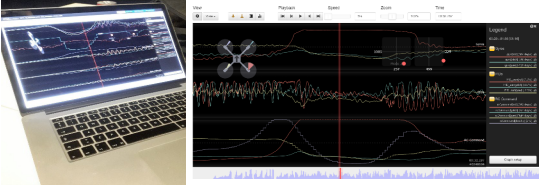
This study sheds light on (epistemic) knowledge practices in consumption collectives. In this way, we contribute to a better understanding of consumption in today's knowledge society, where collectively produced epistemic knowledge constitutes a basis for certain consumption practices. Furthermore, by understanding how consumers engage with epistemic knowledge we shed light on some of the current challenges of a knowledge society in which conspiracy theorists such as vaccination opponents or deniers of the climate change collectively produce *their own* knowledge just as quasi-scientifically as drone racers and game-breakers.

---

1   Game-breakers refer to these weak-points as bugs, glitches, or exploits.
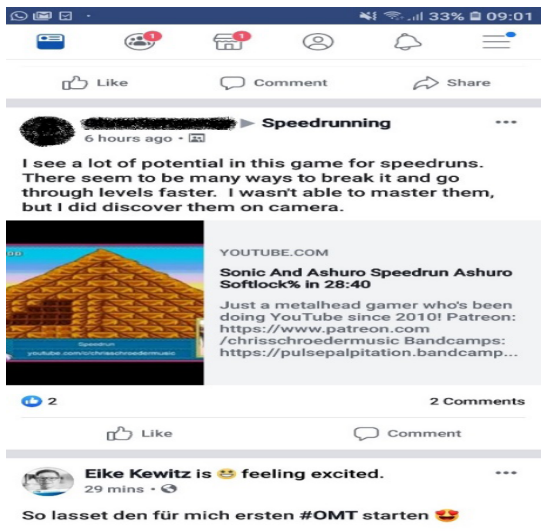
2   Translated by Schatzki, Theodore R. (2002), The Site of the Social: A Philosophical Account of the Constitution of Social Life and Change, University Park: Pennsylvania State University Press., original: Vergemeinschaftung Weber, Max (1922), "Wirtschaft Und Gesellschaft, Tübingen," Max Weber im Kontext. InfoS-oftWare Karsten Worm, Berlin, 2.

DATA TABLE

Knowledge-Practices	Drone Racing Illustrative Data	Game-Breaking Illustrative Data
Continuously striving towards a future aspiration	- "you can almost always improve, I guess that's also what is very exciting." (Interview, Informant 12, 1:01:50) - "You will never be done with improving the drone. It's always about improving the drone a little bit every day." (Ethnographic Interview, Informant 10, 01.03.2018)	- "I like to continue striving towards that theoretical perfect time, even though it's not going to happen, but that you feel motivated because I know I can always continue working towards it. I'm only going to get closer to it over time." (Interview, Informant 2, 1:10:15) - "I enjoy seeing like, how far you can exploit a game. Yeah, seeing like, what the absolute limit for a game speed run is." (Interview, Informant 1, 12:20)
Theory crafting / Hypothesizing	- "In his design process, Informant 10 optimizes the drone as much as possible by the aid of digital simulations and hopes that they are as close to the reality as possible and then constructs the drone and flies it outside." (Fiednotes, 07.04.2018)	- "Theory crafting is where you're coming up with possible ideas for shortcuts or glitches." (Interview, Informant 2, 31:42) - "I usually have a theory that could work and then I just try it out using different methods […] then you first look at 'okay is it theoretically feasible?' you look at 'okay what do I have available at that time?' and then of course you analyze what you can do with your available tools." (Interview, Informant 7, 21:33) - "we said 'okay, theoretically this can happen'. So I ended up being the person executing their idea." (Interview, Informant 2, 29:23)
Accumulating Knowledge	- "of course, there's always the ones who are a bit further than the others so that's there's different levels of experience and then you often go to the one with more experience of course if you have a problem you want to solve" (Interview, Informant 14, 40:58) - "these hobby message boards are really useful as well you can also just google stuff or find *YouTube* videos about […] DIY drones" (Interview, Informant 8, 09:10)	"I've been doing this every day actually; I go on *YouTube* and type in *spider reignited trilogy* [name of the game] glitch and I select for the last 24 hours every single video and watch them," (Interview, Informant 3, 40:25)
Sharing Knowledge	- "Helping others is part of the culture within drone communities" (Ethnographic interview, Informant 10, 07.04.2018) - "A lot of the things we share in the local community is also just the ideas and the new things like […] finding a new way of doing something" (Interview, Informant 12, 47:11) - "I guess […] we're kind of, eh among the pros in the […] very narrow areas and that's basically where we than think 'ok I can actually post something here' because we can actually help people." (Interview, Informant 14, 32:42)	"If I find something, I'll upload it within the next 10 to 15 minutes." (Interview, Informant 5, 16:34)
Experimenting / Testing	- "you have to go outside and then you find out 'oh it doesn't work' I go in again I find out 'oh it's because I haven't soldered this' or whatever and then you go out again it's a lot of going back and forth within experimenting." (Interview, Informant 16, 73:38) - "mostly testing in the hobby is pretty primitive so mostly […] you replace the component on your copter and fly and then see I it gets better or worse." (Interview, Informant 14, 09:40) - "He [Informant 11] stated that crashes are an important part of each experiment." (Fieldnotes, 07.04.2018)	"Basically all the programming behind the game is like the rules of the game, but you don't really […] see that. So all you have is the result […] if you press A Mario jumps, you see that. So by inferring, like by experimenting within the game, you find out about the rules of the game, and you sort of figure out how it works." (Interview, Informant 3, 39:16) "After mapping the wall collisions, I was like: 'Oh, so if I did this right, then this corner should have this open openness with the collision. So Mario should be able to go closer than normal.' So then I believe in the game I went at that point, I found out that yes, that was true." (Interview, Informant 2, 1:00:10)"

Analyzing Data	- Digital data can be gathered by a processor in the flight controller and extracted and analyzed by using an open-source software called *Betaflight*. Among others, this software provides information about the speed and acceleration of the drone, motor temperature, and the voltage consumption - "Informant 10 summarized this crash with the sentence: 'There is no bad data.'" (Fieldnotes, 07.04.2018) 	For the analysis, frame-specific data regarding the position in space, the memory cache, Mario's speed per frame, and much more information is displayed.
Investigating collectively	- "Building a drone is not a one-man project, it really isn't. It's collective." (Ethnographic Interview, Informant 10, 01.03.2018) - "All the different backgrounds from the individual members are really important to build the 'perfect drone'. Some have very advanced knowledge in electronics, some in software design and others, like Informant 11, have a really good feeling for the drone so they can help to calibrate it in the end." (Ethnographic Interview, Informant 10, 01.03.2018) - "Building a drone demands so much knowledge in so many fields, no one could ever do that without help." (Ethnographic Interview, Informant 13, 07.04.2018)	- "A community really makes it easier to collect things and crack theory accordingly because there might be one person who is strong in one element e.g. in doing the tricks […], others can craft theory so well that it makes sense to try these tricks" (Interview, Informant 7, 27:19) - "*Mario Kart Wii* is a good example, because I'm not the only person working on that game. We have a specific server on *Discord* where it's a bunch of different people collaborating. […] it's a team effort to try to push the game to its limits." (Interview, Informant 2, 11:28) - "you'll hear people are playing to improve the time for the community" (Abney317 in: Snyder (2017)) - "I would [...] like to thank [name of the game-breaker] for his continued work in glitch-hunting this game, [name of the game-breaker] for his work in reverse-engineering a sizeable skip in the middle of the Prologue and [name of the game-breaker] and [name of the game-breaker] for their work in RNG manipulation and reverse-engineering certain battle mechanics." (*YouTube*-video[1] uploaded by Informant 2, 00:50)
Advancing the state of knowledge	- "It is this evolvement of the drone what the hobby is actually about. Most people from outside only see the races on the racetrack, but the real race takes place in developing the drone." (Ethnographic Interview, Informant 10, 05.05.2018) - "Informant 11 proudly stated that he and Informant 10 are doing things that are not 'out there right now'." (Fieldnotes, 01.03.2018)	- "after mapping the wall collisions, I was like: 'Oh, so if I did this right, then this corner should have this […] openness with the collision.' So then […] I went at that point, I found out that 'yes, that was true'. So like experimentally, verifying what you find, in theory, is exactly like the same satisfaction that scientists get when they're like: 'all right, if I apply these formulas correctly, there should be a black hole there.' And then they find it. It's like, amazing. […] You learn about the rules, you apply them, you make a model, you test it experimentally and if it works exactly that that's like the perfect feeling." (Interview, Informant 1, 1:00:10) - "Games are systems, and sometimes the creators of those systems do not envision all it is possible within the system, we find ways to do things that no one knows they are possible." *Narcissa Wright* in Wagner (2019)

---

1   Due to anonymization we do not link to the video.

Identifying weak-points	"Since the drone is already that much developed there are no major things where he can safe weight anymore. That is why informant 11 claims that he has to 'go on the hunt for grams." (Fieldnotes, 05.05.2018)	

REFERENCES

Arnould and Craig J Thompson (2005), "Consumer Culture Theory (Cct): Twenty Years of Research," *Journal of consumer research*, 31 (4), 868-82.

Arsel, Zeynep and Jonathan Bean (2012), "Taste Regimes and Market-Mediated Practice," *Journal of consumer research*, 39 (5), 899-917.

Arvidsson, Adam (2011), "Ethics and Value in Customer Co-Production," *Marketing Theory*, 11 (3), 261-78.

Arvidsson, Adam and Alessandro Caliandro (2015), "Brand Public," *Journal of consumer research*, 42 (5), 727-48.

Belk, Russel, Eileen Fischer, and Robert V. Kozinets (2013), *Qualitative Consumer and Marketing Research*, Los Angeles: SAGE.

Bourdieu, Pierre (1984), *Distinction: A Social Critique of the Judgement of Taste*: Harvard university press.

Busse, Kristina (2006), *Fan Fiction and Fan Communities in the Age of the Internet: New Essays*: McFarland.

Canniford, Robin (2011), "How to Manage Consumer Tribes," *Journal of Strategic Marketing*, 19 (7), 591-606.

Canniford, Robin and Avi Shankar (2013), "Purifying Practices: How Consumers Assemble Romantic Experiences of Nature," *Journal of consumer research*, 39 (5), 1051-69.

Clarkson, Joshua J., Chris Janiszewski, and Melissa D. Cinelli (2012), "The Desire for Consumption Knowledge," *Journal of consumer research*, 39 (6), 1313-29.

Cova, Bernard (1997), "Community and Consumption: Towards a Definition of the "Linking Value" of Product or Services," *European journal of marketing*, 31 (3/4), 297-316.

--- (1999), "From Marketing to Societing: When the Link Is More Important Than the Thing," *Rethinking marketing: Towards critical marketing accountings*, 64-83.

Escobar-Lamanna, Juan (2019), "Why Speed Matters: Collective Action and Participation in Speedrunning Groups," Contemporary Art, Design, and New Media Art Histories, OCAD University, Toronto, Ontario, Canada.

Etkin, Jordan (2016), "The Hidden Cost of Personal Quantification," *Journal of consumer research*, 42 (6), 967-84.

Ford, Dom (2018), "Speedrunning: Transgressive Play in Digital Space."

Gobo, Giampietro (2008), *Doing Ethnography*, London;Los Angeles, Calif;: SAGE.

Hemetsberger, Andrea and Christian Reinhardt (2009), "Collective Development in Open-Source Communities: An Activity Theoretical Perspective on Successful Online Collaboration," *Organization studies*, 30 (9), 987-1008.

Kates, Steven M. (2002), "The Protean Quality of Subcultural Consumption: An Ethnographic Account of Gay Consumers," *Journal of consumer research*, 29 (3), 383-99.

Knorr Cetina, Karin (1999), *Epistemic Cultures: How the Sciences Make Knowledge*, Cambridge, Mass. u.a: Harvard Univ. Press.

Kozinets, Robert, Anthony Patterson, and Rachel Ashman (2016), "Networks of Desire: How Technology Increases Our Passion to Consume," *Journal of consumer research*, 43 (5), 659-82.

Kozinets, Robert V, Andrea Hemetsberger, and Hope Jensen Schau (2008), "The Wisdom of Consumer Crowds: Collective Innovation in the Age of Networked Marketing," *Journal of macromarketing*, 28 (4), 339-54.

Kozinets, Robert V. (2001), "Utopian Enterprise: Articulating the Meanings of Star Trek's Culture of Consumption," *Journal of consumer research*, 28 (1), 67-88.

--- (2002), "Can Consumers Escape the Market? Emancipatory Illuminations from Burning Man," *Journal of consumer research*, 29 (1), 20-38.

--- (2007), "Inno-Tribes: Star Trek as Wikimedia," in *Consumer Tribes*, ed. Bernard Cova, Robert V. Kozinets and Avi Shankar: Elsevier, 205-22.

--- (2009), *Netnography: Doing Ethnographic Research Online*, London: SAGE.

Latour, Kathryn A and John A Deighton (2018), "Learning to Become a Taste Expert," *Journal of consumer research*, 46 (1), 1-19.

Lévi-Strauss, Claude (1966), *The Savage Mind*: University of Chicago Press.

Lewis, Leo (2020), "Super Mario in Five Minutes: How 'Speedrunning' Went Mainstream," in *Financial Times Magazine*, United Kingdom: Financial Times.

Luedicke, Marius K., Craig J. Thompson, and Markus Giesler (2009), "Consumer Identity Work as Moral Protagonism: How Myth and Ideology Animate a Brand-Mediated Moral Conflict," *Journal of consumer research*, 36 (6), 1016-32.

Lupton, Deborah (2014), "Self-Tracking Cultures: Towards a Sociology of Personal Informatics," in *Proceedings of the 26th Australian computer-human interaction conference on designing futures: The future of design*, 77-86.

Maciel, Andre F and Melanie Wallendorf (2016), "Taste Engineering: An Extended Consumer Model of Cultural Competence Constitution," *Journal of consumer research*, 43 (5), 726-46.

Mathwick, Charla, Caroline Wiertz, and Ko De Ruyter (2008), "Social Capital Production in a Virtual P3 Community," *Journal of consumer research*, 34 (6), 832-49.

Moisio, Risto, Eric J Arnould, and James W Gentry (2013), "Productive Consumption in the Class-Mediated Construction of Domestic Masculinity: Do-It-Yourself (Diy) Home Improvement in Men's Identity Work," *Journal of consumer research*, 40 (2), 298-316.

Muniz, Albert M and Hope Jensen Schau (2005), "Religiosity in the Abandoned Apple Newton Brand Community," *Journal of consumer research*, 31 (4), 737-47.

Muniz, Albert M. Jr. and Thomas C. O'Guinn (2001), "Brand Community," *Journal of consumer research*, 27 (4), 412-32.

Ratto, Matt (2005), ""Don't Fear the Penguins": Negotiating the Trans-Local Space of Linux Development," *Current anthropology*, 46 (5), 827-34.

Reckwitz, Andreas (2002), "Toward a Theory of Social Practices: A Development in Culturalist Theorizing," *European journal of social theory*, 5 (2), 243-63.

Rohe, C. (2017), „Dmfv – Drs," https://drs.dmfv.aero/.

Schatzki, Theodore R. (1996), *Social Practices: A Wittgensteinian Approach to Human Activity and the Social*: Cambridge University Press.

--- (2002), *The Site of the Social: A Philosophical Account of the Constitution of Social Life and Change*, University Park: Pennsylvania State University Press.

Schau, Hope Jensen, Albert M Muñiz Jr, and Eric J Arnould (2009), "How Brand Community Practices Create Value," *Journal of marketing*, 73 (5), 30-51.

Schouten, John W. and James H. McAlexander (1995), "Subcultures of Consumption: An Ethnography of the New Biker," *Journal of consumer research*, 22 (1), 43.

Scully-Blaker, Rainforest (2016), "On Becoming "Like Esports": Twitch as a Platform for the Speedrunning Community."

Seregina, Anastasia and Henri A Weijo (2016), "Play at Any Cost: How Cosplayers Produce and Sustain Their Ludic Communal Consumption Experiences," *Journal of consumer research*, 44 (1), 139-59.

Snyder, David (2017), *Speedrunning: Interviews with the Quickest Gamers*: McFarland.

Stehr, Nico (2012), "Knowledge Societies," *The Wiley-Blackwell encyclopedia of globalization*.

Stock, D. (2015), "Fast and Furious," in *NewScientist*, Vol. 19, 60-61.

Stokburger-Sauer, Nicola E and Caroline Wiertz (2015), "Online Consumption Communities: An Introduction," *Psychology & Marketing*, 32 (3), 235-39.

Thomas, Douglas (2002), *Hacker Culture*: U of Minnesota Press.

Valtonen, Anu, Vesa Markuksela, and Johanna Moisander (2010), "Doing Sensory Ethnography in Consumer Research," *International Journal of Consumer Studies*, 34 (4), 375-80.

Wagner, Jane M. (2019), "Break the Game: The Documentary."

Warde, Alan (2005), "Consumption and Theories of Practice," *Journal of consumer culture*, 5 (2), 131-53.

Warman, Peter (2019), "Global Games Market Report 2019," ed. Peter Warman.

Weber, Max (1922), "Wirtschaft Und Gesellschaft, Tübingen," *Max Weber im Kontext. InfoS-oftWare Karsten Worm, Berlin*, 2.

Woermann, Niklas and Heiko Kirschner (2015), "Online Livestreams, Community Practices, and Assemblages. Towards a Site Ontology of Consumer Community," *ACR North American Advances*.

Wright, Len Tiu, Bernard Cova, and Stefano Pace (2006), "Brand Community of Convenience Products: New Forms of Customer Empowerment–the Case "My Nutella the Community"," *European journal of marketing*.

Zwick, Detlev and Nikhilesh Dholakia (2006a), "Bringing the Market to Life: Screen Aesthetics and the Epistemic Consumption Object," *Marketing Theory*, 6 (1), 41-62.

--- (2006b), "The Epistemic Consumption Object and Postsocial Consumption: Expanding Consumer-Object Theory in Consumer Research," *Consumption Markets & Culture*, 9 (1), 17-43.

Understanding Identity Transformation Through Cultural Product Consumption

Chooi Ling Chong, Monash University, Malaysia
Vicki Janine Little, Monash University, Malaysia
Vimala Kunchamboo, Monash University, Malaysia
Christina Kwai Choi Lee, Federation University, Australia

INTRODUCTION

The internet facilitates dissemination of cultural products. For example, Korean popular music (K-pop) has become a global phenomenon. In 2012, Psy's "Gangnam Style" became the first music video to achieve one billion views on YouTube, and now K-pop permeates global music markets. In 2019, Korean boy-band BTS ranked seventh in the world's best-selling artists (IFPI 2020), and consumers spent $640 million on K-pop merchandise (Chang 2020). Furthermore, K-pop artists have used their global reach to promote social causes, encouraging fans to engage in online activism (Hollingsworth 2020); highlighting that the internet facilitates consumer interaction by alleviating language, social, and psychological barriers. Thus, in online communities, in addition to learning about and purchasing cultural products, consumers can share thoughts and feelings, develop social relationships, and find emotionally supportive, safe spaces for identity exploration with like-minded others. The online environment therefore offers new opportunities for consumer research, particularly in the area of consumer identity work.

While prior consumer research has addressed consumption-driven consumer identity transformation, focus has been limited to the offline rather than online context (Beudaert, Özçağlar-Toulouse, and Türe 2016; Castilhos and Fonseca 2016; Seo 2016). However, the internet plays a key role in consumer life journeys. Therefore, creating and consuming content online has transformative potential, enabling consumers to plan, refine, and rebuild their presentation of self (Halliday 2016; Schau and Gilly 2003). Responding to calls to focus on relationships rather than objects, and processes rather than structures (Vargo et al. 2017), this study focuses on the role of consumer engagement in identity construction online (Brodie et al. 2013). Our purpose is to provide a process-based and relational view of identity evolution, showing how online engagement supports development of self-concept. Additionally, as current understandings of identity construction are based on more utilitarian products, we argue that cultural products provide a unique opportunity (Holbrook and Schindler 1994). Thus, the work offers new insights into consumer identity transformation at the intersection of cultural product consumption and the online world: Online communities for cultural products (OCCPs).

We contribute deeper understanding of how technology shapes consumer behavior and experiences, and extend past work focusing on a single moment of consumption (e.g., acquisition or disposition) by exploring consumption over time (Ahuvia 2005). We ask: How do online consumer identities evolve? By examining the online journey of K-pop community moderators, we find that three stages characterize online identity evolution. Our findings suggest that in the context of cultural products, online communities free consumers to construct their identities in new ways. The research contributes insight into both online engagement and the role of cultural product consumption in identity construction.

We proceed by reviewing current knowledge on offline-versus-online identity transformation, then describe our netnographic study of K-pop communities. Next, we present findings, conclusions, and implications for research.

CONSUMER IDENTITIES—ON- AND OFFLINE

The relationship of consumption to consumer identity projects has long been of interest to consumer research (Sirgy 1982; Belk 1988; Arnould and Thompson 2005; Fournier 1998). Consumption is intrinsic to identity construction (Ahuvia 2005; Belk 1988); and conversely, identity is intrinsic to consumption, as consumer sense-making around identity translates into consumption acts (Oyserman 2009; Kirmani 2009). In general, consumer self-transformation and transition occurs in pursuit or avoidance of possible selves (Castilhos and Fonseca 2016). That the self is constantly under construction and that consumption acts are central to the process are an essential, and yet implicit part of consumer culture theory (McCracken 2008). For example, recent studies examine transformations through consuming higher education (Castilhos and Fonseca 2016), personalizing products (Elliot 2016), and by transitioning from enthusiast to serious hobbyist (Syrjälä 2016). Consumers are agents of their own transformation through daily practices, discourses, and negotiations with the outside world; both constrained by their historical, social, and cultural circumstances, and able to influence established structures (Cherrier and Murray 2007), particularly in online contexts where consumer-producer dichotomies are broken down. However, the literature is limited with respect to the specifics of transformation processes, particularly in the online context. It is important to address this limitation, as online contexts are now commonplace (Kozinets, Patterson, and Ashman 2016; Belk 2013), particularly for OCCPs.

Important contributions of online studies include examine self-presentation through personal websites (Schau and Gilly 2003) and shared forums such as Pinterest (McQuarrie, Miller, and Phillips 2013), the role of online activities in constituting and deriving taste regimes (Arsel and Bean 2013), reducing stigmatization (Scaraboto and Fischer 2013), and professionalizing sporting pursuits (Seo 2016). These studies suggest that online identity transformation projects can be seen as a continuous movement towards both creating a desired self (Castilhos and Fonseca 2016) through manipulating both self-presentation and the online environment. Overall, while current studies have explained the role of the digital environment on self-transformation, the transformation process itself has attracted limited attention.

The growth of the internet has played a central role in global information flows, enabling consumers to engage with OCCPs. Fans meet on online platforms to share and interact across a wide range of experiential and social functions (Hamilton and Hewer 2010), presenting an appropriate field for exploring consumer identity evolution. Fandom, the personal connection with an aspect of popular culture (Duffett 2013) promotes self-reflexivity and identity building through embeddedness with networks of supportive individuals and communities, facilitating the identity development process (Seregina and Schouten 2017). While fandom enables identity evolution, however it is not our focus in this research, as we situate consumer identity transformation within the larger context of OCCPs.

METHODOLOGY

This study focuses on the evolutionary process of identity construction online, in the context of OCCPs. We employ netnography, relocating the ethnographic field in digital space (Kozinets 2002);

focusing on naturalistic, unprompted individual perspectives; and revealing social phenomena from participants' points of view (Rageh, Melewar, and Woodside 2013). We selected two online K-pop communities, based on traffic density and data richness criteria (Kozinets 2015). Both have high traffic (>30 simultaneous users) and diversity of users (>30 countries).

Our key informants were community moderators (i.e., volunteers who govern online communities by encouraging participation and by coordinating and controlling member interaction). As moderators are consistent posters, we could back-track to the point where they joined the community. All moderators were women. Of all moderators in each community (total 21), we selected six (28%) against two criteria: more than two years of community experience, and more than one year of moderating experience (see Table 1).

Data analysis followed six steps (Potter and Wetherell 1987; Gill 2010): (1) download texts (17,501 comments and 1,495 pages of data); (2) read and re-read; (3) initial coding; (4) analyze regularity and variability; (5) axial coding; (6) develop categories and themes; and (7) reliability and validity checking. The first cycle of coding was conducted in NVivo, extracting and highlighting the actual language used in the data (Saldaña 2013). Axial coding categorized the initial codes according to their similarities. To ensure validity and

reliability, we looked for general coherence and negative cases (Gill 2010). Kozinets (2015) ethical guidelines were followed.

HOW DO ONLINE IDENTITIES EVOLVE?

In view of space constraints, we selected the most evocative identity evolution story: 'Joy'. Although the following themes were derived from Joy, we provide relevant examples from other moderators. Joy joined the EXO Reddit community on November 8, 2013 and now leads the moderating team. EXO is a nine-member boy band, formed in 2012. The EXO community is highly regulated and hence demanding of its moderators. Joy's online identity evolution from lurker to community cultivator followed a three-phase process: construction and alignment, transformation, and reconstruction and reinforcement.

Desired and Undesired Selves–Stigmatization

Consumers align consumption practices with their desired and undesired selves, seeking positive, and avoiding negative symbolic meanings, respectively (Karanika and Hogg 2010; Dholakia, Bagozzi, and Pearo 2004). Stigmatization of popular culture consumption has a long history, associated with low-status, immaturity, and poor taste (Fiske 2011). Perhaps because of that, our findings

Table 1: Participant profiles (attributes are deduced unless stated otherwise)

Pseudonym	Reddit Community	Age (2019)	Country of residence/ ethnicity	# years in community	# years as moderator	Data (at 12/19)		Occupation
						# posts	# pages	
Joy	EXO (15,992 members)	28	Canada	3y 10m	11m	1,383	91	Graphic designer
				2y 3m	2y 2m	2,416	178	
Xandria		25	US/ Vietnam	3y 2m	2y 2m	1,012	56	Graphic designer
Wendy		Early 20s	US/ Chinese	4y 10m	2y 2m	1,439	142	College student
Laura	BTS (102,841 members)	Mid-30s	Sweden	3y 3m	3y	6,780	563	Entrepreneur
Debbie		Mid-20s	US	4y 5m	4y 3m	1,826	193	Graduate student
Ella		24	Brazil	3y 10m	3y 3m	2,645	272	Undergraduate student
Total						**17,501**	**1,495**	

highlight the important role of OCCPs in providing consumers with an anonymous, non-judgmental, and safe space for identity experimentation:

Member: "… At first I was super secretive when watching [music videos] because my family really doesn't like K-pop …" (July 16, 2018)

Joy: "… [family] still make comments to me about it - but now I just say how I have friends all over the world, how happy I am …." (July 16, 2018)

OCCP members seek social support, friendship, and to avoid negative stigma. Socialization allows consumers to develop a sense of identification with the community (Carlson, Suter, and Brown 2008), contributing to the sense of belonging. The relational bond gives rise to positive emotions (Baumeister and Leary 1995), enhances social status of in-group members, and increases mutual trust. While some studies suggest consumers may create an idealized self in the online world (Schau and Gilly 2003), our findings suggest online identities may represent the true self as consumers identify with

each other around a shared object of consumption (i.e., the K-pop group). As participants begin to engage with the community through speech acts, they identify more closely with their online identity, conferring a virtual re-embodiment (Belk 2013). Members struggled to align their online and offline identities, feeling stigmatized by their enjoyment of popular culture. While they hid those aspects of their identity offline, they felt safe in disclosing their preferences among an aligned social group, suggesting different personas in their on- and offline worlds. They were consistent in seeking approval and positive attention, and in actively avoiding embarrassment or rejection, in order to diminish the tension between self-perception (offline 'actual' self) and who they are trying to become (ideal self).

Sense of Oneness–Tattoo

Acceptance of the self within the OCCP escalates inclusion and attachment. Supporting Schouten (1991) we found that members expressed their self-concept through communicating self-relevant information to others, highlighting oneness with the group. In particular, self-expressions through change in appearance offered a

symbolic coping mechanism to assist in role transitions. Complementing Schouten's (1991) work, we found that transformation of self-concept was supported by obtaining a tattoo. Although tattoos have been viewed as a marker of the negative stigma (Kjeldgaard and Bengtsson 2005; Larsen, Patterson, and Markham 2014) and K-pop identities are stigmatized offline, OCCP members used body tattoos to express self-concept. The images are of, EXO (1st image) and a logo from an EXO album (2nd image).

Xandria: "I would love to get line art like Yeol's tattoo style but of the tree! I love simple, thin lines on tattoos, they're my favorite!" (July 29, 2019)
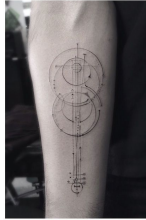
Joy: "I considered actually getting the EXODUS logo on my right forearm with flowers around it to match my left forearm's tattoo." (July 31, 2019)
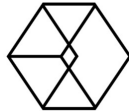
Body is central to identity, constructed by consuming objects and services (Belk 1988). Tattoos can be viewed as extreme modes of self-expression, extreme highly symbolic statements, riddled with meaning (Goulding et al. 2004). Mastery of the pain incurred in tattooing represents bodily ownership (Belk 1988). Our findings highlight how tattoos confer a sense of oneness and affinity with the product and between OCCP members. When individuals perceive oneness or a sense of group belonging, they internalize the norms, values, and goals of the group, motivating favorable acts toward the group, expressing group identity, and providing a means to enhance self-esteem (Hogg, Terry, and White 1995).

Exercising Self-concept–Exiting and Re-entering the Community

Identity communication acts require complex self-presentation and adjustments based on context (Goffman 1959). OCCPs enable members to express, reinvent, and reconstruct their identities, through boundary testing, withdrawal, and reentry:

Joy: "… EXO members would be so disappointed to read people saying this shit." (July 16, 2017)

Member: "I'm officially out … I've never been anything but super supportive of EXO … I thought I could have a rational discussion … you're treating me really hostilely." (July 16, 2017)

Joy: "Never was I accusing you when I said that line … you read it differently … There is not hostility coming from me." (July 16, 2017)

Member: "Please don't act like I'm just 'reading it differently.' Your paragraph literally starts addressing me specifically …" (July 16, 2017)

The next day, Joy announced her departure:

Joy: "…I have stepped back as mod … my own decision … I wanted to let you all know out of respect …" (July 17, 2017)

However, five months later she returned to the community with a new username and became leader of the moderator team – an OCCP coup:

Joy V1.0: "Hey everyone! … I would like to officially introduce you all to your new moderators … I have thought very carefully about who I wanted to join me on this team ..." (December 5, 2017)

The exchange highlights how conflict can arise when physical cues are absent. Joy felt the member's opinion was unacceptable and the member felt misunderstood. Moreover, Joy felt the member's statements attacked her ideal self, therefore she exited in order to consolidate and reconstruct her identity (Huang, Zhao, and Hu 2019), highlighting that OCCP members can create or obscure aspects of the self, and experiment with different roles and identities. After a period of crisis, she returned, presenting Joy V1.0, a new persona that disguised undesired characteristics, and magnified contributions and achievements. Through a sense of shared-self Joy V1.0 gained emotional support, reinforced member social ties (Arnett, German, and Hunt 2003), and regained her desired online identity.

CONCLUSION AND LIMITATIONS

This study sought to unfold the complex process of identity transformation in OCCPs, and to highlight the role of cultural products in identity construction. Our findings reveal three phases of identity evolution: (1) construction and alignment, (2) transformation, and (3) reconstruction and reinforcement. The contributions of this research add to existing consumer research, which has largely concentrated on identity transformation in offline. We contribute a more nuanced understanding of online identity construction in OCCPs. Participants faced crucial questions of who they were and where they belonged, in the context of K-pop content consumption. The digital environment enabled exploration, construct, and reconstruction, and in the end transformation of their personal and social identities with like-minded people.

This study has several limitations. First, pertaining to the netnographic method, we took naturally occurring data without having resource to direct responses from participants. Therefore, the authenticity of data cannot be verified. Second, we decided to focus on K-pop as a particular aspect of global consumer culture. Therefore, transferability to other contexts must be carefully considered.

REFERENCES

Ahuvia, Aaron C. 2005. "Beyond the Extended Self: Loved Objects and Consumers' Identity Narratives." *Journal of Consumer Research* 32 (1): 171–84. https://doi.org/10.1086/429607.

Arnett, Dennis B., Steve D. German, and Shelby D. Hunt. 2003. "The Identity Salience Model of Relationship Marketing Success: The Case of Nonprofit Marketing." *Journal of Marketing* 67 (2): 89–105. https://doi.org/10.1509/jmkg.67.2.89.18614.

Arnould, Eric J., and Craig J. Thompson. 2005. "Consumer Culture Theory (CCT): Twenty Years of Research." *Journal of Consumer Research* 31 (4): 868–82. https://doi.org/10.1086/426626.

Arsel, Zeynep, and Jonathan Bean. 2013. "Taste Regimes and Market-Mediated Practice." *Journal of Consumer Research* 39 (5): 899–917. https://doi.org/10.1086/666595.

Baumeister, Roy F., and Mark R. Leary. 1995. "The Need to Belong: Desire for Interpersonal Attachments as a Fundamental Human Motivation." *Psychological Bulletin* 117 (3): 497–529. https://doi.org/10.1037/0033-2909.117.3.497.

Belk, Russell W. 1988. "Possessions and the Extended Self." *Journal of Consumer Research* 15 (2): 139. https://doi.org/10.1086/209154.

———. 2013. "Extended Self in a Digital World." *Journal of Consumer Research* 40 (3): 477–500. https://doi.org/10.1086/671052.

Beudaert, Anthony, Nil Özçağlar-Toulouse, and Meltem Türe. 2016. "Becoming Sensory Disabled: Exploring Self-Transformation through Rites of Passage." *Journal of Business Research* 69 (1): 57–64. https://doi.org/10.1016/j.jbusres.2015.07.020.

Brodie, Roderick J., Ana Ilic, Biljana Juric, and L. Hollebeek. 2013. "Consumer Engagement in a Virtual Brand Community: An Exploratory Analysis." *Journal of Business Research* 66 (1): 105–14. https://doi.org/10.1016/j.jbusres.2011.07.029.

Carlson, Brad D., Tracy A. Suter, and Tom J. Brown. 2008. "Social versus Psychological Brand Community: The Role of Psychological Sense of Brand Community." *Journal of Business Research* 61 (4): 284–91. https://doi.org/10.1016/j.jbusres.2007.06.022.

Castilhos, Rodrigo B., and Marcelo J. Fonseca. 2016. "Pursuing Upward Transformation: The Construction of a Progressing Self among Dominated Consumers." *Journal of Business Research* 69 (1): 6–17. https://doi.org/10.1016/j.jbusres.2015.07.015.

Chang, Dong-woo. 2020. "Exports of Cultural Goods Tops US$10 Bln on Games, Character IPs." Yonhap News Agency. July 7, 2020. https://en.yna.co.kr/view/AEN20200707008300315.

Cherrier, Hélène, and Jeff B. Murray. 2007. "Reflexive Dispossession and the Self: Constructing a Processual Theory of Identity." *Consumption Markets & Culture* 10 (1): 1–29. https://doi.org/10.1080/10253860601116452.

Dholakia, Utpal M., Richard P. Bagozzi, and Lisa Klein Pearo. 2004. "A Social Influence Model of Consumer Participation in Network- and Small-Group-Based Virtual Communities." *International Journal of Research in Marketing* 21 (3): 241–63. https://doi.org/10.1016/j.ijresmar.2003.12.004.

Duffett, Mark. 2013. *Understanding Fandom: An Introduction to the Study of Media Fan Culture*. New York: Bloomsbury.

Elliot, Esi A. 2016. "Craft Consumption and Consumer Transformation in a Transmodern Era." *Journal of Business Research* 69 (1): 18–24. https://doi.org/10.1016/j.jbusres.2015.07.016.

Fiske, John. 2011. *Understanding Popular Culture*. 2nd ed. London; New York: Routledge.

Fournier, Susan. 1998. "Consumers and Their Brands: Developing Relationship Theory in Consumer Research." *Journal of Consumer Research* 24 (4): 343–53. https://doi.org/10.1086/209515.

Gill, Rosalind. 2010. "Discourse Analysis." In *Qualitative Researching with Text, Image and Sound: A Practical Handbook*, edited by Martin W. Bauer and George Gaskell, Reprinted, 173–90. Los Angeles: SAGE Publications.

Goffman, Erving. 1959. *The Presentation of Self in Everyday Life*. New York: Doubleday.

Goulding, Christina, John Follett, Michael Saren, and Pauline MacLaren. 2004. "Process and Meaning in 'Getting a Tattoo.'" *Advances in Consumer Research*, no. 1: 279–84.

Halliday, Sue Vaux. 2016. "User-Generated Content about Brands: Understanding Its Creators and Consumers." *Journal of Business Research* 69 (1): 137–44. https://doi.org/10.1016/j.jbusres.2015.07.027.

Hamilton, Kathy, and Paul Hewer. 2010. "Tribal Mattering Spaces: Social-Networking Sites, Celebrity Affiliations, and Tribal Innovations." *Journal of Marketing Management* 26 (3–4): 271–89. https://doi.org/10.1080/02672571003679894.

Hogg, Michael A., Deborah J. Terry, and Katherine M. White. 1995. "A Tale of Two Theories: A Critical Comparison of Identity Theory with Social Identity Theory." *Social Psychology Quarterly* 58 (4): 255. https://doi.org/10.2307/2787127.

Holbrook, Morris B., and Robert M. Schindler. 1994. "Age, Sex, and Attitude toward the Past as Predictors of Consumers' Aesthetic Tastes for Cultural Products." *Journal of Marketing Research* 31 (3): 412–22. https://doi.org/10.1177/002224379403100309.

Hollingsworth, Julia. 2020. "K-Pop Fans Are Being Credited with Helping Disrupt Trump's Rally. Here's Why That Shouldn't Be a Surprise." CNN. June 22, 2020. https://edition.cnn.com/2020/06/22/asia/k-pop-fandom-activism-intl-hnk/index.html.

Huang, Jiao, Li Zhao, and Chuan Hu. 2019. "The Mechanism through Which Members with Reconstructed Identities Become Satisfied with a Social Network Community: A Contingency Model." *Information & Management* 56 (7): 103144. https://doi.org/10.1016/j.im.2019.01.006.

IFPI. 2020. "Taylor Swift Named IFPI Global Recording Artist of 2019." International Federation of the Phonographic Industry. March 2, 2020. https://www.ifpi.org/news/Taylor-Swift-Named-IFPI-Global-Recording-Artist-of-2019.

Karanika, Katerina, and Margaret K. Hogg. 2010. "The Interrelationship between Desired and Undesired Selves and Consumption: The Case of Greek Female Consumers' Experiences." *Journal of Marketing Management* 26 (11–12): 1091–1111. https://doi.org/10.1080/0267257X.2010.508979.

Kirmani, Amna. 2009. "The Self and the Brand." *Journal of Consumer Psychology* 19 (3): 271–75. https://doi.org/10.1016/j.jcps.2009.05.011.

Kjeldgaard, Dannie, and Anders Bengtsson. 2005. "Consuming the Fashion Tattoo." *Advances in Consumer Research* 32 (1): 172–77.

Kozinets, Robert V. 2002. "The Field Behind the Screen: Using Netnography for Marketing Research in Online Communities." *Journal of Marketing Research* 39 (1): 61–72. https://doi.org/10.1509/jmkr.39.1.61.18935.

———. 2015. *Netnography: Redefined*. 2nd edition. Los Angeles: Sage.

Kozinets, Robert V., Anthony Patterson, and Rachel Ashman. 2016. "Networks of Desire: How Technology Increases Our Passion to Consume." *Journal of Consumer Research*, October, ucw061. https://doi.org/10.1093/jcr/ucw061.

Larsen, Gretchen, Maurice Patterson, and Lucy Markham. 2014. "A Deviant Art: Tattoo-Related Stigma in an Era of Commodification." *Psychology & Marketing* 31 (8): 670–81. https://doi.org/10.1002/mar.20727.

McCracken, Grant David. 2008. *Transformations: Identity Construction in Contemporary Culture*. Bloomington: Indiana University Press.

McQuarrie, Edward F., Jessica Miller, and Barbara J. Phillips. 2013. "The Megaphone Effect: Taste and Audience in Fashion Blogging." *Journal of Consumer Research* 40 (1): 136–58. https://doi.org/10.1086/669042.

Oyserman, Daphna. 2009. "Identity-Based Motivation: Implications for Action-Readiness, Procedural-Readiness, and Consumer Behavior." *Journal of Consumer Psychology* 19 (3): 250–60. https://doi.org/10.1016/j.jcps.2009.05.008.

Potter, Jonathan, and Margaret Wetherell. 1987. *Discourse and Social Psychology: Beyond Attitudes and Behaviour*. Reprint. London: Sage.

Rageh, Ahmed, T.C. Melewar, and Arch Woodside. 2013. "Using Netnography Research Method to Reveal the Underlying Dimensions of the Customer/Tourist Experience." *Qualitative Market Research: An International Journal* 16 (2): 126–49. https://doi.org/10.1108/13522751311317558.

Saldaña, Johnny. 2013. *The Coding Manual for Qualitative Researchers*. 2nd ed. Los Angeles: SAGE.

Scaraboto, Daiane, and Eileen Fischer. 2013. "Frustrated Fatshionistas: An Institutional Theory Perspective on Consumer Quests for Greater Choice in Mainstream Markets." *Journal of Consumer Research* 39 (6): 1234–57. https://doi.org/10.1086/668298.

Schau, H. J., and Mary C. Gilly. 2003. "We Are What We Post? Self-Presentation in Personal Web Space." *Journal of Consumer Research* 30 (3): 385–404. https://doi.org/10.1086/378616.

Schouten, John W. 1991. "Selves in Transition: Symbolic Consumption in Personal Rites of Passage and Identity Reconstruction." *Journal of Consumer Research* 17 (4): 412. https://doi.org/10.1086/208567.

Seo, Yuri. 2016. "Professionalized Consumption and Identity Transformations in the Field of ESports." *Journal of Business Research* 69 (1): 264–72. https://doi.org/10.1016/j.jbusres.2015.07.039.

Seregina, Anastasia, and John W. Schouten. 2017. "Resolving Identity Ambiguity through Transcending Fandom." *Consumption Markets & Culture* 20 (2): 107–30. https://doi.org/10.1080/10253866.2016.1189417.

Sirgy, M. J. 1982. "Self-Concept in Consumer Behavior: A Critical Review." *Journal of Consumer Research* 9 (3): 287–300.

Syrjälä, Henna. 2016. "Turning Point of Transformation: Consumer Communities, Identity Projects and Becoming a Serious Dog Hobbyist." *Journal of Business Research* 69 (1): 177–90. https://doi.org/10.1016/j.jbusres.2015.07.031.

Vargo, Stephen L., Kaisa Koskela-Huotari, Steve Baron, Bo Edvardsson, Javier Reynoso, and Maria Colurcio. 2017. "A Systems Perspective on Markets – Toward a Research Agenda." *Journal of Business Research* 79 (October): 260–68. https://doi.org/10.1016/j.jbusres.2017.03.011.

Negotiating Identity and Authenticity in Hijabi Cosplay

Ofer Dekel Dachs, De Montfort University, UK
Brian Harman, De Montfort University, UK

INTRODUCTION

"Cosplay'' involves dressing up to imitate the appearance of manga or pop culture characters. "Hijabi cosplayers", (henceforth HCP) represent an interesting group within the cosplay community since they observe both Islamic dress codes and cosplay conventions (see figure 1). Positioned at the cultural intersection between fan culture and religion (Islam), HCP challenge the stereotypes of ''fan" and ''Muslim" (Gittinger, 2018).

Cosplay and its social activities provide a space for HCP to express their voices on a global stage. Moreover, cosplay provides a valuable opportunity for identity articulation that is often denied Muslim women in other areas of their lives (Schaefer and Wheeler, 2004). Since Hijab cosplay combines fandom and religion, we conceptualise a hybrid identity for cosplayers (Crome, 2019). The systems of power that construct identities may compete with each other or may complement each other during identity construction (Rein-

FIGURE 1: HIJABI COSPLAYERS IN COSTUME

hard, 2018). Our research answers recent calls in the literature (see Cleveland and Bartsch, 2019) to explore how consumers overcome the contextual tensions and conflicts that threaten the legitimacy, coherence and perceived authenticity of their identity projects (see Barnhart and Peñaloza, 2013; Fournier 1998; Holt and Thompson, 2004; Tumbat and Belk, 2011).

While conversations on authenticity are often fractious and underpinned by competing conceptual frameworks (e.g., existentialism, poststructuralism), researchers largely agree that authenticity is socially constructed. Authenticity often results from interactions and negotiations between multiple stakeholders (Peterson, 1997). Thompson, Arnould, and Giesler (2013: 76) suggest that authenticity is derived within "institutional, historical, ideological and sociological" contexts that help "situate consumers identity projects and consumption practices". Authenticity can also be gained by pursuing identity goals. For example, Beverland and Farrelly (2010) demonstrated that individuals do not assess an object's authenticity by evaluating its intrinsic properties. Rather, individual's assess authenticity by considering an object's ability to satisfy personalised identity

goals (Beverland and Farrelly, 2010). This claim is nicely illustrated by previous research which showed that individuals use meaningful music to enrich their lives (Frith and Corcoran, 1996), satisfy their personal needs and complete their identities (De Nora, 2000). In contrast, other authors (see Arnould and Thompson, 2005), suggest that the process of authenticity appropriation can only occur through co-creation with other community members (Kates, 2004; Kozinets, 2001; Schouten and McAlexander, 1995). Thus, the literature suggests that authenticity can be achieved by satisfying individual goals or communal goals. HCP seek authenticity through their costumes which satisfy both individual identity goals and communal recognition goals.

Research suggests that the pursuit of authenticity (e.g. through art) can provide meaning to people's lives (Abolhasani, Oakes and Oakes, 2017). Similarly, in seeking the preservation of their own identities, HCP resist the temptation to adopt identities that are pre-established by mainstream pop culture (Ulusoy, 2016). Therefore, adopting anime characters while observing Sharia law helps HCP retain their individual and collective religious identity. Ulusoy (2016)

explains that artistic choices assist "consumers in their quest for existential meanings' as well as providing a form of 'resistance to and emancipation from oppression" (p.252). This suggests that cosplay helps young Muslim women find meaning through understanding their place in the world. This search for meaning is facilitated through the acquisition of both an individual identity and a collective identity. The resulting communal authenticity accruing from this collective identity is a dimension of existential authenticity that includes altruism, civic involvement and 'intimacy', 'friendship' and 'sociality' (Wang's 1999: 364). The current research explores similar themes and builds on past research which demonstrated that communal authenticity is attained through "caring" and "sharing" (Kozinets, 2002:33).

METHODOLOGY

This research explores the authentication practices within the *Hijabi Cosplay Gallery (HCG)*, the world's largest online community of HCP. Spread across Malaysia, Indonesia and Singapore, the HCG consists of 15,000 members and exists online (Instagram, Facebook, Whatsapp) and offline (e.g. cosplay conventions). We joined the HCG Facebook group to observe the jargon, codes and focal interests of the group. Over the course of three months, we built rapport with key influencers within the group and explained the purpose of our study. At the end of the 3 months period, 25 members of the group were recruited for interviews using snowball sampling (Baltar and Brunet, 2012). The semi-structured interviews focused on themes identified during the preceding literature review and our three-month observation of the HCG community. Interviews were conducted using Facebook instant messaging (IM) and each interview lasted approximately 4 hours. This approach overcame the time constraints, budgetary limitations and logistical impracticalities of conducting research across multiple, foreign jurisdictions. Using Facebook IM allowed us to gather the data in an efficient and timely manner. This platform was well suited to the task since face-to-face interviews with a non-Muslin, western man might have made respondents self-conscious or uncomfortable. IM allowed the female Muslim participants to respond candidly and in a psychologically safe environment. This approach minimised the risk of self-presentation bias and permitted a level of detachment that promoted honest, considered responses. The data were analysed using thematic analysis.

FINDINGS

This research sought to understand how authenticity is achieved and negotiated within the Hijabi cosplay community. Our findings suggest that authenticity is achieved by balancing the competing demands and conflicting values of different audiences. Drawing a line of best fit through this contested space is fraught with difficulties since the sensibilities of the cosplay community and expectations of the Muslim community may conflict. In addition, the cosplayer also has a duty of care to the cosplay character which also demands authentic embodiment. Authentic embodiment is achieved through visual authenticity (costume design) and narrative authenticity (performance of the character) (Rahman, Wing-Sun and Cheung, 2012). A summary of the authenticating practices used by HCP are provided in Table 1.

Negotiating Authenticity Within a Religious Context

Our research suggests there is a clear link between the religious identity of the cosplayer and their choice of cosplay character. Characters that were regarded as too "sexy" and characters related to non-Muslim religious mythologies (e.g. angels, demons, or priests) were considered not suitable; *"I'd avoid characters with crosses...also if*

the character's outfit is too revealing" (W). HCP used 3 different approaches to incorporating the hijab into their costumes: a) Hijab styled as a hairstyle, b) non-styled hijab, and c) wearing headgear (wigs, hoods). Styling the hijab as a hairstyle is a time consuming and laborious process; *"It actually took me weeks of trial and error before I finally got it right"* (MD). Nevertheless, cosplayers try to be strategic about their character selection; *"I consciously pick characters that have some form of headgear or hood"* (MD). The Islamic dress code dictates that HCP have to continually reflect on their religious identity and negotiate acceptable compromises to their costumed selves. Unsurprisingly, respondents reported that the Muslim community took a dim view of cosplay; *"they (Muslims) think Hijab cosplay is quite a disgrace...a wasting of time and money"* (R). However, some HCP's railed against this characterization and asserted that they felt like ambassadors for the Islamic community: *"this kind of Muslim still cannot accept anime hobby ...I want to show that nothing is impossible for Muslim woman to do what they like"*. These differences of opinion among HCP are insightful. For example, (YR) sees no conflict between her Muslim and cosplayer identities; *"You can be a good Muslim and cosplay at the same time as long as you follow the Sharia law...keep your make-up to a simple make-up"*. Other cosplayers were less carefree in their interpretation of Sharia law; *"I get dressed with costume, cover all parts; but still the costume is too attractive, it attracts people to look at us and that is not allowed in Islam"* (S). A pragmatic position was adopted by (R) who emphasised the individuality of each cosplayer; *"Each individual cosplayer has their own values when cosplaying. Some of us prefer to cover our bust with our hijab, some don't mind shortening their hijab to make them look exactly like the character's hair... we are just regular humans...we have our own individual values"*.

Being an Authentic Member of the Hijabi Cosplay Community

In recent years, the Hijab cosplay community has gained power and influence due to its increasing popularity; *"as years pass, the Hijab cosplay community has drastically grown...we have influenced a lot of young Muslims to follow their wish to cosplay and unleash their creativity"* (MA). The rise of social media has enabled this hybrid community to share advice on characterization (e.g. costume choice, poses, hijab/wig) and craftwork (sewing and costume customization). New members are welcomed into the community and helped on their cosplay journey; *"I will normally advise them [new members] on how to modify the costume and how to cover up"* (R). In addition, the Hijab cosplay community forms a loose authority that provides guidelines on clothing conventions. This illustrates the evolution of the community towards more structured and codified practices. Compliance with the Islamic dress code is enforced through encouragement and social pressure. Indeed, those who flout convention are likely to be flamed or trolled online. The Hijabi cosplay community is committed to upholding its Islamic ideals in order to safeguard the moral well-being of its members. Indeed, (R) reported that a HCP who decided to wear a wig rather than a hijab was *"bashed by the hijab cosplay community"* (R).

Authenticity and Performativity of the Cosplay Character

Costume authenticity is very important to HCP. However, the creative constraints imposed by an Islamic dress code dictate that ingenuity and artistic license are often required to reinterpret cosplay characters; *"As a hijab cosplayer, we just need to be more creative"* (R). However, Hijabi cosplay is contentious and Hijab cosplayers are often criticised for their reconceptualization's of characters. In-

Table 1: Sources of Authenticity Within the Cosplay Community

Source of authenticity	Authenticating practices	Example/Evidence
Religious Identity		
	Adherence to Sharia law	"You can be a good Muslim and cosplay at the same time as long as you follow the Sharia law"
	Religious values	"We are just regular humans [...] we have our own individual values".
	Hijabification of the costume	"It actually took me weeks of trial and error before I finally got it right" "I consciously pick characters that have some form of headgear or hood"
	Selection criteria for character	"I'd avoid characters with crosses... also if the character's outfit is too revealing"
	Muslim perceptions of cosplay	"They (Muslims) think hijab cosplay is quite a disgrace...a waste of time and money"
(Hijab) Cosplay Community		
	Encouraging narrative authenticity	"We have influenced a lot of young Muslims to follow their wish to cosplay and unleash their creativity"
	Socialising newcomers	"I will normally advise them [new members] on how to modify the costume and how to cover up"
	Safeguarding Islamic standards (by trolling)	The misbehaving Hijabi cosplayer was "being bashed by the hijab cosplay community"
	Fear of compromising visual authenticity	"Some people don't like hijab cosplay [...] they see it as a break in the authenticity of a character, which is why I am wary of how I would modify costumes" "The less accurate the costume is, the more insecure I get [...] I might offend the other fans of the character if I didn't get it right"
Cosplay Character		
	Re-interpreting the character	"If you insist on accuracy, you end up sacrificing potential"
	Empowerment through creativity	"As a hijab cosplayer, we just need to be more creative" "I want to show that nothing impossible for Muslim woman to do what they like" "I would like to see hijab cosplay be more advanced, inspiring, and give the perception that there is no harm for a hijab girl to be creative"

deed, some HCP are wary of this interpretive approach to cosplaying; "*some people don't like Hijab cosplay [...] they see it as a break in the authenticity of a character, which is why I am wary of how I would modify costumes*". In contrast, some HCP assert their right to autonomy and seek to *"shut the haters' mouth with achievement"* (S). Being true to the character is a guiding principle within cosplay. Nevertheless, the respondents we interviewed unanimously stated that they would not sacrifice their religious beliefs when trying to replicate a character's look. Ironically, it is this religious constraint that grants them the artistic license and freedom to unlock the potential of the character; *"if you insist on accuracy, you end up sacrificing potential"* (M). The goal of every cosplayer is to represent the character as faithfully as possible; *at the end of the day, these are fictional characters ....they represent how much the individual likes that character and he/she wants to portray it to the best of their ability whether they are Hijabi, plus sized, special needs or just a regular fan"* (MD). Importantly, in Hijab cosplay, visual authenticity is redefined and stretched to incorporate the interpretive stance of the individual. Nevertheless, there is pressure to conform to expectations; "*the less accurate the costume is, the more insecure I get...I might offend the other fans of the character if I didn't get it right"* (W). Regardless of the pressure, some HCP seek to challenge the classical stereotypes enforced upon them. Indeed, many happily acknowledged the ambassadorial role of cosplayers; *"I would like to see Hijab cosplay be more advanced, inspiring, and give the perception that there is no harm for a Hijabi girl to be creative"* (S). These challenges to the status quo help promote the normalisation of Muslim cosplay subculture within the broader cosplay community and within society at large. Thus, HCP are helping to address many of the misconceptions surrounding Muslim women in modern society.

DISCUSSION AND CONCLUSION

Our findings suggest that Hijabi cosplay is driven by the desire to construct a lived experience that accommodates both religious and cosplayer identities. By playfully incorporating the hijab into their costumes, HCP reconstruct their religious identity to include incongruent cosplay identities (and vice versa). In doing so, HCP are challenging both the traditional expectations and stereotypes of women within Muslim and non-Muslim communities.

Past research has framed authenticity as a contested concept which is attained through the rejection of mass market forces (see Kozints, 2002). However, we contend this polarised perspective of consumers and market is insufficient to explain the complex negotiations that transpire when pop culture and religion meet. Within religious subcultures, negotiations do not follow the traditional fault lines and so a more nuanced approach is required. Here, the topography of the contested authentic space is not bounded by the mapped grid lines of consumer and market. For HCP, navigating towards an authentic self is not simply a case of taking a bearing for "true" north in 90-degree opposition to the market. Instead, these consumers must watch the compass needle swing and try to navigate a safe course between competing factions of the self. In their search for authenticity, HCP find their authentic selves within three domains; the cosplay character, the (hijabi) cosplay community and the Muslim community. Therefore, HCP are not dealing with one dominant discourse but rather multiple discourses in their "quest for authenticity" and "personal sovereignty" (Beverland and Farrelly, 2010: 842). Authenticating practices are used to reconcile their incongruent identities and to continually negotiate what is authentic, accurate and/or acceptable.

HCP are not passive recipients of meanings from the popular culture, market or Islamic faith. Rather they are proactive negotiators that assemble signs and symbols to create their self-identity. Thus, the costumes they wear represent the outcome of a successful negotiation between their multiple social stakeholders. We suggest that marketing's task here is not to make ontological claims about what the 'real' identity of people is. Based on our observation of these consumers, we believe that marketing will increasingly be required to assist consumers to create identities by evoking, improvising, appropriating and refusing participation in practices and discourses. The role of marketing is therefore to assist consumers in their "quest for authenticity". Future marketers will only remain relevant to consumers if they can provide the resources that allow consumers to craft their own self-narratives. The current research challenges the traditional, domain-specific perspective of authenticity and provides new insights into how tensions between embodiment and religious values are negotiated and resolved. Importantly, our findings casts doubt on the long-held notion that embodied leisure activities and religious practices are discrete cultural categories.

REFERENCES

Abolhasani, M., Oakes, S. & Oakes, H. (2017). Music in advertising and consumer identity: The search for Heideggerian authenticity. Marketing Theory, 17(4), 473-490.

Arnould, E. J., & Thompson, C. J. (2005). Consumer culture theory (CCT): Twenty years of research. *Journal of Consumer Research*, 31(4), 868-882.

Baltar, F., & Brunet, I. (2012). Social research 2.0: Virtual snowball sampling method using Facebook. *Internet Research*, 22(1), 57–74.

Barnhart, M. and Peñaloza, L. (2013). Who are you calling old? Negotiating old age identity in the elderly consumption ensemble. *Journal of Consumer Research*, 39(6), pp.1133-1153.

Beverland, M. B. & Farrelly, F. J. (2010). The quest for authenticity in consumption: Consumers' purposive choice of authentic cues to shape experienced outcomes. *Journal of Consumer Research*, 36(5), 838-856.

Cleveland, M., & Bartsch, F. (2019). Global consumer culture: epistemology and ontology. *International Marketing Review*. Vol. 36 No. 4, 2019 pp. 556-580.

Crome, A., (2019). Cosplay in the pulpit and ponies at prayer: Christian faith and lived religion in wider fan culture. *Culture and Religion*, 20(2), pp.129-150.

DeNora, T. (2000). *Everyday Life*. Cambridge, England: Cambridge University Press.

Frith, C.D. and Corcoran, R., (1996). Exploring 'theory of mind' in people with schizophrenia. *Psychological medicine*, 26(3), pp.521-530.

Fournier, S., (1998). Consumers and their brands: Developing relationship theory in consumer research. *Journal of Consumer Research*, 24(4), pp.343-373.

Gittinger, J.L. (2018). Hijabi Cosplay: Performances of Culture, Religion, and Fandom. *The Journal of Religion and Popular Culture*, 30(2), pp.87-105.

Holt, D.B. and Thompson, C.J. (2004). Man-of-action heroes: The pursuit of heroic masculinity in everyday consumption. *Journal of Consumer Research*, 31(2), pp.425-440.

Kates, S.M. (2004). The dynamics of brand legitimacy: An interpretive study in the gay men's community. *Journal of Consumer Research*, 31(2), pp.455-464.

Kozinets, R.V. (2001). Utopian enterprise: Articulating the meanings of Star Trek's culture of consumption. *Journal of Consumer Research*, 28(1), pp.67-88.

Kozinets, R. V. (2002). Can consumers escape the market? Emancipatory illuminations from burning man. *Journal of Consumer Research*, 29(1), 20-38.

Peterson, R. A. (1997). Creating country music: Fabricating authenticity. Chicago, IL: *The University of Chicago Press.*

Rahman, O., Wing-Sun, L., & Cheung, B. H. M. (2012). "Cosplay": Imaginative self and performing identity. *Fashion Theory*, 16(3), 317-341.

Reinhard, J., Ballweg, S., Pesek, K., & Ernst, R. (2018). An emerging group of membrane property sensors controls the physical state of organellar membranes to maintain their identity. *BioEssays*, 40(5).

Schaefer, L. C., & Wheeler, C. C. (2004). Guilt in cross gender identity conditions: Presentations and treatment. Journal of Gay & Lesbian Psychotherapy, 8(1-2), 117-127.

Schouten, J. W., & McAlexander, J. H. (1993). Market impact of a consumption subculture: the Harley-Davidson mystique. *ACR European Advances*.

Thompson, C.J., Arnould, E. and Giesler, M. (2013). Discursivity, difference, and disruption: Genealogical reflections on the consumer culture theory heteroglossia. *Marketing Theory*, 13(2), pp.149-174.

Tumbat, G. & Belk, R.W. (2011). Marketplace tensions in extraordinary experiences. *Journal of Consumer Research*, 38(1), pp.42-61.

Ulusoy, E. (2016). Experiential responsible consumption. *Journal of Business Research*, 69(1), pp.284-297.

Wang, N. (1999). Rethinking authenticity in tourism experience. *Annals of tourism research*, 26(2), 349-370.

The Aestheticization of Past-Themed Consumption

Ileyha Dagalp, University of Gothenburg, Sweden
Katja H. Brunk, European University Viadrina, Germany
Benjamin Julien Hartmann, University of Gothenburg, Sweden

INTRODUCTION AND CONCEPTUAL BACKGROUND

*Previous consumer research literature highli*ghts the role of aesthetics in the consumption of fashion, the arts, visual images, but also its role for branding (Buschgens, Figueiredo, and Rahman 2019; Charters 2006; Hewer and Brownlie 2007; Joy and Sherry 2003; Maclaran and Brown 2005; Mazzalovo 2012; Peñaloza 1998; Schroeder 2002; Schroeder, Borgerson, and Wu 2015). From this perspective, aesthetics is predominantly about how consumers are motivated to experience beauty, sublime, and sensory stimulation through consuming art and art-like objects in everyday life (Charters 2006; Venkatesh and Meamber 2008).

By contrast, the contextual processes that undergird the valorisation of aesthetics in and through consumption have so far received relatively little attention. Following the idea that a focus on aesthetics is "the study of the feelings, concepts, and judgments arising from our appreciation of the arts or of the wider class of objects considered moving, or beautiful, or sublime" (Blackburn 2016, 8), aesthetic consumption consequently must involve a collective process of valorising the aesthetic: how is 'a wider class of objects' rendered into something 'moving, or beautiful, or sublime'? A shared understanding of an object or concept to be considered aesthetic must build on an underlying process that aestheticizes that element. In other words, a focus on such a process of aestheticization re-orients the discussion from the aesthetic as an essentialist quality inherent to an object (an object is aesthetic) towards a constructivist perspective that zooms in into the development of an object or concept becoming aesthetic (is made aesthetic). Consequently, rather than taking the aesthetic object as a starting point for investigating consumption (Charters 2006), we argue that also the underlying processes which render something into being aesthetic must be explored if we are to understand the role of aesthetics in and for consumption.

In this article, we explore and illustrate such aestheticization processes. Following Hartmann and Brunk's (2019) study of nostalgia marketing, we focus specifically on the theoretical context of 'the past'. The past, here manifested in past-themed brands, products, and consumption practices, provides a rich and powerful facilitating consumption context for such an exploration, primarily for two reasons. First, aesthetic representations of the past permeate nearly all contemporary markets (Brown 1999, 2018) and have become a guiding theme for numerous past-themed brands including retro brands and nostalgia-framed brands in a wide array of industries such as entertainment, technology, film, music, food, fashion, and tourism over the last decades. Second, in such a consumer culture infused and seemingly obsessed with the past, marketers and consumers alike seem to be united in the valorisation of the past as a meaningful frame for branding and consumption activities, whereby such activities are profoundly mobilizing aesthetics in order to allure to the past.

Consider for example the distinct looks of retro brands (Brown, Kozinets, and Sherry 2003), the enchantment (here understood as moments of romance, wonder, magic, and special) created partly through past-themed aesthetics in nostalgia marketing (Bach 2002; Hartmann and Brunk 2019), or the distinct revived aesthetics of re-launched brands marketers use to aid authenticating their brand (Hartmann and Ostberg 2013). From this perspective, the valorization of a past-themed brand or practice as being aesthetic becomes an important ingredient for the creation of enchantment of those brands or practices. In other words, if a past-themed brand or practice is not experienced as being aesthetic, the creation of enchantment is significantly hindered or impeded. To create enchantment, such brands and practices must involve a rendering and valorization of something into something moving, beautiful, and sublime, i.e. aesthetic. Consequently, this aestheticization is conceptually linked to such larger enchantment processes.

Informed by Holt (1995), we approach aestheticization as an instrumental and collective process in everyday consumption domains involving both, objects and practices. Previous research on aesthetic consumption specifically concerning nostalgia suggests that aesthetic consumption can involve romantic inclinations towards the past, but also discontent towards the present such as a temporary coping mechanism and a form of escape from a society (Goulding 2001; 2002). However, while such previous accounts look into the various forms of nostalgia involved in aesthetic consumption, they do not explicitly focus on the processes involved in the aestheticization as such.

METHODOLOGY

Choice of research context: Building on Hartmann and Brunk's (2019) study of the different paths through which past-themed market resources can create consumer enchantment, and because aesthetics play a facilitating role in creating enchantment—i.e., experiencing something as beautiful, sublime, special and magic—we selected two empirical contexts:

1. Viking role-play, which represents the re-instantiation route to enchantment, whereby consumers travel back in time to create and experience a Viking life-world.
2. The retro-designed Govecs E-scooter, which represents the re-appropriation route to enchantment. Formerly an unattractive and uncool East German scooter called Simson Schwalbe, it has now been reinvented as an urban hipsterian lifestyle brand exclusively used and associated with the scooter-sharing company Emmy.

The selection of these two contexts was motivated by our purpose to understand the underlying processes of mobilizing aesthetics in the creation of enchantment aspired by past-themed consumption and production. These two contexts of past-themed consumption help us compare and contrast the aestheticization processes of different enchantment routes—re-instantiation and re-appropriation (Hartmann and Brunk 2019). In this article, these two contexts facilitate our process theorization. The viking context reveals the collaborative and productive mobilization of consumption experiences as an authentic rendition of the past and how the aestheticization process is shaped by consumers as aesthetic agents, particularly when consumers anchor aesthetics in a participatory way and utilize aesthetics for authenticating acts (Arnould and Price 2000). The retro brand context reveals the negotiation of commercially aestheticized past-themed objects.

Data collection: In order to investigate how consumers valorize aesthetics of past-themed retro products and consumption practices, a qualitative methodology was considered most appropriate. We explore the meaning-making processes central to aesthetic valorization of the past with the help of empirical material generated by fifteen in-

depth interviews (McCracken 1988) with consumers who are aware of and experienced aestheticized objects and practices: nine consumers for the Emmy scooter and six consumers for Viking role-play. We pair this interview material with online and onsite observations. Within our particular context-driven sampling frame, we aimed at generating data from diverse consumer profiles, e.g., different age, gender, education, cultural background and income.

Data analysis: All fifteen interviews were recorded and transcribed at full length. We analyzed all empirical material by taking a hermeneutic approach (Thompson 1997), starting with reading and re-reading the data. In order to arrive at the final analytical categories emerging from our data, we engaged in an iterative process that included coding and recoding, constant comparison, as well as regular inter-researcher reflections (Spiggle 1994; Thompson 1997), whereby triangulating across data sources.

In our analysis, we compared and contrasted our two empirical contexts as cases of re-appropriation and re-instantiation routes of enchantment (Hartmann and Brunk 2019). We explored how the aesthetic formation of the past is elaborated through the hybridity of the past and present and across different agents. The identified aestheticization processes succeed in making consumers and communities mobilize the consumption object and experiences as a tasteful rendition of the past. If not, as in the case of commercial reactivation of the past, the formation of aesthetic appropriation would only be limited to the genre (i.e., GDR retro), yet cannot transport itself into a particular form of object/brand. As the process unfolds, the past-themed consumption aesthetics work as integrative commemorating templates where consumers act as aesthetic agents.

FINDINGS AND ANALYSIS

Our findings and analysis suggest *three processes that render aesthetics in past-themed consumption, i) differentiation, ii) interrelation, and iii) integration of the past (see table 1 in the appendix for empirical material).*

Differentiation through a degree of reminiscence

Differentiation refers to emphasizing the dissimilarity, divergence, and discrepancy between the prior and the aestheticized version of the objects and practices to establish an authentication claim. This process is used to contest the aestheticized version of the objects or practices when a commercial re-appropriation of the past is a mismatch with the demanded past form. As illustrated by the different routes to enchantment by nostalgia marketing and consumption (Hartmann and Brunk 2019), seemingly ludic re-appropriation can also be triggered by dislocation. Likewise, differentiation through reminiscence as a process follows a reflective valorization of the aesthetic performance that can stand in stark contrast to settled historical facts (Brunk, Hartmann and Giesler 2018; Hartmann and Brunk 2019). This dislocation is noticeable when there is a discontent towards the reification of the past for commercial aims. We observed that consumers valorize aesthetic qualities through their own connection to the past to render a past version of the object as (more) tasteful compared to (re-)designed versions. In this process, a past is aestheticized through the mythological rendering of 'good old days', and a utopian portrayal of (bygone) honest material qualities (Barthes 1972) and craftsmanship. The aesthetic gestalt of retro, therefore, can create a symbolic dislocation and negative valorization of the commercial offering and, instead, celebrate only the aesthetic bonds of the genre (i.e., GDR retro) as such.

Interrelation through newness

Interrelation refers to the process of evaluating the aesthetic qualities in present conditions by connecting, linking, and joining an aesthetic re-appropriation with contemporary market-level narratives. Here, aestheticization includes the mythical portrayal of the lifestyle product, and a strong link to authenticating acts (Arnould and Price 2000). This process articulates the counter-narratives of market structures and reduces the influence of particular authoritative rules to operationalize modern social links to the past. As is illustrated by Brown et al. (2003), a retro marketing mind-set involves producing the old anew. This regime of newness follows a reactivation of the past by celebrating the past in the form of a distinct look. We observed that consumers are inclined to decontextualize retro consumption towards an amalgam of lifestyle products. The retrofied object design of the Schwalbe scooter, or a Viking axe for example, receives its appreciation largely from the upgraded modern sensibility around the object, which was deemed functional and ordinary back then. In this process, the past is adapted to fit into the set of contemporary ideals related to consumption aesthetics.

Integration through consumers as aesthetic agents

Integration refers to an instrumental act through which consumers acquire and manipulate object meanings to facilitate the symbolic use of the object (Holt 1995). Likewise, practices promote the integrative dimension of the aesthetic appropriation of the past when consumers significantly participate in their creation (Arnould and Price 2000). In the case of commercial aestheticization, consumers who experienced the past created retrospective valuations of the re-appropriated product. In the case of the Emmy scooter sharing company, consumers valorize an original version of Schwalbe scooters from the GDR—which were once valorized as functional and robust—now as "beautiful" "retro design." When it comes to the aestheticization of the past in terms of practices, i.e., Viking role-play, consumers valorize the material culture of the past as being aesthetic by integrating its ability to activate the realm of enchantment (Bach 2002). In this way, consumers act as aesthetic agents and derive enchantment from those products and practices by integrating past-present dynamics. As an embodied aesthetic practice, Viking role-play is re-instantiating the past in the here and now, whereby it becomes encapsulated as an authentic representation rather than purely ludic re-appropriation through its integration into the present by consumers.

CONCLUDING DISCUSSION

This paper has explored the processes of aestheticization in past-themed consumption. The convergence of aesthetics and consumption in the form of retro branding and Viking role-play performances is a part of a wider phenomenon where aesthetic visualization is seemingly being employed in both branding and consumption of the past (*Brown et al. 2003; Hartmann and Brunk 2019*). Our conceptual starting point is that nothing is inherently aesthetic but rather, is collectively rendered aesthetic, which is, in the theoretical context of the past and past-themed brands and consumption practices, achieved through the mixing of existing codes (Brown 2005).

The aestheticization processes we analyzed suggest that an aesthetic reactivation of the past creates an integrative act if there is congruence between marketers' symbolic and material re-appropriation of the past and consumers' valorization of it. However, this act can result in dislocation when the aestheticization of past-themed consumption is perceived to be rendered externally by commercially motivated marketers, as is often the case in retro branding. Meanwhile, when consumers have authoritative voices over the aes-

APPENDIX
Table 1: Summary of Illustrative Data

Aestheticization process	Illustrative Data
Differentiation through reminiscence	I don't know. But it certainly has other manufacturing things today and is easier, cheaper to produce if it is in one piece. I assume that the plastic fender is in front ... I don't know, you can't say that. Because the quality ... so they will have built reasonable ball bearings or such reasonable shock absorbers or something, but I don't like it ... It's ajar, you can tell where it comes from, but I don't like the design, I'm a little bit retro there. Interview (retro-themed consumption) I think it's fancy, I don't find it more beautiful because I prefer the old design, because it is totally authentic to me, but they are fancy, they remind me of it, they look cool and I think they are because of it to be so popular with people. I: You think about, because of the looks above all? Because of the design? R: Yeah, this vintage look that is totally in vogue and exactly, I think that's why, yes, people try it out because it looks chic. Interview (retro-themed consumption) I probably say something is not polite to say, but... I tried to watch series Vikings. And after about ten minutes I was almost on my way to kill the TV. I know I have to try to watch because so much fantasy, but they are doing it so good, so close, for example, let's say I just have taken an example out of there, they are making someone having perfect outfits with all the dresses and everything but having blue hair. It is so close. They go to a different place they go to Haithabu, which is a very historical correct museum they have shows every year in Germany, but there was in Viking time it was in Denmark but now in Northern Germany. And Haithabu is a really flat part of Germany. They went to Haithabu but climbed up these huge mountains. No mountains in Haithabu, you go oh my god. It's small silly things, and I know I should try a bit other but rather I watch documentaries so I take out all the documentaries. It is so hard for me to see those Viking pop cultures where I am just waiting for them to pick up the big horn helmet and fur things on their clothes. Oh no, I cannot see it. Interview (Viking role-play)
Interrelation through newness	"you have linen, the wool, so they only allowed tents made linen and wool. And I understand in a way, but for visitors, it's not visible the difference, and the linen was also not a fabric not easy to make it is quite expensive in Viking age, so why would you make a tent out of that (laugh)? It is really silly, and you come back to the modern problem to us because we want to do everything as authentic as possible we would like to have a linen tent, but if linen gets wet, it gets really really heavy and then you take your tent car would break. Because we have really a big tent, we have quite a big shop (laugh)..." Interview (Viking role-play) "But what me, you know, what I don't like is retro design just to make it retro. If so, you have to somehow connect it with today's zeitgeist. At Emmy, for example, I have a retro design, but I make an electric scooter out of it. Then for me it is a thing that somehow fits together and then you can sort of add an old design to the present day. What I personally don't like so much is when you just use old things as they are with the negative qualities that they had. If you ask now with the Simson. I mean, she stank. It was certainly not very environmentally friendly, then I would find it nonsense if you start again to launch a Simson 2, which may look like the Simson 1, but with a petrol engine. If you start to trim a Simson on an electric scooter again, it would have its appeal again and that's how I generally see it when it comes to retro design." Interview (retro-themed consumption)
Integration through consumers as aesthetic agents	So everything you can cover is ok if you can go as, I think, you should try to do a bit better next season then you were in the last season. So, for example, if you just started maybe have linen tunic, its machine sewed the next time you make it hand-sewed. And the next time you make a new shirt plant-dyed, for example. So you try to upgrade yourself and everything you have. So and then you make, get a tent and then you may get a bed, then you might get a chest. You might get plates, cups, glasses.... Interview (Viking role-play) Here in Ribe, they have the archaeological depot. I do leatherwork I make shoes and bags, and all kinds of other leatherwork from Viking age and we got a chance to see all the Viking leather found find they got in Ribe. There was one piece of leather, a description that stood that was the upper part of shoes, this part of the shoes that outside. Looking at how the holes were in the leather, I said this is, can never be the upper part because it turns to round way around. So for me, it was a sole and not the upper part. Interview (Viking role-play)

theticized performances in the form of authenticating acts (Arnould and Price 2000), the overall practices facilitate the enchanting dimension of the object, which in turn allows consumers to become aesthetic agents and valorize the aesthetics of object or practice in terms of enchantment. Retro aesthetics, in the case of retro-themed consumption, mobilize both positive and negative aspects of nostalgic approaches towards the aesthetic formation of the past. When consumers who are particularly nostalgic towards the past valorize a past-themed branded object as a bad copy, they celebrate the retro era instead. Conversely, if the past-themed branded object is valorized as a lifestyle brand, then it is celebrated by that aestheticized version of the brand. In the case of Viking role-play, the act of material production of the most desirable images about the past create an integration to that aesthetic of the past. The aestheticization process renders object qualities into aesthetic qualities through the aesthetic agency of consumers.

The aestheticization of the past has different modalities, forms, functions, content, and contexts. Our analysis of Viking role-play and Emmy retro-themed consumption reveals that the co-creation of this aesthetic-formation of the past includes the processes of differentiation, interrelation, and integration. These processes are particularly helpful for marketing managers to understand the details of co-creation inherent in the aestheticization of the past in order to create enchantment strategies that embrace consumer-generated resources in the rendering of aesthetics. The co-presence of consumer and material resources in aestheticization processes facilitates the creation of enchantment in past-themed market and consumption contexts. Viking role-play consumption differs from the commercial retro-themed consumption in terms of the "spirit of do it yourself" (Barthes 1972), which indicates that the very development of past-themed material production often relies on the most desirable images of the past and its hyper-real objects (Baudrillard 1993). This research contributes to previous accounts on aesthetics in consumption and retro practices by broadening the theoretical scope of extant research, which focused mainly on an essentialist approach to aesthetic consumption. Contrary to prior research on aesthetics in consumption, this article illuminates the collective processes involved in the creation of a shared understanding of an object or concept to be considered aesthetic. In doing so, our study highlights the conceptual link between aestheticization and enchantment, thereby suggesting that underlying aestheticization processes are a vital ingredient in the creation of enchantment aspired by past-themed brands and practices.

REFERENCES

Arnould, Eric J., and Linda L. Price (2000), "Authenticating acts and authoritative performances: Questing for self and community," in *The why of consumption: Contemporary perspectives on consumer motives, goals, and desires*, eds. S. Ratneshwar, D. G. Mick, & C. Huffman, London: Routledge, 140-63.

Bach, Jonathan P.G. (2002), "The Taste Remains: Consumption, (N)ostalgia, and the Production of East Germany," *Public Culture*, 14 (3), 545-56.

Barthes, Roland (1972), *Mythologies*, London: J. Cape.

Baudrillard, Jean (1993), *Symbolic Exchange and Death*, London and Thousand Oaks: Sage.

Blackburn, Simon (2016), *"Aesthetics,"* The Oxford Dictionary of Philosophy, Oxford: Oxford University Press.

Brown, Stephen (1995), *Postmodern Marketing*, London, UK: Routledge.

———— (1999), "Retro-marketing: yesterday's tomorrows, today!" *Marketing Intelligence & Planning*, 17 (7), 363-76.

———— (2018), "Retro Galore! Is there no end to nostalgia?" *Journal of Customer Behaviour*, 17 (1), 9-29.

Brown, Stephen, Robert V. Kozinets, and John F. Sherry (2003), "Teaching Old Brands New Tricks: Retro Branding and the Revival of Brand Meaning," *Journal of Marketing*, 67 (3), 19-33.

Brunk, Katja H., Markus Giesler, and Benjamin J. Hartmann (2018), "Creating a Consumable Past: How Memory Making Shapes Marketization," *Journal of Consumer Research,* 44 (6), 1325-42.

Buschgens, Mark, Bernardo Figueiredo, and Kaleel Rahman (2019), "How brand owners construct imagined worlds with brand visual aesthetics," *Journal of Brand Management*, 1-18.

Charters, Steve (2006), "Aesthetic Products and Aesthetic Consumption: A Review," *Consumption Markets & Culture*, (9) 3, 235-55.

Goulding, Christina (2001), "Romancing the Past: Heritage Visiting and the Nostalgic Consumer," *Psychology & Marketing*, 18 (6), 565-92.

———— (2002), "An Exploratory Study of Age Related Vicarious Nostalgia and Aesthetic Consumption," in *Advances in Consumer Research*, eds. Susan M. Broniarczyk and Kent Nakamoto, Valdosta, GA: Association for Consumer Research, 542-46.

Hartmann, Benjamin, J., and Jacob Ostberg (2013), "Authenticating by re-enchantment: The discursive making of craft production," *Journal of Marketing Management*, 29 (7-8), 882-911.

Hartmann, Benjamin J., and Katja H. Brunk (2019), "Nostalgia Marketing and (re-) enchantment," *International Journal of Research in Marketing*, 36 (4), 669-86.

Hewer, Paul, and Douglas Brownlie (2007), "Cultures of Consumption of Car Aficionados," *International Journal of Sociology and Social Policy*, 27 (3-4) 106-19.

Holt, Douglas (1995), "How Consumers Consume: A Typology of Consumption Practices," *Journal of Consumer Research*, 22, 1-16.

Joy, Annamma, and John F. Sherry, Jr. (2003), "Speaking of Art as Embodied Imagination: A Multisensory Approach to Understanding Aesthetic Experience," *Journal of Consumer Research*, 30 (2), 259-82.

Maclaran, Pauline, and Stephen Brown (2005), "The Center Cannot Hold: Consuming the Utopian Marketplace," *Journal of Consumer Research*, 32 (2), 311-23.

Mazzalovo, Gerald (2012), *Brand Aesthetics*, New York: PalgraveMacmillan.

McCracken, Grant David (1988), *The Long Interview*, Qualitative Research Methods Series 13, Sage Publications.

Peñaloza, Lisa (1998), "Just doing it: A visual ethnographic study of spectacular consumption at Niketown," *Consumption, Markets & Culture*, 2 (4), 337-400.

Schroeder, Jonathan E. (2002), *Visual Consumption*, London: Routledge.

Schroeder, Jonathan E., Janet L. Borgerson, and Zhiyan Wu. (2015), "A brand culture approach to Chinese cultural heritage brands," *Journal of Brand Management* 22 (3), 261-79.

Spiggle, Susan (1994), "Analysis and interpretation of qualitative data in consumer research," *Journal of Consumer Research*, 21 (3), 491-503.

Thompson, Craig J. (1997), "Interpreting consumers: A hermeneutical framework for deriving marketing insights from the texts of consumers' consumption stories," *Journal of Marketing Research,* 34 (4), 438-55.

Venkatesh, Alladi, and Laurie A. Meamber (2008), "The aesthetics of consumption and the consumer as an aesthetic subject," *Consumption Markets & Culture*, 11 (1), 45-70.

Oppositional Loyalty Among Individuals: A Triadic Reading Grid For Loyalty With a Polarized Brandscape

Amina Djedidi, Université Paris-Est Créteil, IRG, France

INTRODUCTION

Fournier (1998) argued that brand relationships should be considered on an aggregate level, i.e., brandscape level. White and Dahl (2006) furthermore highlighted the need to study loyal consumers motivated both by brand attraction and by the desire to not be associated with an avoided out-group. Until now, brand loyalty has been defined as a dyadic phenomenon, linking consumer and brand. Through this study of oppositional loyalty (OL), brand loyalty acquires a new component borrowed from the literature on anti-consumption. Although the phenomenon of OL has been documented in studies on brand communities (Muniz and Hamer, 2001), lack of understanding still prevails when transposing the phenomenon to an individual not openly belonging to a brand community (Djedidi, 2019). Therefore, the question raised herein is whether this phenomenon would exist beyond the community the oppositional loyal member hitherto defended. This research explores the concept of individual OL and proposes a new reading grid for brand loyalty as an extension to traditional perspectives. Thus, examining the potential of OL to enrich the concept of loyalty merits attention, providing insight into this type of loyalty, which dissuades consumers from approaching competition, as well as reducing brand polygamy. Consequently, the present research question is: what are the conditions which make oppositional brand loyalty more likely?

Loyalty has been the subject of intense debate for more than eight decades. Research on loyalty first defined this concept as a behavioral dimension (Tucker, 1964). Progressively, loyalty was then defined as comprising two components: behavioral and attitudinal (Fishbein and Ajzen, 1973). To be considered a loyal consumer, it is not enough to consider buying the same brand every time; consumers must nurture positive feelings toward the brand (Oliver, 1999). Consumers can go further by considering the brand as a partner (Fournier, 1998a) and an extension of themselves (Belk, 1988). So far, this consumer-brand relationship has only been described as dyadic.

Nonetheless, some researches emphasize how positive and negative feelings, attitudes and choices are embedded in a complex relationship, enabling individuals to express themselves and achieve a psychological balance. Indeed, knowing that possessions can be understood as an extension of the self (Belk, 1988), Heider (1958) theorizes that, to gain harmony with oneself, individuals develop a series of harmonies involving contrasting attitudes to maintain a balance. Bourdieu (1979) employed this notion of contrast using the following polarities: taste and distaste, refined and vulgar, and beauty and ugliness. Such pairs enable identification of lifestyles and social classes. Appreciation of these contrasts is achieved by using a system of categorization, perceptions, thoughts and actions. In anthropology, Wilk (1997, 2012) reinforced Bourdieu's (1979) work based on the assumption that the status of a food or food group is related to a social differentiation system which may or may not be hierarchical. Moreover, he considered how both taste and distaste define relationships with objects by postulating that no form of consumption can be separated from non-consumption in reality. This interaction between chosen and discarded, desired and undesired, and positive and negative, gives greater insight into the consumer-brand relationship, which, until now, has only appeared as dyadic (consumer-chosen brand). The consumer-choice-anti-choice triad provides more insight into the interaction between positive (consumer-chosen option) and negative (consumer-discarded option) relationships.

In parallel, research on brand communities highlights the combination of a positive relationship with the brand and a negative relationship with its competitor, a term Muniz and Hamer (2001) labelled 'oppositional loyalty'. Brand community members express loyalty in two ways. Firstly, they define themselves by both the brand they consume and the brand they do not consume. This reflects an entanglement of symbolic consumption (Sirgy, 1982; Solomon, 1983) and anti-consumption (Hogg, 1998, Lee at al., 2009). Second, they express their opposition to the competitive brand by: (1) developing an ironic rivalry towards consumers of the competitive brand (Muniz and Hamer 2001), (2) expressing oral (Hickman and Ward, 2007) and physical aggressiveness (Ewing et al., 2013). The essence of OL lies in the "*antagonistic vision of competition*" found among these groups (Ewing et al., 2013) and perceived danger (Muniz and Schau, 2005). A literature review reveals a gap on two levels: research on traditional loyalty and investigations on oppositional loyalty. Indeed, literature on traditional loyalty focuses on the consumer-chosen brand relationship and its scope is reduced to the positive consumer-brand relationship, failing to introduce other brands present on the market, which may fuel this positive relationship. However, such positive relationship can conversely feed an individual's negative relationship with other brands. Instead, researchers have chosen, by omission, to use the "*ceteris paribus*" hypothesis, reducing the field to the simple dyadic consumer-brand relationship. When choosing to focus on both positive and negative relationships, OL research has mainly focused on brand communities. However, momentum derived from group meanings and affiliations immerses the individual in the euphoria of "*deindividuation*" (Zimbardo, 1969) following the current group. Once individuals are beyond the influence of the brand community, their reaction can change and their euphoria soften. It is at this point that consumers' immunity from going to the competition vanishes (Thompson and Sinha, 2008). This research therefore focuses on the OL of the individual rather than of the brand community.

RESEARCH METHODOLOGY

OL is likely to emerge in highly competitive markets (Muniz and O'Guinn 2001) such as smartphones and disruptive markets where brands try to dethrone the leader or "the king of the hill" (Smith et al, 2001) and to gain legitimacy and market share (Djedidi and Hani, 2016). Moreover, the symbolic consumption of smartphone brands increases social pressure on consumers. A two-phased data collection procedure was undertaken through interviews with male and female informants from different socio-professional classes: (a) an exploratory phase to identify the existence of oppositional loyalty comprised 30 semi-directive interviews in 2012 using snowball method; (b) a development phase to gain better insight into OL and its evolution comprised 14 life stories of consumers who agreed to a second interview in 2014. They were informed that this phase was to "know more about their overall consumption". Interviews were performed in interviewees' homes to preserve privacy. The focus was on OL to brands from different categories to nullify product category effect and explore the phenomenon across product categories. Interviews were recorded and 706 pages of transcribed interviews were coded using Nvivo software. Thematic content analysis was undertaken through *a priori* and *a posteriori* coding (Miles and Huberman, 2002), moving from *emic* to *etic* coding (Belk et al*., 2*013).

RESULTS

Presentation of the findings begins by examining OL on two levels and describing its evolution over time.

OL as a triadic and polarized form of brandscape

The specific form of OL lies in its triad configuration, linking consumer, chosen brand and avoided brand. This polarized form of brandscape is the essence of an individual's OL, nurturing both attitudes and behaviors.

Table1: Oppositional loyalty of the individual form and dynamics

Oppositional loyalty triadic and polarized form in different product categories: clothes, video games, cinema theaters, smartphones, computers, restaurants…		
Attitudinal level	**Chosen brand (Brand A)**	**Rejected brand (Brand B)**
Presence of dichotomy perspective of *chosen vs. rejected option* and the *me/us vs. them* manifesting as market polarization in consumer brandscape where dyadic relationships are interwoven in a more inclusive and triadic model.	Positive emotions, feelings and cognitions towards the brand, its products and its consumers. Tendency to identify oneself with fellow consumers of this brand.	Negative feelings and cognitions towards the brand, its products and its consumers. In some cases, consumers can even resist Brand B and define themselves by dis-identifying from its consumers.
Behavioral level	**Chosen brand (Brand A)**	**Rejected brand (Brand B)**
Behaviors directed at brands reflecting this embedded dyadic relationship in a larger triadic and polarized pattern involving simultaneously positive and negative behaviors.	Brand purchase and repurchase intentions are the most common identified behaviors. In some cases, strong brand engagement is observed.	Consumer avoids, resists and/or boycotts the brand. In some situations, they are ready to forgive this brand only if it metamorphoses into Brand A.
Behaviors directed at consumers are word-of-mouth and teasing. They are manifested in action/reaction dynamics with others and reflect polarization through perceived comparison and opposition.	Consumers positively put forward the chosen brand, spread positive W-O-M, and recommend it. Others brag and bask in the reflected glory.	They question, criticize and devalue Brand B, and warn against it.
Oppositional loyalty dynamics		
Attitudinal level	**Evolution over time (2012-2014)**	**Identified sources**
Brand choice and anti-choice based on functional aspects	The intertwined positive and negative attitudes changed as there is a attenuation of their momentum and an increase in hesitation when consumers argue about brands.	Competition improvement could have introduced doubt about the superiority of their chosen brand.
Brand adoption and rejection based on symbolic aspects	Consumers maintained the tightly-linked game of rejecting undesired brand image and embracing a more desired one as their discourse remained unaltered.	Image is built over time and is not easily altered in the short term.
Behavioral level	**Evolution over time (2012-2014)**	**Identified sources**
Chosen brand purchase and repurchase intention as well as avoided brand rejection are dual behaviors characterizing oppositional loyal consumers.	Two identified tendencies: a constant one that translate a rigid tandem of adoption and avoidance and a hesitating one where deep beliefs about the unique performance of the chosen brand may have been shaken.	Constant behaviors are nurtured by functional and/or symbolic (self-congruence) added value whereas hesitation is fueled by competition improvements that shake the chosen brand superiority myth.
Teasing and spreading W-O-M are behaviors that may be consistent or altered through time.	Consumers may maintain their everyday lives flavored with teasing and express themselves by spreading W-O-M as long as comparison with competitors is favorable.	As the essence of oppositional loyalty is rooted in comparison, environment and competition evolution may alter its momentum as comparison is no longer a source of self-esteem enhancement.

Bi-dimensional attitude

Informants' discourse mainly concerned opposing choice and anti-choice in a very spontaneous manner. As presented in table 1, these oppositions are presented on 3 levels of discourse: product, brand image, and consumer image where product, image and consumer of the chosen brand are always portrayed by oppositional loyal consumers as being better than those of the rival brand. For example, when asking Louisa (female, 33y, pharmacist) her impression of a typical Samsung user, she answered "*I love Samsung, I am happy when I see people holding a Samsung, it is great!...they*

wear colorful clothes, they are smiling and modest (then spontaneously added) But I don't like iPhones, when I see people with their iPhone, they seem pretentious (grimace)". An inverse effect is true with some iPhone oppositional loyal consumers. Adam (male, 32y, entrepreneur) describes iPhone consumers as important and having a certain social status, and Samsung consumers as those "*who only eat and drink, it proves that they are sedentary, they're not interesting, they do nothing in life!* » (Adam).

This spontaneous comparison, revealing a polarized vision of brands, is not exclusive to the smartphone category. For instance,

when asked about cinema, Fleur (female, 40y, doctor) answered "*I like cinema, I prefer art films, despite being a difficult genre (spontaneously continued) I don't like blockbusters, usually action films with special effects, they are a waste of money: cars are broken, stuff is stolen…they attract a popcorn-eating audience which makes noise….it is annoying…sometimes they include very bad jokes I don't like…. There is an art film, Guillaume et les Garçons, which costs nothing but conveys many messages and encourages us to question things, very interesting… the audience tends to be silent, respectful*".

This dichotomy of chosen vs. rejected and "me/us vs them" present in the three levels of analysis reflects this polarization in the consumer's mind around chosen and rejected brands, enabling them to derive value from this opposition. This level reflects the shape of brandscape (Sherry, 1998; Thompson and Arsel, 2004) in a polarized configuration, as perceived by the oppositional loyal consumer (Djedidi, 2019) reflecting the polarized form of competition (Djedidi and Hani, 2016; Muniz and O'Guinn, 2001).

Bi-directional behavior

Behaviors directed at a brand reflect an embedded dyadic relationship in a larger triadic pattern, involving simultaneously positive (purchase, engagement) and negative (avoidance, resistance, boycott) behaviors. Behaviors directed at consumers are word-of-mouth and teasing. These are manifested in action/reaction dynamics with others and reflect this perceived comparison and opposition.

Although presented as two distinct dimensions, attitude and behavior are revealed as being intertwined. Through the life stories, more details about interviewees' family surroundings, lifestyles and value systems were provided. Adam grew up in a large family with limited means and defines himself as a businessperson. His chosen brands are statutory and reinforce his actual social status, whereas his rejected brands are those reflecting a different image. Sophie was raised in a family where money was earned. Her chosen brands are those which prove they deserve her loyalty and the rejected ones fail in this. She maintains a comparative discourse, aiming to highlight the benefits of the chosen brand and the defaults of the rejected brand. Léo does not like his image and has never seen himself as good-looking. He believes this has not changed even when consuming brands promising an attractive image. His loyalty is only to brands promising technical performance; and he openly opposes brands promising beauty and sociability.

Dynamic nature of OL

Results in table 1 highlight how the only change observed on the attitudinal dimension related to the product as a result of an improved competing offer. However, comparative discourse on image remains consistent. This result seems in-keeping with the essence of brand image which is relatively stable and difficult to change in the short term. The behavioral dimension of OL presented similar trends, since intention to repeat purchase changes over time when linked to product performance, and remains stable concerning image.

DISCUSSION AND CONCLUSION

This study provides insight into loyalty for academics. By showing its existence on an individual level outside communities, the notion of loyalty shifts from a dyadic to a triadic form. The findings contribute to a more complete understanding of loyalty by demonstrating that it can be expressed through simultaneous consumption of the chosen brand and anti-consumption of the competing brand. The emergent nature of loyalty reveals it to be triadic rather than dyadic as a manifestation of a polarized brandscape. This simultaneous positive-negative relationship is evident in interviewees' discourse where they express their relationships with the chosen brand

and with the avoided brand in an intertwined way. We can therefore argue that measurement of loyalty should be more open to include the negative relationship with competing brands.

This research has important implications for brand managers, highlighting consumers' contributions to brands, either as an asset for the chosen brand or as a liability for the avoided brand. Oppositional loyalty is expressed on (1) the attitudinal dimension, referring to positive and negative cognitions and emotions towards each brand; and (2) the behavioral dimension, reflecting repeat-purchase behavior, positive word-of-mouth for the selected brand and avoidance, boycott and negative word-of-mouth for the rejected brand.

It also explores the dynamic nature of oppositional loyalty, as it *may remain constant over time* when animated by brand image rejection. It can also evolve when reflecting rejection related to product performance potentially affecting consumers' immunity. This provides some elucidations of the results of Thompson and Sinha (2008) questioning oppositional loyal consumers' immunity to competitive brands.

Far from espousing consumer enslavement logic (Baudrillard, 1970), this research places OL in the continuation of work on ordinary resistance, reflecting consumer empowerment (de Certeau, 1984; Fournier, 1998b; Roux, 2007). Indeed, results highlight the way consumers, through oppositional loyalty, are not subject to the market but rather interact with it. They act as equal partners who can simultaneously reward and punish market actors through consumption and anti-consumption.

The research further contributes by suggesting that, due to the OL phenomenon, market polarization can reduce competition. Fierce competition between brands may lead to perceived market polarization around two major competitors and, therefore, reconfigures market in the individual's mind through brandscape. This can eliminate other competitors from consumer brandscape. As such, competition is also shifting from a substitution to non-substitution perspective as brand consumption is mainly fueled by its rival anti-consumption. Moreover, Sabri et al. (2020) studied how competitors' collaboration decreases the perception of price fairness of new products. Consumers disappointed by price unfairness may adopt less powerful brands to support them and avoid allied competitors as punishment. Then, this paper results may reveal a new episode of post-coopetition impact on the emergence of OL.

Sekhon and Armstrong Soule (2020) recently identified the role constellation of consumption choices plays in nurturing pro-environment anti-consumption action. This study offers an angle of analysis for studying how consumption and anti-consumption would be complementary (García-de-Frutos et al (2018) and intertwine to nurture green demarketing practices.

Recent papers on anti-consumption in the food industry tend to propose insights for businesses and society to encourage conscious consumption practices (Kashif, 2019). Islam et al. (2019) studied how incongruity leads to fast food brand hate. De Bernardi and Tirabeni (2018) studied the implementation of alternatives to conventional food systems and to improve food anti-consumption behaviors. The creation of a sustainable food supply chain can benefit from OL dynamics and encourage consumers to adopt more sustainable habits.

When studying vulnerability, Cherrier and Hill (2018) depict anti-consumption among materially-deprived consumers less as strategies for fancied emancipation and more as survival tactics. The OL framework provides potential answers to Cherrier and Hill's (2018) proposition to study how governments include homeless people as consumers in exchange systems. Indeed, the triadic and polarized form opens doors for public policies to seize anti-consumption

as a nurturing force for consumption and, therefore, homeless social inclusion.

Beyond its contributions, this research has limitations. Firstly, different product categories were covered by this research, evoked by interviewees, such as smartphones, clothes, video games, cinema theaters, computers, restaurants…etc. Secondly, life stories were analyzed thematically whereas a structural analysis would deepen insight into OL. Future research could quantitatively investigate the extent to which OL may be related to consumption conspicuousness (Makri et al., 2020) or individual factors.

REFERENCES

Baudrillard J. (1970), *La société de consommation*, Paris : Idées/ Gallimard.

Belk, Russel W. (1988), "Possessions and the extended self," *Journal of Consumer Research*, 15, 139–68., Fischer Eileen and Robert V. Kozinets (2013), *Qualitative Consumer and Marketing Research*, London: SAGE Publications Ltd.

Bourdieu, Pierre (1979), *La Distinction. Critique sociale du jugement*, Les Éditions de Minuit.

Cherrier, Hélène and Ronald P. Hil (2018), "Anti-consumption as tactical response to institutionalized subordination: The case of materially deprived anticonsumers," *Journal of public policy and marketing*, 37(2), 213–226.

De Bernardi, Paola and Lia Tirabeni (2018), "Alternative food networks: sustainable business models for anti-consumption food cultures," *British Food Journal*, 120(8), 1776–1791.

de Certeau, Michel (1984), *L'invention du quotidien*, Paris : Gallimard.

Djedidi, Amina (2019), "When Someone's Gain is Someone Else's loss: Evidences through Individual Oppositional Loyalty," *Winter AMA Proceedings*, 207–208.

Djedidi, Amina and Mouhoub Hani (2016), "Firm Strategic Behavior Versus Consumer Behavior: An Explanation Through the Inoculation Theory," in *Marketing Challenges in a Turbulent Business Environment*, 417–432, Springer, Cham.

Ewing, Michael T., Peter E. Wagstaff and Irene H. Powell (2013), "Brand rivalry and community conflict," *Journal of Business Research*, 66, 1, 4–12

Fishbein, Martin and Icek Ajzen (1975), *Belief, Attitude, Intention and Behavior: An Introduction to Theory and Research*, Reading, MA: Addison-Wesley.

Fournier, Susan (1998a), "Consumers and their brands: developing relationship theory in consumer research," *Journal of Consumer Research*, 24, 4, 343–73., (1998b), "Consumer resistance: societal motivations, consumer manifestations, and implications in the marketing domain," *Advances in Consumer Research*, 25, 88–90.

García-de-Frutos, Nieves, José Manuel Ortega-Egea and Javier Martínez-del-Río (2018), "Anti-consumption for environmental sustainability: conceptualization, review, and multilevel research directions," *Journal of Business Ethics*, 148(2), 411–435.

Heider, Fritz (1958), *the psychology of interpersonal relations*, New York: Wiley.

Hickman, Thomas and Jamkes Ward (2007), "The Dark Side of Brand Community: Inter-Group Stereotyping, Trash Talk, and Schadenfreude," *Advances in Consumer Research*, 34, 314–19.

Hogg, Margaret K. (1998), "Anti-constellations: exploring the impact of negation on consumption," *Journal of Marketing Management*, 14, 133–58.

Tahir Islam, Saman Attiq, Zahid Hameed, Munnawar Naz Khokhar, Zaryab Sheikh

Islam, Tahir, Saman Attiq, Zahid Hameed, Munnawar N. Khokhar and Zaryab Sheikh (2019), "The impact of self-congruity (symbolic and functional) on the brand hate," *British Food Journal*, 121(1), 71–88.

Makri, Katerina, Bodo B. Schlegelmilch, Robert Mai and Katharina Dinhof (2020), "What we know about anti-consumption: An attempt to nail jelly to the wall," *Psychology and Marketing*, 37(2), 177–215.

Kashif, Muhammad (2019), "Food anti-consumption and consumer well-being," *British Food Journal*, 121 (1), 2–5.

Lee, Michael S., Motion Judith and Conroy Denise (2009), "Anti-consumption and brand avoidance," *Journal of Business Research*, 62, 2, 169–80.

Miles, Mathew B. and Michael A. Huberman (2002), *The qualitative researcher's companion,* Sage.

Muniz, Albert M. and Lawrence O. Hamer (2001), "Us versus them: oppositional brand loyalty and the cola wars," *Advances in Consumer Research*, 28, 355–61.

Muniz, Albert M. and Thomas C. O'Guinn (2001), "Brand Community," *Journal of Consumer Research*, 27, 4, 412–32.

Muniz, Albert M. and Hope J. Schau (2005), "Religiosity in the Abandoned Apple Newton Brand Community," *Journal of Consumer Research*, 31, 4, 737–47

Roux, Dominique (2007), "Ordinary resistance as a parasitic form of action: a dialogical analysis of consumer/firm relations," *Advances in Consumer Research*, 34, 1, 602–609.

Sabri, Ouidade, Amina Djedidi and Mouhoub Hani (2020), "When does coopetition affect price unfairness perception? The roles of market structure and innovation," *Journal of Business and Industrial Marketing, forthcoming.*

Sekhon, Tejvir S. and Catherine A. Armstrong Soule (2020), "Conspicuous anti-consumption: When green demarketing brands restore symbolic benefits to anticonsumers," *Psychology and Marketing*, 37(2), 278–290.

Sherry, John F. (1998), *Servicescapes: The Concept of Place in Contemporary Markets,* NTC Business Books: Chicago, Illinois.

Sirgy, Joseph M. (1982), "Self-Concept in Consumer Behavior: a Critical Review," *Journal of Consumer Research*, 9, 4, 287–99.

Smith, Ken G., Walter J. Ferrier and Curtis M. Grimm (2001), "King of the hill: Dethroning the industry leader," *Academy of Management Perspectives*, *15*(2), 59–70.

Solomon, Michael R. (1983), "The role of products as social stimuli: a symbolic interactionism perspective," *Journal of Consumer Research*, 10, 3, 319–29.

Thompson, Craig J. and Zeynep Arsel (2004), "The Starbucks brandscape and consumers' (anticorporate) experiences of glocalization," *Journal of Consumer Research*, 31, 3, 631–642.

Thompson, Scott A. and Rajiv Sinha (2008), "Brand communities and new product adoption: The influence and limits of oppositional loyalty," *Journal of marketing*, 72, 65–80.

Tucker, Thomas W. (1964), "The Development of Brand Loyalty," *Journal of Marketing Research*, 1(2): 32–35.

White, Katherine and Darren W. Dahl (2006), "To Be or Not Be: The Influence of Dissociative Reference Groups on Consumer Preferences," *Journal of Consumer Psychology,* 16, 4, 404–13.

Wilk, Richard R. (1997), "A Critique of Desire: Distaste and Dislike in Consumer Behavior," *Consumption, Markets and Culture*, 1, 2, 175–96. (2012), "Freedom to Consume the World?," in The Consumption of Culture, the Culture of Consumption, ed. V. Marilena Lambert Academic Publishing, 249–57.

Zimbardo, Philip G. (1969), "The human choice: Individuation, reason, and order vs. deindividuation, impulse, and chaos," in Nebraska Symposium on Motivation, ed. W. J. Arnold, D. Levine, Lincoln: university of Nebraska press, 237–307.

Thingification: Interrupting Subject and Objects

Julie Emontspool, University of Southern Denmark, Denmark
Cristiano Smaniotto, Aarhus University, Denmark

INTRODUCTION

Growing awareness about the harmful impact of human-centric social systems – among them markets – on the environment challenges the sustainability of humanity's focus on itself. As the circular economy illustrates, alternative arrangements promote a reconceptualization of human-centric systems by drawing upon ecological principles of harmony with(in) the material environment. Yet to succeed in this reconceptualization, we must question the social ontology informing our understanding of the relations between humans and the environment in which they and their consumption practices are embedded (Slater 2014). If we want to uncover new modes of being – and consuming – with(in) the environment, we must therefore rethink the togetherness of (human) subjects and (non-human) objects.

This paper builds on consumer research that redefines the ontological assumptions about the relation between consumers and objects (Belk and Humayun 2018; Bettany and Kerrane 2011; Borgerson 2005; Ferreira and Scaraboto 2016; Hoffman and Novak 2018). Existing research proposes that agency results from the interactions between subjects and objects, thus questioning the idea that objects are passive entities which consumers act upon, in favor of a view of objects as capable to act on subject. We move further than these studies to tackle an even more fundamental – yet underexplored – ontological assumption: the primordial dichotomic separation between subjects and objects. We investigate how this separation is recursively achieved by asking: how are consumer subjects constituted as separate from objects?

To answer this question, we draw on Barad's (2007) neo-materialist approach to ontology to develop a theoretical framework accounting for the simultaneous constitution of subjects and objects, which we call the process of thingification. Thingification emerges from a recursive unfolding of interruptions, moments when habitual relational configurations are halted and disrupted (Dawney 2013), and the boundaries of things (subjects and objects) arise. We apply this framework to the case of polyurethane competitive swimsuits, withdrawn from the market after a short but much-debated existence. We identify three types of interruptions (material, moral and institutional) through which the suit (object) was separated from the swimmer (subject). We discuss the implications of our paper for identity and subjectification perspectives, which enable a rethinking of current social and environmental unsustainable modes of being.

LITERATURE REVIEW

Relation(s) between subjects and objects are at the core of consumer research (Borgerson 2013). Focusing on identity, existing studies address how *consumers use objects* to: extend their self (Belk 1988); solve tensions in their identity narratives (Ahuvia 2005; Shankar, Elliott, and Fitchett 2009); reproduce class identity (Holt 1998; Moisio, Arnould, and Gentry 2013); shape group identity, such as family (Epp and Price 2008; Moisio, Arnould, and Price 2004) and subculture (Kates 2002; Schouten and McAlexander 1995); perform gendered identity (Jantzen, Østergaard, and Vieira 2006; Moisio et al. 2013; Phillips and Sego 2011). Behind this perspective lies the assumption that subjects and objects exist as two separate sets of finite entities. On the one side, subjects (consumers), which constitute themselves through intersubjective interactions (Jantzen et al. 2006) because they are in possession of agency, i.e. the capacity to construct, interpret and transform a symbolic environment. On the other

side objects, "thing-in-themselves", which lack agency, and around which consumers create meaning (Bettany and Kerrane 2011).

Digging deeper into questions of consumer agency, Foucault-inspired studies theorize subjectification as discursive negotiations shaping agency against a background of structural conditions. This research details how consumer subjects are created by ideological struggles (Karababa and Ger 2011), governmental processes (Giesler and Veresiu 2014), corporate (Moisander and Eriksson 2007) and cultural discourses (Mikkonen, Vicdan, and Markkula 2013). Some studies even show how consumers resist normalized subject positions, such as body ideals (Ourahmoune 2017; Zanette and Pereira Zamith Brito 2018). All these studies bring forward the relational character of subjects' agency, yet still treat subjectification as an intersubjective process, where objects are *used to* shape consumer agency and thus specific subjectivities.

Few studies acknowledge objects' active role in shaping subjects through material negotiations beyond processes of signification – such as studies on self-service devices (Du Gay 2004), loyalty cards (Beckett 2011) and food labels (Yngfalk 2015). Food labels, for instance, disembody consumers' evaluations of spoiled food, directing agency away from the consumer for the timing of food disposal (Yngfalk 2015). Despite these insights, such perspectives reinforce the assumption of the a-priori division between a world of subjects and one of objects. Recent studies about human-object assemblages have questioned this division by addressing objects' dominance over subjects (Belk and Humayun 2018). But instead of delving into cases where subjects and objects become blurred, we problematize existing dichotomies between subject and object by investigating how subjects and objects are constituted simultaneously.

SEPARATING SUBJECTS AND OBJECTS THROUGH THINGIFICATION

To investigate the simultaneous constitution of subjects and objects, we draw on a neo-materialist interpretation of Spinoza's monism, according to which there is only one substance constituting the world and all its elements. From this perspective, differences between entities of various types (such as computers or humans) are mainly differences of form. This form represents a thing's mode of being, a temporary coagulation of relations that gives things their seemingly fixed character. Barad (2007) calls such modes of being "intra-actions", the recursive unfoldings of relations which establish the material conditions of possibility of a thing.

According to Barad (2007), intra-actions also enact the separation between subjects and objects. That is, the boundaries of things are determined through the form(ation) of things themselves, which represent interruptions in the continuous flux of relations (of substance) ontologically constituting the world and all its elements. In other words, things are machines interrupting flows of energy and matter (Deleuze and Guattari 1972). For example, while eyelids interrupt the flux of light towards the eyes, the body defines the boundaries of itself. Indeed, when closing their eyes, humans phenomenologically recognize themselves as an entity apart from their material environment, a thing interrupting a recursive relational flow.

It is therefore in these interruptions that we must find instances of the recursive process of "thingification", that is the process through which subjects and objects are simultaneously constituted. Interruptions are moments "that halt and disrupt the flow of experi-

ence" emerging from "habitual modes of being [a subject]" (Dawney 2013, 628). In other words, during these moments, subjects become aware of the agential configurations they normally partake in and that define their habitual modes of being (like when closing their eyes). From the moment of birth (when subjects are first separated from the surrounding environment, the mother's womb) and further through socialization processes, interruptions happen recursively while defining and sharpening the boundaries of the subject as well as the object(s) from which it is separated.

Interruptions are always corporeal, as they are a separation of the body from other things. Yet humans make sense of these separations also through language, which separates things into concepts and categories. Language offers a frame through which we make sense of the relational material configurations that define our habitual form, while excluding an infinite number of other possible configurations. For example, the sensation of pain felt after cutting ourselves with a knife describes an interruption of our habitual mode of being, which is normally pain-free. The word "pain" acts as symbolic reference for a relational configuration subject-object that we learn to avoid. In describing, thinking and speaking of "pain", we then refer to an infinite number of possible modes of being in which the subject must be separated from another thing, the knife.

METHOD AND CONTEXT

This study draws on a discourse analysis of news articles published in connection to the introduction, use and subsequent banning of full-body polyurethane swimsuits in official swimming competitions. It is an ideal case for studying how interruptions establish a distinction between subject and object as the debate circled around the question of who or what a swimmer is – a human body alone or a body-suit ensemble.

We collected data in English- and Danish-language news media outlets, both generalist and specialist. We selected 224 news articles published between 2000 and 2018, using search words relative to the polyurethane suit debate such as "polyurethane swimsuits", "performance-enhancing swimsuits", as well as words referring to specific brands and athletes.

After a first review of the data, coding proceeded iteratively, alternating between individual coding (both theoretical and emergent) and joint discussion of the codes between the authors. The present paper concentrates on the insights gathered from a sample of 55 articles selected by hand, which served as basis for an in-depth analysis of the interruptions through which a specific consumer subject (the competitive swimmer) is constituted in its separation from a specific object (the plastic suit).

FINDINGS

Our findings indicate that recursive interruptions establish subject-object distinctions when consumers identify disruptions in their habitual modes of being. We identify three types of interruptions constituting the process of thingification by which things are constituted through their separation: material, moral and institutional. Table 1 provides a definition of each type of interruption along with illustrative data excerpts.

Material interruptions

Material interruptions erect boundaries between subject and object by distinguishing the body from the suit. In our data, subjects articulate this distinction by differentiating between the body within the suit as opposed to the body without. Such distinctions appear when swimmers refer to the embodied experience of swimming with the suit as different from their habitual swimming experience

(Excerpt 1). But material interruptions are also articulated through attributions of agency to either the subject or the object in swimming performances (Excerpts 2 and 3).

In addition to confirming the active role of objects in shaping consumer agency through processes of subjectification (Beckett 2011; Du Gay 2004; Yngfalk 2015), the identified material interruptions highlight the co-constitution of subject's and object's agency through the interruption of habitual experience.

Moral interruptions

Moral interruptions arise from the discursive embedding of the material interruptions in society's values. They revolve around the central question of what (morally) constitutes a subject, here the swimmer. In our findings, moral interruptions relate to an ideological distinction between pure swimming and technology-enhanced swimming (similar to Kozinets 2008). The interruption arises from a contamination of the sport's perceived purity through the use of the performance-enhancing object, which generates nostalgic calls for a return to the "real", that is technology-free, sport (Excerpt 4). The interruption of the sport's purity is further accentuated when the suit compensates for the subject's inadequacy in terms of their swimming performance, which is perceived as an unfair advantage. Such advantages are interpreted as sharpening existing (class) inequalities and harming the (pure) quality of the sport (Excerpts 5 and 6).

Therefore, moral interruptions connect the symbolic and intersubjective structures upholding ideological categorizations of right and wrong to consumer's corporeal experience of the material world. Here, materiality is not *used to* constitute the moral subject (Giesler and Veresiu, 2014), but the moral subject arises from its material relation with the environment.

Institutional interruptions

Institutional interruptions relate to the interruptions that institutional actors generate to sharpen the definition of a subject. Our analysis shows two types of institutional interruptions. On the one hand, institutional actors rely on scientific testing of performances in order to establish or strengthen the dissociation between subjects and objects (Excerpts 7 and 8). The subject is then defined by negative affirmation, where the swimmer is the body not wearing polyurethane suits. One the other hand, alternately defining the swimsuit as equipment or as swimwear allows regulatory institutions to either ban or allow the suits (Excerpt 9).

These findings suggest that the discursive negotiations through which institutions shape the consumer subject (Giesler and Veresiu 2014; Karababa and Ger 2011) are also always material negotiations of both the subject's and object's form. In other words, institutions are machines that interrupt the flows of matter defining things and their modes of being.

DISCUSSION AND CONCLUSION

Our findings add to existing knowledge about consumer-object relations by explaining how subjects and objects are constituted as different entities from a same ontological foundation. Doing so, this article continues important work questioning the existence of a-priori ontological differences between subjects and objects, and resulting attributions of agency (Belk and Humayun 2018; Bettany 2007; Bettany and Kerrane 2011; Borgerson 2005, 2013; Hoffman and Novak 2018). To compensate for an overemphasis on the capacity of subjects to act, these studies focus on how objects act on subjects. They propose that agency is a result of the interactions of subjects' and objects' properties. Our study goes a step further in questioning this inherent distinction between the categories of subjects and objects.

Table 1 – Three types of interruptions

Type of interruption	Definition	Illustrative excerpts*
Material	The moment when the habitual embodied experience is challenged and the form of the body is reconfigured. This interruption withdraws the subject's material composition from its environment. As a consequence, the subject realizes its own embodied boundaries and position of subjectivity. In our case, the interruption disturbs the habitual experience of the body in a suit, while the focus turns to body-with-the-suit (vs the body-without). The boundaries between what is the subject (the swimmer) and the object (the suit) are sharpened by such interruption.	**Excerpt 1** "Every time I put on that suit, I know I'm going to fly," said Ryan Lochte, who set a world record in the 200-meter backstroke at the world championships. **"I've been swimming constantly for like 15 years, and I've never felt this good in the water. It's super thin, and it keeps you floating.** If you try that suit once, you're never going to put anything else on."" (*New Suit Makes Splash in Debut; World's Best Swimmers Say Speedo's FS Pro Is Slick, Quick* – The Washing Post, July 31 2007) **Excerpt 2** "Many sceptics look forward to swimming going back to its bodily essence, where it is what is inside the suit, rather than outside of it, that makes a difference" [translated from Danish] (*Svømmere er blevet nogle underlige fisk* [Swimmers have become some weird fish] – Politiken, July 26 2009*)* **Excerpt 3** "The consensus is that it is **the suits -- and not the swimmers -- that have gotten faster** […] I hope there will be a time when I can beat Michael Phelps without the suit" (*Phelps Loses, and a Debate Boils Over* – The New York Times, July 29 2009)
Moral	The moment when the new embodied experience is translated into moral terms. That is, material interruptions (as seen above) question the defining boundaries of subjects and objects: what is a subject (in this case, a swimmer)? This question is posed in terms of what constitutes swimming (what are the values of the practice and which actors [should] define swimming).	**Excerpt 4** "Technology . . . has changed the sport completely. Now it's not swimming. You hear a headline; it's always, 'Who's wearing what suit?' It's not swimming. **I'm looking forward to the day we can call our sport swimming again**" (*At Worlds, 'It's Not About the Swimmer'; Suits Are Again Talking Point After Phelps Is Routed* – The Washington Post, July 29 2009) **Excerpt 5** ''The thing that's really hurt more than anything else is **the whole suit situation has devalued athleticism,**'' Salo said. ''A lot of **kids who aren't in very good shape can put on one of these suits** and be streamlined like seals.'' (*Swimming Bans High-Tech Suits, Ending an Era* – The New York Times, July 25 2009*)* **Excerpt 6** "On a more local level, when $100,000 world record bonuses aren't on the table, **it increased the gap between the haves and have-nots. In a sport that is already stigmatized by the elitest, wealthy, country-club persona, telling swimmers that they couldn't legitimately compete without spending $700 on a suit demoralized the masses and devalued the effects of hard-work by both swimmers and coaches. The suits corrected flaws in technique and made up for a lack of attention to detail."** (*A Eulogy For Polyurethane: Masters Nationals Closes Supersuit Era* – SwimSwam Magazine, May 25 2010)

| Institutional | The moment when the object is defined through institutional interventions, such as through scientific testing and/or governmental regulation.

The subject (or what constitutes the subject) is here defined by negative affirmation (the swimmer is not that wearing polyurethane suits). | **Excerpt 7**
"The other world record was set in a suit developed by Arena, who have called for Fina to take action. In an open letter published in yesterday's Daily Telegraph, Cristiano Portas, the Arena Group chief executive, said a "firestorm of publicly expressed concern has ensued about the alleged buoyancy advantage provided by Speedo LZR Racer and Tyr Tracer Light swimsuits". Arena want Fina to carry out tests on all new suits to ensure that competition remains fair. Portas said concerns about the suits must be addressed "in order to avert an irrecoverable loss of credibility just a few months before the Olympic Games". He added: "As a consequence, a reliable and transparent analysis of these materials, as well as a careful assessment of approval procedures, is urgent. Such action is in the supreme interest of the sport."
(New suit sparks costume drama – The Daily Telegraph, April 12 2008*)*

Excerpt 8
"the National Federation of State High School Associations has taken no action, noting **there is no scientific proof the suits provide a competitive advantage**. For the same reason, **a moratorium on the latest technical suits was lifted** in September by the National Collegiate Athletic Association."
(For amateur swimmers, the cost of success doesn't suit everyone – The Washington Post, November 9 2008*)*

Excerpt 9
"The international swimming federation, FINA, has rules about swimwear and the use of equipment during competitions. The rules say that googles are the only allowed equipment and that swimwear should respect norms of common decency. FINA has nonetheless allowed the use of these suits, as they mean they cannot be considered equipment, but swimwear. […] FINA has rules about: the breadth of the lanes, the allowed lane markers, the height of the starting platforms, the temperature of the water, and so on. Yet there are no rules for swimwear, besides those of common decency. **It could be an idea that FINA made rules about the type of textile allowed, the number of panels [the suit should be made of], the percentage of the body the suit can cover, the weight of the suit, etc.**"
[translated from Danish]
(Debat: Hvad skal vi med "Snydepelsen"? [Debate: What should we do of the "Cheat coat"?] – Jyllands-Posten, August 28 2000) |

*all emphasis in the excerpts is added

It suggests that agency is a not a "property of" either one of these categories, but it is intra-action (Barad 2003), a relational unfolding which defines the properties of subjects and objects, their different modes of being, and thus their constitution. This is an important contribution because it opens up for new possibilities of thinking about modes of being with(in) the material environment.

One such mode of being is the relation of identity consumers establish within their environments. Ferreira and Scaraboto (2016) demonstrate how identities are shaped in processes of object creation, and not only in moments of consumption of the finished object. Our study expands this perspective by suggesting that *things—*both objects and subjects—are never finished, but always becoming through their recursive relational material unfolding (see also Slater, 2014). It follows that consumer identity is not the product of inter-subjective interactions, but the result of repeated patterns of intra-actions between things that temporarily stabilize to form specific subject-environment configurations. Based on this insight, the task of future studies is to understand *how* these configurations gain or lose stability. For instance, how could materialization processes such as described in existing research disrupt the entity of a consuming subject? How do these processes stabilize subjects as composed of different material components? In the context of this paper for in-

stance, how can materialization processes disrupt the imagined purity of the swimmer as a body and restabilize the swimming subject as a combination of bodies, prosthetics and performance-enhancing drugs?

Furthermore, our study suggests that identity is but a particular configuration of a broader process of thingification establishing the relational boundaries between things while assigning them agency. The identified interruptions represent moments in which new possibilities of being come to the fore. While this paper theorizes thingification, much remains to be said about the specific dynamics within and between interruptions. Therefore, we invite future research to identify, among others, the range of possible actors and negotiations involved in interruptions within different context.

REFERENCES

Ahuvia, Aaron (2005), "Beyond the Extended Self: Loved Objects and Consumers' Identity Narratives," *Journal of Consumer Research*, 32 (1), 171-84.

Barad, Karen (2003), "Posthumanist Performativity: Toward an Understanding of How Matter Comes to Matter," *Signs*, 28 (3), 801-31.

--- (2007), *Meeting the Universe Halfway: Quantum Physics and the Entanglement of Matter and Meaning*, Durham, USA: Duke University Press.

Beckett, Antony (2011), "Governing the Consumer: Technologies of Consumption," *Consumption Markets & Culture*, 15 (1), 1-18.

Belk, Russell and Marian Humayun (2018), "When Objects Trump Subjects," in *E - European Advances in Consumer Research Volume 11*, ed. Maggie Geuens, Mario Pandelaere, Michel Tuan Pham and Iris Vermeir, Duluth, MN Association for Consumer Research, 47-50.

Belk, Russell W. (1988), "Possessions and the Extended Self," *Journal of Consumer Research*, 15 (2), 139-68.

Bettany, Shona (2007), "The Material Semiotics of Consumption or Where (and What) Are the Objects in Consumer Culture Theory?," in *Consumer Culture Theory (Research in Consumer Behavior, Vol. 11)*, ed. Russel Belk and John F. Sherry, Bingley: Emerald Group Publishing, 41-56.

Bettany, Shona and Ben Kerrane (2011), "The (Post-Human) Consumer, the (Post-Avian) Chicken and the (Post-Object) Eglu," *European Journal of Marketing*, 45 (11/12), 1746-56.

Borgerson, Janet L (2005), "Materiality, Agency, and the Constitution of Consuming Subjects: Insights for Consumer Research," *Advances in Consumer Research*, 32, 439-43.

--- (2013), "The Flickering Consumer: New Materialities and Consumer Research," *Consumer Culture Theory (Research in Consumer Behavior, Vol. 15)*, 125-44.

Dawney, Leila (2013), "The Interruption: Investigating Subjectivation and Affect," *Environment and Planning D: Society and Space*, 31 (4), 628-44.

Deleuze, Gilles and Felix Guattari (1972), *Capitalisme Et Schizophrénie 1: L'anti-Œdipe*, Paris: Les Éditions de Minuit.

Du Gay, Paul (2004), "Self-Service: Retail, Shopping and Personhood," *Consumption Markets & Culture*, 7 (2), 149-63.

Epp, Amber and Linda Price (2008), "Family Identity: A Framework of Identity Interplay in Consumption Practices," *Journal of Consumer Research*, 35 (1), 50-70.

Ferreira, Marcia Christina and Daiane Scaraboto (2016), ""My Plastic Dreams": Towards an Extended Understanding of Materiality and the Shaping of Consumer Identities," *Journal of Business Research*, 69 (1), 191-207.

Giesler, Markus and Ela Veresiu (2014), "Creating the Responsible Consumer: Moralistic Governance Regimes and Consumer Subjectivity," *Journal of Consumer Research*, 41 (3), 840-57.

Hoffman, Donna L. and Thomas P. Novak (2018), "Consumer and Object Experience in the Internet of Things: An Assemblage Theory Approach," *Journal of Consumer Research*, 44 (6), 1178-204.

Holt, Douglas B. (1998), "Does Cultural Capital Structure American Consumption?," *Journal of Consumer Research*, 25 (1), 1-25.

Jantzen, Christian, Per Østergaard, and Carla M. Sucena Vieira (2006), "Becoming a 'Woman to the Backbone'," *Journal of Consumer Culture*, 6 (2), 177-202.

Karababa, Emınegül and Güliz Ger (2011), "Early Modern Ottoman Coffeehouse Culture and the Formation of the Consumer Subject," *Journal of Consumer Research*, 37 (5), 737-60.

Kates, Steven M (2002), "The Protean Quality of Subcultural Consumption: An Ethnographic Account of Gay Consumers," *Journal of Consumer Research*, 29 (3), 383-99.

Kozinets, Robert V. (2008), "Technology/Ideology: How Ideological Fields Influence Consumers' Technology Narratives," *Journal of Consumer Research*, 34 (6), 865-81.

Mikkonen, Ilona, Handan Vicdan, and Annu Markkula (2013), "What Not to Wear? Oppositional Ideology, Fashion, and Governmentality in Wardrobe Self-Help," *Consumption Markets & Culture*, 17 (3), 254-73.

Moisander, Johanna and Päivi Eriksson (2007), "Corporate Narratives of Information Society: Making up the Mobile Consumer Subject," *Consumption Markets & Culture*, 9 (4), 257-75.

Moisio, Risto, Eric J Arnould, and James W Gentry (2013), "Productive Consumption in the Class-Mediated Construction of Domestic Masculinity: Do-It-Yourself (Diy) Home Improvement in Men's Identity Work," *Journal of Consumer Research*, 40 (2), 298-316.

Moisio, Risto, Eric J. Arnould, and Linda L. Price (2004), "Between Mothers and Markets," *Journal of Consumer Culture*, 4 (3), 361-84.

Ourahmoune, Nacima (2017), "Embodied Transformations and Food Restrictions: The Case of Medicalized Obesity," *Journal of Business Research*, 75, 192-201.

Phillips, Barbara J. and Trina Sego (2011), "The Role of Identity in Disposal: Lessons from Mothers' Disposal of Children's Possessions," *Marketing Theory*, 11 (4), 435-54.

Schouten, John W and James H McAlexander (1995), "Subcultures of Consumption: An Ethnography of the New Bikers," *Journal of Consumer Research*, 22 (1), 43-61.

Shankar, Avi, Richard Elliott, and James A. Fitchett (2009), "Identity, Consumption and Narratives of Socialization," *Marketing Theory*, 9 (1), 75-94.

Slater, Don (2014), "Ambiguous Goods and Nebulous Things," *Journal of Consumer Behaviour*, 13 (2), 99-107.

Yngfalk, Carl (2015), "Bio-Politicizing Consumption: Neo-Liberal Consumerism and Disembodiment in the Food Marketplace," *Consumption Markets & Culture*, 19 (3), 275-95.

Zanette, Maria Carolina and Eliane Pereira Zamith Brito (2018), "Fashionable Subjects and Complicity Resistance: Power, Subjectification, and Bounded Resistance in the Context of Plus-Size Consumers," *Consumption Markets & Culture*, 22 (4), 363-82.

Making Sense of Foreign Markets Rejecting American Brands

Sarah Evans, Smith School of Business, Queens University, Kingston, Canada
Tandy Chalmers Thomas, Smith School of Business, Queens University, Kingston, Canada

INTRODUCTION

"Companies like Facebook have been praised as tools of free speech and political empowerment—aiding, for example, the Arab Spring uprisings that swept the Middle East last year. But the global companies operate under local laws, sometimes in jurisdictions that prevent users from saying things that would be legal to say in the U.S. and many other countries. The result is an ethical challenge for American companies that want to do business in such lucrative international markets without being complicit in efforts to stifle free speech." (Mavin 2012)

The above quote describes the conflict created when American cultural values, spread globally by companies, clash with the values of foreign countries. The spread of cultural values across the globe is ubiquitous (Tomlinson 1999). Since the emergence of the proverbial 'global village,' and amplified by social media, cultural values are shifting from one country to others through increasing travel, global awareness, multinational brands, and global media (Featherstone, Lash, and Robertson 1995). The challenge of exporting a brand is particularly difficult for products or industries that are strongly tied to ideological positions that do not necessarily translate across cultural boundaries (Holt 2002). Social media, for example, was founded on American values of freedom of expression, equality of access to information, and free democracy (Beetham 2004; Loader and Mercea 2011). As access to social media continues to expand globally, the American-born industry is confronted with some foreign countries' opposing values (Morozov 2010). Foreign countries with different cultural values, such as China, India, and Turkey, are demanding social media companies censor and block content that they think questions government power, threatens national security, endangers public safety, or violates moral norms ("A Rebuff to India's Censors" 2015; Alaimo 2016; Peker and Schechner 2015). Notably, these demands are from both governments and consumers, who work to flag content they view as inappropriate (Memarsadeghi and Atri 2014; Peker and Schechner 2015).

Consumer researchers have sought to understand this movement of cultural meanings by examining how the marketplace mediates cultural values permeating into other cultures. This work has articulated how native consumers come to accept and adopt (Üstüner and Holt 2010), adjust (Caldwell 2004; Grinshpun 2014; Ribke 2017), or, often with the support of religious and ideological narratives, reject foreign brands (Izberk-Bilgin 2012; Varman and Belk 2009). A shortcoming of extant research, however, is that it primarily focuses on the response to the brand in the new, foreign, market. This leaves open the question of what impact the rejection of a foreign brand in a new market has on consumers in the brand's home market? While consumer research has explored the narratives assigned to American corporations and industries by foreign cultures, it has not explored what happens when these narratives reverberate back to American culture. In this research, we thus seek to answer the following research question: How do domestic markets make sense of the rejection of their brands in foreign markets?

METHOD

To address our research question, we conducted an analysis of how American media describe foreign countries acceptance (or rejection) of industries founded on American cultural values. The context of this study was Facebook and its operations outside of North America. We chose this context because access to Facebook's services and consumption of its content is founded on American cultural values that may conflict with the values of some international communities across the globe (Helft 2010). A number of international communities have expressed their concern about the social network, have appropriated its services to bolster opposing cultural values, and have taken steps to block the platform from operating within their borders (Lakshmi 2012; Morozov 2010; Muggah and Thompson 2016).

The data in this study consisted of news articles about Facebook published between 2009 and 2019 in the top five American news sources. The search for these articles was conducted using the Factiva database. Of the total number articles published in the 10-year period (N=19,791), a stratified random sample of 600 were chosen reflecting the distribution of the articles over that time. The year 2009 was chosen as the starting date because it was the year Facebook officially became the most popular social networking site in the world (Arthur and Kiss 2010). We chose news media discourse analysis for this study because news media plays a critical role in shaping public discourse by presenting culturally legitimated frameworks for understanding events (Humphreys 2010). The articles were analyzed using grounded theory procedures (Charmaz 2006). This approach allowed us to assess variations in norms, values and symbolic meanings that are expressed in different cultures and the interrelations between them (Holt 1997).

FINDINGS

The analysis revealed that when reporting on foreign markets rejecting Facebook, the media used narratives to make sense of foreign markets' responses. In the sections that follow, we first describe situations where foreign markets reject American values, and then we detail how American media used three narratives to make sense of those rejections.

Foreign Markets' Response

Foreign countries rejected Facebook's American cultural values by publicly denouncing the intentions of the company, its underlying values, and its adherence to North American regulations and societal norms (Chang and Chen 2017; Sieff 2014). For example, the French president called on U.S tech companies saying, "The U.S. model is no longer sustainable because there is no political accountability" (Schechner 2018). Other countries, including Turkey, Iran, Afghanistan, and China for example, criticize the social media industry for exacerbating social issues rather than diminishing them. An Afghan government official publicly stated, "This is indeed against ethics, democracy, patriotism, Islam and national unity" (Sieff 2014). Other countries, like India and Russia, also reject Facebook and its American values by blocking access to the platform claiming its services enable users to post things that directly violate political and cultural norms ("A Rebuff to India's Censors" 2015; Hauslohner 2014).

Domestic Market Reaction

American media made sense of foreign markets' rejection of Facebook using three narratives (See Figure 1). These narratives conceptualize the conflict by pulling elements from areas of moral reasoning, multiculturalism, and reflective thinking. Each of these

Foreign Country's Response   Perceived Status of Home Countries Values vs. Foreign Countries   Home Country's Reaction
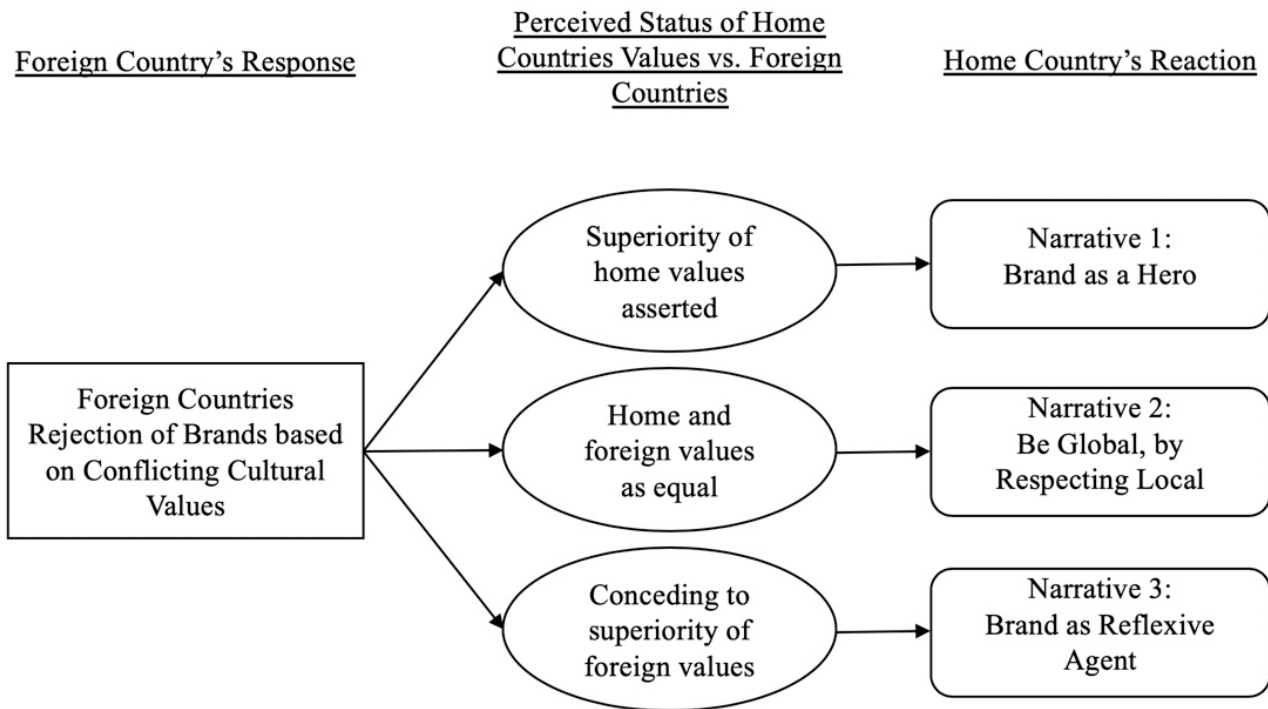
Figure 1: Findings Overview

narratives also correspond to an assumption about the status of American cultural values in relation to the values of other countries. Together, these narratives make up the combination of stories American media told when reporting on the criticism Facebook was receiving from the international community.

Narrative 1: Social Media as an American Hero. The first narrative used to make sense of foreign markets rejection of Facebook relies on the classic trope of framing Facebook as a protagonist/hero and the foreign market as the antagonist/villain (Giesler 2008; Luedicke, Thompson, and Giesler 2010). American media made sense of Facebook being vilified by defending the social media industry and asserting that American values of freedom of expression and equal access to information 'save' consumers from the oppression and abuse of foreign corrupt governments. One journalist wrote, "In the end, it's the frightened reaction of states themselves that turns social networks into such heroes and bogeymen" (Tosser 2011). Similarly, another article framed Facebook as the force that helps defeat authoritarian regimes: "We've all heard how social networks such as Facebook help to spread democracy around the world by mobilizing the masses and making it easier to topple dictators" (Moyo and Onishi 2016).

By asserting a protagonist role, this narrative implies that American's cultural values are superior to those of other countries. Like Thompson and Arsel's (2004) use of the Trojan Horse metaphor, Facebook is described as a tool that enables activists to question their countries' societal norms and keep their governments accountable; thus, reflecting a more authentic, democratic, and colonized society. This was particularly true of less developed countries where citizens are characterized as duped, unaware, uneducated, or simply lacking civic engagement (Izberk-Bilgin 2012; Murray and Ozanne 1991). By asserting a protagonist or hero role, the narratives assumed the superiority of American's values inherent in the service over those of other countries.

Narrative 2: Be Global, by Respecting Local. The second narrative used by American media framed foreign protests against

Facebook as worthy of representation. In this narrative, the solution to the conflict was for Facebook to accommodate the diversity of values attached to the company in other cultures. Facebook and America avoid confrontation by relinquishing power over the company's values so that foreign countries can make content decisions for themselves. For example, one article discusses Facebook's new project of creating censoring software to be used by third parties in foreign countries saying, "The project illustrates the extent to which Facebook may be willing to compromise one of its core mission statements, 'to make the world more open and connected'" (Isaac 2016). The American media shows empathy towards the industries' complex situation, describing the company's accommodation of other cultures as something they must do: "These challenges become even more complex in a global context in which moderators must account for different languages and slang; for different historical, cultural and political divides; and for different power structures — all of which might color the social meaning of the speech" (Klonick and Kadri 2018). The CEO of Facebook supported this position: "I don't think that we, sitting here in California, are best positioned to know what the norms in communities around the world should be. At some point, you just need a more dynamic system where people can just express that themselves" (Isaac 2017).

With this narrative, the assumption is that foreign cultural norms and values are equal to American cultural norms and values. In this sense, American cultural values are not assumed to be superior, as they were in the 'Social Media as Hero' narrative. In this narrative, American media does not place cultural values on a hierarchy of least to most legitimate. Instead, they argue that the way for Facebook to be a global company is to respect and accommodate all cultures equally.

Narrative 3: Social Media as a Reflexive Agent. The third narrative used in American media was framing the social media industry as a reflexive entity willing to change for the better. Rejection was treated as a sign that Facebook should turn inward and examine whether its American values and practices were serving the great-

er good. One article compares the values of Facebook in America to those in Europe, justifying the American version's need to improve on things such as providing universal access to information and building social systems that promote constructive conversations (Pegoraro 2018). On these issues, a European official states, "The U. S. government may not lead on those issues, but the European Union seems prepared to." (Pegoraro 2018). Quotes like these demonstrate American media's receptivity to the success of different cultural values attached to Facebook. Articles also report the decreasing support for Facebook's original values within America, acknowledging how, for example, freedom of expression increases opportunities for the spread of misinformation. Consider this quote about the conflict between Facebook's policy allowing ads containing misinformation and consumers' demands for censorship of these ads: "We should know better than to demand of Facebook's leaders that they do what is not in the best interests of the company. Instead, citizens should demand effective legislation that can curb Facebook's power" (Vaidhyanathan 2019).

This narrative in American media makes sense of foreign countries rejection of Facebook's inherent American values by seeing it as opportunity for self-reflection and improvement for the company and the country. Like the second narrative, it does not assume American's values are superior to those of other countries; however, it does not assume they are equal either. Rather, America's interpretations of the industry are seen, in some ways, to be inferior to the interpretations in foreign countries. This narrative places Facebook, and its American values, beneath those of other cultures by acknowledging they may not always be for the greater good.

DISCUSSION

The goal of this study was to explore how American media makes sense of foreign countries rejecting brands based on American cultural values. We show that the media utilized three narratives that represent different ways of interpreting the disapproval which contained different assumptions about the relative status of American versus foreign cultural values.

The 'Social Media as Hero' narrative reflects previous research showing how consumer groups reject the antagonist role by flipping the narrative and asserting a protagonist role (Giesler 2008; Luedicke et al. 2010). We extend this work by showing how this narrative flip is used to make sense of conflicts between consumer groups across countries, and not just within them. Moreover, this narrative bolsters the view that American's values are superior. The 'Be Global, By Respecting Local' narrative adds to previous research showing how vilified consumer groups manage this perception (Carducci 2006; Giesler 2012; Kozinets and Handelman 2004; Ribke 2017). While prior work shows that vilified consumers try to avoid explicit confrontation with those in disagreement (Thompson and Arsel 2004b), we show that media uses a narrative that detaches the brand from the conflict by accommodating for all cultural values (Veresiu and Giesler 2018). The 'Social Media as Reflexive Agent' narrative argues that the solution to foreign criticism was for social media companies to turn inward and reflect on whether and how they can use these responses as constructive criticism to improve their practices. This finding expands previous work on what it means for consumer groups to renounce their support for controversial values in the marketplace (Thompson and Arsel 2004a).

At the theoretical level, these narratives demonstrate a range of perceptions about the status of American cultural values in relation to foreign cultural values. This range changes how we think about the effects of multiculturalism at the global level. In this study, we show how assumptions of American culture's inferiority, or superiority, to other cultures in the marketplace stems from American culture itself and the narratives perpetuated by media. We also show how American's perceptions of their inferiority spurs narratives about the need to change within their own market. The 'glocalizing' of Facebook in foreign markets thus not only changed the meaning of the company within the boundaries of foreign markets (Caldwell 2004; Thompson and Arsel 2004b), but it encouraged the exploration of changes to its values in its home market. This expands our understanding of what it means for a brand to be truly multicultural at the global level. The changes in values global brands undergo in foreign markets do not happen in isolation. Global brands are receptive to the reverberation of those changes; thus, encouraging them and their domestic market to reconsider their original values in hopes of changing them for the better.

This research has numerous implications for market practitioners, policy makers, and individual consumers. This research will assist market practitioners, in the technology and social media industries, with adopting a broader view of their roles across countries and cultures. This research will assist public policy makers with determining the right level of regulation to keep social media companies, like Facebook, accountable when they fail to uphold cultural values. This new area of regulation is essential to setting a foundation for the future of the global technology industry.

REFERENCES

"A Rebuff to India's Censors" (2015), *The New York Times*, March 26, A22.

Alaimo, Kara (2016), "How a Censored Version of Facebook Could Destabilize China's Government," *The Washington Post*, December 28.

Arthur, Charles and Jemima Kiss (2010), "No Facebook Reaches 500 Million Users," *The Guardian*, July 21.

Beetham, David (2004), "The Quality of Democracy: Freedom as the Foundation," *Journal of Democracy*, 15(4), 61–75.

Caldwell, Melissa L. (2004), "Domesticating the French Fry: McDonald's and Consumerism in Moscow," *Journal of Consumer Culture*, 4(1), 5–26.

Carducci, Vince (2006), "Culture Jamming: A Sociological Perspective," *Journal of Consumer Culture*, 6(1), 116–38.

Chang, Chun-Tuan and Pei-Chi Chen (2017), "Cause-Related Marketing Ads in the Eye Tracker: It Depends on How You Present, Who Sees the Ad, and What You Promote.," *International Journal of Advertising*, 36(2), 336–55.

Charmaz, Kathy (2006), *Constructing Grounded Theory: A Practical Guide through Qualitative Analysis*, 10 Book.

Featherstone, Mike, Scott Lash, and Roland Robertson (1995), *Global Modernities*, Sage.

Giesler, Markus (2008), "Conflict and Compromise: Drama in Marketplace Evolution," *Journal of Consumer Research*, 34(6), 739–53.

——— (2012), "How Doppelgänger Brand Images Influence the Market Creation Process: Longitudinal Insights from the Rise of Botox Cosmetic," *Journal of Marketing*, 76(6), 55–68.

Grinshpun, Helena (2014), "Deconstructing a Global Commodity: Coffee, Culture, and Consumption in Japan," *Journal of Consumer Culture*, 14(3), 343–64.

Hauslohner, Abigail (2014), "Backlash to Russian's Threat to Ban Twitter," *The Washingston Post2*, May 17, A08.

Helft, Miguel (2010), "Facebook Makes Headway Around the World," *The New York Times*, July 7, B1.

Holt, Douglas B. (1997), "Poststructuralist Lifestyle Analysis: Conceptualizing the Social Patterning of Consumption in Postmodernity," *Journal of Consumer Research*, 23(4), 326.

——— (2002), "Why Do Brands Cause Trouble? A Dialectical Theory of Consumer Culture and Branding," *Journal of Consumer Research*, 70–90.

Humphreys, Ashlee (2010), "Semiotic Structure and the Legitimation of Consumption Practices: The Case of Casino Gambling," *Journal of Consumer Research*, 37(3), 490–510.

Isaac, Mike (2017), "Facebook's Zuckerberg, Bucking Tide, Takes Public Stand Against Isolationism," *The New York Times*, February 16.

——— (2016), "For Facebook, Censorship Tool Could Reopen a Door to China," *The New York Times*, November 23.

Izberk-Bilgin, Elif (2012), "Infidel Brands: Unveiling Alternative Meanings of Global Brands at the Nexus of Globalization, Consumer Culture, and Islamism," *Journal of Consumer Research*, 39(4), 663–87.

Klonick, Kate and Thomas Kadri (2018), "How to Make Facebook's 'Supreme Court' Work," *The New York Times*, November 17.

Kozinets, Robert V. and Jay M. Handelman (2004), "Adversaries of Consumption: Consumer Movements, Activism, and Ideology," *Journal of Consumer Research*, 31(3), 691–704.

Lakshmi, Rama (2012), "India Blocks More than 250 Web Sites for Inciting Hate, Panic; India Blocked over 250 Web Sites for Fanning Hate, Highlighting, Once Again, the Government's Uneasy Relationship with Internet Censorship," *The Washingston Post*, August 20.

Loader, Brian B and Dan Mercea (2011), "Networking Democracy? Social Media Innovations and Participatory Politics," *Information, Communication and Society*, 14(6), 757–69.

Luedicke, Marius K., Craig J. Thompson, and Markus Giesler (2010), "Consumer Identity Work as Moral Protagonism: How Myth and Ideology Animate a Brand-Mediated Moral Conflict," *Journal of Consumer Research*, 36(6), 1016–32.

Mavin, Duncan (2012), "Felda vs Facebook," *The Wall Street Journal*, July 2.

Memarsadeghi, Mariam and Akbar Atri (2014), "Facebook, Please Don't Let the Mullahs Troll Us," *The Wall Street Journal*, November 25, A13.

Morozov, Evgeny (2010), "Rise of the Online Autocrats --- It Turns out That the Enemies of Free Expression Are Adept at the Internet, Too," *The Wall Street Journal*, October 2, C3.

Moyo, Jefferey and Norimitsu Onishi (2016), "Robert Mugabe Seizes on the Latest Political Threat to His Zimbabwe: WhatsApp," *The New York Times*, October 2, A10.

Muggah, Robert and Nathan B. Thompson (2016), "Brazil's Digital Backlash," *The New York Times*, January 12.

Murray, Jeff B. and Julie L. Ozanne (1991), "The Critical Imagination: Emancipatory Interests in Consumer Research," *Journal of Consumer Research*, 18(2), 129.

Pegoraro, Rob (2018), "Should Social Media Be Regulated? Support Seen at Web Summit for Protecting User Data," *USA Today*, November 12.

Peker, Emre and Sam Schechner (2015), "Turkey Briefly Blocks YouTube, Twitter Access and Threatens Google Ban; Government Objected to Sites Using Content on Deadly Hostage Situation Last Week," *The Wall Street Journal*, April 6, www.wsj.com.

Ribke, Nahuel (2017), "Media Imperialism beyond the Anglo-Saxon Axis, or Negotiated Hybridity? Neo-Orientalist Telenovelas and Transnational Business in Brazilian Television," *Journal of Consumer Culture*, 17(3), 562–78.

Schechner, Same (2018), "Macron Urges Silicon Valley to Comply --- French President Asks Tech Firms to Follow Europe's Regulations on Taxes and Privacy," *The Wall Street Journal*, May 25, B4.

Sieff, Kevin (2014), "How Facebook Is Seen as a Threat to Afghan Unity," *The Washington Post*, June 30.

Thompson, Craig J. and Zeynep Arsel (2004a), "The Starbucks Brandscape and Consumers' (Anticorporate) Experiences of Glocalization," *Journal of Consumer Research*, 31(3), 631–42.

——— (2004b), "The Starbucks Brandscape and Consumers' (Anticorporate) Experiences of Glocalization," *Journal of Consumer Research*, 31(3), 631–42,

Tomlinson, John (1999), *Globalization and Culture*, University of Chicago Press.

Tosser, Ivor (2011), "Grasping at Straws, Mr. Cameron Joins the Company of Autocrats," *The Globe and Mail*, August 12, A9.

Üstüner, Tuba and Douglas B. Holt (2010), "Toward a Theory of Status Consumption in Less Industrialized Countries: Table 1," *Journal of Consumer Research*, 37(1), 37–56.

Vaidhyanathan, Siva (2019), "The Real Reason Facebook Won't Fact-Check Political Ads," *The New York Times*, November 5.

Varman, Rohit and Russell W. Belk (2009), "Nationalism and Ideology in an Anticonsumption Movement," *Journal of Consumer Research*, 36(4), 686–700.

Veresiu, Ela and Markus Giesler (2018), "Beyond Acculturation: Multiculturalism and the Institutional Shaping of an Ethnic Consumer Subject," *Journal of Consumer Research*, 45.

Healthy Mind on Sale: Conflicts in the Legitimation Process of Social Media Influencers

Daniela Ferreira, Federal University of Rio de Janeiro, Brazil
Paula Chimenti, COPPEAD Institute of Administration - Federal University of Rio de Janeiro, Brazil

INTRODUCTION

Social media influencers (SMIs) can be defined as individuals, some of whom previously anonymous to the general public, who manage to expand their voice and their influence on other people—a phenomenon McQuarrie, Miller, and Phillips (2013: 136) call the "megaphone effect". Judgments related to SMIs are controversial. On the one hand, they are considered a more convenient source of information by their followers and more reliable than traditional marketing campaigns (Brooks and Piskovski 2018; Evans et al. 2017), especially when they craft authenticity for themselves (Audrezet, Kerviler, and Moulard 2018). On the other hand, studies have suggested that following influencers in social media may generate or increase symptoms of depression and anxiety (Lup, Trub, and Rosenthal 2015). Among so many options of SMIs to choose to follow and trust, legitimacy becomes a key aspect.

Legitimacy is a collective construction (Johnson, Dowd, and Ridgeway 2006) of social reality and refers to the "perception or assumption that the actions of an entity are desirable, proper, or appropriate within some socially constructed system of norms, values, beliefs, and definitions (Suchman 1995: 574)". To fully understand the legitimacy process, it is important to consider the concept of institutional logic, which is a broad set of beliefs that defines the boundaries of a field, acting as a guide for practical actions (Thornton, Ocasio, and Lounsbury 2012). Institutional theory (Meyer and Rowan 1977) points that consumer perceptions and judgments about an entity influences its legitimacy (Hakala, Niemi, and Kohtamaki 2017). It is worth mentioning that contrasting institutional logics within the legitimation process of an entity may harm its legitimacy (Rao, Monin, and Durand 2003).

In this study we adopt Suchman's (1995) conceptualization of legitimacy with three dimensions: pragmatic, moral, and cognitive. Pragmatic legitimacy is related to the benefits perceived by the public, usually involving direct exchanges between the legitimized entity and its public. Moral legitimacy is based on the public evaluations about whether the entity is in line with specific social norms and values. Cognitive legitimacy depends upon actions that simplify and help the public to understand the entity and even 'take for granted' (Humphreys 2010a) its existence. High levels of pragmatic, moral, and/or cognitive legitimacy may be fundamental for the success of an entity, while lack of legitimacy can lead to less social support (Scott 2014). It is important to notice that legitimacy is essentially a social evaluation made by others, who may generate positive or negative effects on one's legitimacy (Bitektine and Haack 2015). According to Castelló, Etter, and Nielsen (2016), prior research tends to neglect the impact of power relations between actors involved in the legitimacy process.

This paper extends research on legitimacy by addressing the tensions involved in constructing legitimacy for the SMIs. Our research context is the social media platform Instagram, specifically profiles focused on mental health content–that is, psychiatrists who have become influencers. The choice of mental health content was due to the importance of this subject for social well-being. According to the World Health Organization (WHO 2019), mental disorders affect 700 million people worldwide, representing 13% of all existing diseases.

Social media has made it possible for professionals from different areas to establish direct and interactive contact with their audiences. However, this brings issues to be considered, especially involving a delicate subject such as mental health, as it may blur the boundaries of the relationship between psychiatrist and patient. There is a considerable risk of dangers for violating patient privacy and spreading information that could negatively influence the therapeutic relationship (Banerjee and Bespalova 2019). Since mental disorders can lead to severe personal and social consequences, there seems to be an important ethical issue regarding disclosing misleading medical information or even commercializing courses and treatments through profiles on social media platforms. According to the American Psychiatric Association (APA 2017: 11), psychiatrists should be aware of the "potential challenges to sound and ethical practice" in using social media for providing patient care.

Thus, considering the social media influencer psychiatrist (hereafter referred to as SMIP), we seek to answer the following questions: 1. Who are the actors involved in the construction of legitimacy for him/her; 2. What roles does each group of actors play?; 3. What are the tensions that permeate the process of constructing and maintaining this legitimacy? We believe that a contextualized study of the tensions involved in the construction of legitimacy of SMIP can provide a richer understanding about how legitimacy unfolds in social media.

CONCEPTUAL FRAMEWORK

This study uses Institutional Theory (Meyer and Rowan 1977) as a theoretical lens, especially the concept of legitimacy (Scott 1995, Suchman 1995). Institutional Theory considers that society exists in a context of institutional logics, which promote stability and meaning for people's behavior (Scott 2014). Institutions may be defined as shared systems of meanings comprised in discourses (Phillips, Lawrence, and Hardy 2004).

As seen, legitimacy is a fundamental concept in Institutional Theory, as it is by gaining legitimacy that institutions are strengthened and perpetuated in society. According to Hybels (1995: 241), "where legitimacy is the attitude of people toward a persistent aspect of society, (…) an institution is that aspect itself." Although legitimacy can be an asset that belongs to a certain social entity–an organization, brand or individual, it is ultimately a social evaluation made by others (Bitektine and Haack 2015). Suchman (1995: 574) highlights the collective essence of legitimacy, arguing that "when one says that a certain pattern of behavior possesses legitimacy, one asserts that some group of observers, as a whole, accepts or supports what those observers perceive to be the behavioral pattern, as a whole."

Studies on legitimacy have long been conducted in the field of general management and have typically focused on how a firm builds legitimacy (Suchman 1995). A significant development of the issue occurred in the mid-1990s, mainly with the works of Scott (1995) and Suchman (1995), and interest in the topic has increasingly grown in the marketing field. Previous studies within this field have investigated the legitimation process of a diverse array of entities or "social objects" (Johnson et al. 2006: 19), such as markets (Giesler 2012; Press and Arnold 2011; Humphreys 2010a, 2010b; Humphreys and Latour 2013), consumption practices (Barnhart and Huff 2018; Sandikci and Ger 2010), brands and brand communities (Hakala et al. 2017; Hu et al. 2018; Kates 2004), products (Wilner and Huff 2017), marginalized consumers (Coskuner-Balli and Thompson 2013; Scaraboto and Fischer 2013), marketing practices

(Ardley and Quinn 2014; Lillqvist, Moisander, and Firat 2017), and companies (Handelman and Arnold 1999; Humphreys and Thompson 2014). Overall, scholars have agreed that communication and media are fundamental to building legitimacy (Bansal and Clelland 2004; Bitektine 2011), yet there is still a lack of knowledge about how the legitimation process occurs on digital platforms (Hakala et al. 2017; Humphreys and Latour 2013) despite the omnipresence of social media in peoples' lives.

Notable exceptions are the studies of Scaraboto and Fischer (2013), Hakala et al. (2017) and Lillqvist et al. (2017). Scaraboto and Fischer's (2013) qualitative study of plus-sized consumers of fashion reveals the process through which this stigmatized group of consumers build legitimacy. The authors followed the online interactions of bloggers and their audiences and their results showed that plus-sized consumer mobilization occurred through identifying with other consumers and institutional actors who have more agency in the field and established new institutional logics. Hakala et al. (2017) investigated how online community practices contribute to building brand legitimacy. Using netnography and discourse analysis, the authors concluded that the legitimization practices in an online community embraces the perceptions, judgements, and actions of the consumers involved. These practices, associated with the actions of the brand's owner and prior collective legitimacy judgements (within the online and offline brand community), shape consumer perceptions and judgements regarding the brand. Finally, Lillqvist et al. (2017) studied how consumers challenge the marketer's legitimacy within an online community website. Through qualitative research, the authors concluded that consumers confer legitimacy based on socially shared legitimacy criteria and challenge the marketer's legitimacy when its activities are in conflict with those criteria.

Despite the relevant contributions these scholars have made toward understanding the legitimation process within the social media context, scant attention has been given to the tensions and conflicts between the different actors involved. We argue that, as social media is an arena that embraces so many different opinions and conflicts (Sood, Churchill, and Antin 2012), enabling "harsh disputes, incivility, and sarcasm" that "polarize opinions and beliefs (Kozinets, Gambetti, and Biraghi 2018: 414)", it is fundamental to consider the tensions in building legitimacy in this context. Furthermore, prior research on legitimacy has not examined the SMI phenomena. Studies on SMIs usually focus on how their personal endorsement of products and brands impacts consumers attitude and shopping intentions (e.g. Schouten, Janssen, and Verspaget 2020, McCormick 2016, Tomas, Meschgrahw, and Alcantara 2012) and they lack accounts of the perception and judgment of consumers about the legitimacy of the SMI himself/herself. Given the increasing relevance of SMIs in the lives of consumers (Evans et al. 2017), this study intends to bring new nuances to understanding legitimacy within the social media context.

METHOD

To address the research questions, we conducted an 18-month netnography (Kozinets 2019) carrying a structured observation of three psychiatrist Instagram profiles and focused search and download of data from September 2018 to February 2020. We followed online interactions by reading and archiving posts, comments, videos ('stories' and 'lives'), and kept notes in immersion journals recording our ongoing investigation and theory development. The profiles were chosen based on popularity (from 350,000 to one million followers on Instagram) and frequency (at least one post and/or video per day). Around 2,100 posts, 17,100 comments, and 80 hours of video were analyzed.

The collected data was subjected to a content analysis for coding and condensing the material, and for identifying patterns. Following Bardin's (2013) recommendation, content analysis was carried out in three stages, namely: 1. Pre-analysis, which involved an initial reading of the data in order to systematize the main ideas and excerpts contained in the material while identifying the actors involved in the legitimation process; 2. Exploration, when the raw data was coded and subsequently the coded elements were classified. The definition of the analysis categories was also based on the theoretical framework of the research, moving from data to theory and from theory to data; 3. Inference and interpretation of the results, aiming at a reflective and critical discussion of the material based on hermeneutic interpretation (Thompson 1997) with interactive movements between the intra and intertextual cycles.

Regarding research ethics, we followed Kozinets' (2019) most recent recommendations. All data was collected from profiles that define their privacy setting as public. When presenting the data collected, some original words were modified without, however, changing the meaning of the sentences. In addition, names and identification details of the SMIPs (therefore referred as SMIP1, SMIP2 and SMIP3) and their followers were kept confidential. These procedures seek to ensure that quotes and people cannot be easily tracked.

DISCUSSION

Drawn on the premise that the legitimation process is influenced by the legitimizing entity itself, but is ultimately originated by the audience (Bitektine and Haack 2015), we first identified the main activities of the SMIPs in the social media platform Instagram, namely: 1. to provide free content through posts and videos about mental health issues; 2. to perform thematic live sessions on subjects demanded by their followers; 3. to sell products, such as face-to-face courses, handouts with promises of healing, participation in private groups on WhatsApp, among others, always emphasizing the exclusivity of these products; 4. to interact with comments made on their posts, encouraging followers to engage by asking questions and proposing controversial topics to be discussed; 5. to repost complimenting posts/videos from prominent followers who have verified accounts.

Most of the free content made available by SMIPs are on how to overcome mental health disorders in the short-term with easy to understand tips to be adopted on a daily basis. Often presented as a call to action, expressions like "take a cold shower in the morning" or "give alms to beggars everyday" are highlighted by SMIPs, either in post using capital letters or through an increase in the tone of voice in the videos. SMIPs, based on a utilitarian vision, act as mentors in the cluttered information context of social media. In this way, complex mental health issues, such as controlling depression, are presented in a simplistic way, often packaged in online classes:

> In my online class on 'Depression and Lack of Energy' you will learn how to relieve depression with just proper food and supplements. Antidepressants are not always the best option. Medications have undesirable side effects in the long run. In my class, there will be tests and practical exercises to guide you in having a better and more productive life and to avoid wasting time and unnecessary efforts. It is done by someone who is an expert: Psychiatrist graduated from [University's name] and PhD in Psychiatry from [University's name] (SMIP2).

> Cold bath is one of the most expressive medicines in the world. It brings countless physical benefits: it is anti-inflammatory, increases testosterone, strengthens immunity... But the mental

benefits are even greater: resilience, courage, pain control, self-confidence. Why do I say this? Because everything I say here has been previously tested and can be reproduced by anyone (SMIP1).

We can see three legitimacy strategies in this example, which are recurrent in other SMIPs posts. First, there is a comparison between what is being offered in the course and traditional treatments, highlighting how much simpler and more practical the course is. This strengthens SMIP's cognitive legitimacy by helping the public to clearly understand what they offer. It also enhances practical legitimacy, as it clarifies the benefits that can be achieved through the course and gives a sense of pragmatism. Finally, there is the mention of academic titles, as a way of reinforcing SMPI's moral legitimacy.

Whether in courses or in the free content offered, SMIPs use distinct communication styles to affect people's perception of legitimacy (Handelman and Arnold 1999), adopting an aggressive, technical, or affectionate discourse whenever is convenient. Many times, aid is coated with aggressiveness as a way of demonstrating intellectual superiority: "You are lazy, get up from the chair and do something useful (SMIP1)."; "Do not assume a mediocre life like yours before doing what I am going to teach you (SMIP3)." Other times, there seems to be an effort to express humility and proximity with the followers: "Thank you for helping me to form this strong community, thank you for all the love you give me. I don't deserve it, but I appreciate it (SMIP1)." These discourses act as a rhetorical and legitimating strategy to preserve the SMIP's influence, as Ardley and Quinn (2014) found in the marketers' discourse they analyzed.

Legitimation Process: Defenders and Critics

Since legitimacy is a collective construction (Johnson, Dowd, and Ridgeway 2006) where there are interactions between various groups of participants (Lawrence and Phillips 2004), to fully understand the legitimacy process of SMPIs we've identified the key actors involved. We separated them in two groups: the 'defenders' and the 'critics' and focused on the content they produce based on the three dimensions of legitimacy postulated by Suchman (1995).

Defenders are consumers of the content produced by the SMIPs and advocate them with testimonies, often personal, about the impact of the SMIPs on their lives:

I tried to commit suicide, but then I started to follow your profile, bought your handout, and my life changed... just like that! Why bother going to a therapist when I can learn from you how to overcome my depression?

We divided defenders into three categories: ordinary followers, face-to-face followers (who have attended an in-person course given by the SMIP), and prominent social media influencer followers. It seems to be a hierarchical line between these groups, the latter being the most valued one, followed by the face-to-face group of followers. In this sense, some actors have more power than others in conferring legitimacy (Deephouse 1996; Meyer and Scott 1992). SMIPs often repost complimenting posts/videos about their courses and their content in general from prominent followers who have verified accounts. Face-to-face followers are valued as people closer to SMIP and seek to express their prestige on comments: "I feel so lucky that I had the opportunity to attend his in-person course. The contact with him really touches our heart! When you are there, seeing him face-to-face, his words have much more impact." These two groups–prominent SMI followers and face-to-face followers–seem to act as social reference groups that contribute to strengthen the

SMIP's legitimacy, facilitating the consumption of the SMIPs content by the defenders in general (Hakala et al. 2017).

The critics are the ones who refute defenders' arguments and are divided into three categories: offenders, empathetic, and rule advocates. Offenders often use aggressive arguments related to the SMIPs character and ethics: "I keep asking myself how come this guy attended a medical school and at the end turned out to be THIS. He is an incapable professional, and that's why he needs social media to earn money." The group of empathetic, although disqualifying the SMIPs, show concern for defenders, sometimes assuming a patronizing posture towards the latter:

What really concerns me when I see so many people following a guy like him is realizing the lack of opinion and self-esteem of these people. They end up using this guy as a pillar for something in their lives, what shows how lost they are.

Finally, advocates of rules resort to existing rules, norms and laws, sometimes even commenting that they have reported the SMIPs to their professional council and/or to the social media platform management.

Both defenders and critics play an active role in the legitimation process of the SMIP (Humphreys and Latour 2013). The dominant strategy of defenders is pragmatic legitimacy, and metaphors such as "lighting", "rebirth", and "rescue from the dark" are often used. On their comments, the benefits originated from following the SMIP is often emphasized:

I took a gun and left home determined to kill a guy, but then your words came to my head and I gave up and went home. You've changed my life. I saved my marriage and now I live as a responsible person.

Moral legitimacy is also enhanced by defenders. Drawn on institutions such as universities, science and professional associations, which are often already legitimized within society, defenders refute criticisms by emphasizing the authority of the SMPI on mental health issues:

He is a REAL doctor, member of the [professional association], he has a profound knowledge in Psychiatry, unlike you. He doesn't post his own truth; he posts the truth from published scientific research on mental disorders. Numbers are not a questionable truth.

Critics often use arguments based on cognitive legitimacy to delegitimize SMIPs: "It makes no sense to call these people [followers of SMIPs] into reality, as this is a cult of personality. The followers are mainly fragile and vulnerable and adhere to this cult." Critics in the group of advocates of the rules also use arguments based on moral legitimacy. Like the defenders, but in the opposite way, they resort to institutions, such as medical associations, to question the validity of SMIPs practices. They also threaten to denounce SMIPs, accusing them of "illegal practice of medicine", as one of the critics posted: "Reporting this profile to Instagram is important because he [SMIP] has no ethics and does not act as doctors should act."

Defenders can be aggressive and refractory to critics, not only to reinforce the SMIP legitimacy, but also because, by doing that, they are also seeking to legitimize their own consumption practices (Humphreys 2010a, 2010b), which critics seem to despise:

You have an army that wakes up daily ready to fight and defend you, doc! What you lead here is something that is changing the

world, our world, and I am so grateful to be part of it. If you [critics] have nothing nice to say, you should as well shut up. Don't come to this profile to say these stupid things, you don't know anything, you are a nullity, your life is worthless.

SMIPs seek to reinforce their legitimacy by legitimizing the defenders ("Together we are stronger, a great big family") and diminishing the critics, often attacking them directly and not their arguments. For instance, one of the SMIPs of our study, when asked by a follower what he thought of people who thinks differently from him, replied: "I don't know, I don't care, they [critics] are stupid, stingy and uninformed, they don't study at all and they don't know people who are making history. Those are irrelevant opinions. (SMIP1)"

Our analysis reveals that two institutional logics are at play in this context. Defenders judge that SMIP's activities are embedded in a professional logic related to expertise, competence, and responsibility, while critics judge that SMIPs activities are embedded in a market logic related to maximizing their own benefit. One of the defenders, for example, mentioned that the SMIP he follows "has more wisdom than all the teachers in my University combined." Other reinforced that the SMIP "could be earning a lot of money but, instead, is giving all the knowledge he has acquired in his career in order to help changing people's life for free." Critics, in turn, point out that the main objective of the SMIPs is to earn money out of their followers, as one of the critics stated: "this guy [SMIP] is dishonest and even dangerous. He just wants to earn money from foolish individuals, he is a shame for his profession. I wouldn't even call him a professional." SMIPs seem to alternate their discourse between the two logics, sometimes stating that they are not there for money, but "to make a difference in people's lives", while other times making comments similar to an advertisement ("We have few openings for my face-to-face course. Don't miss this opportunity and sign up now!").

Tension and Network Effect

These contrasting institutional logics (Rao, Monin, and Durand 2003) within the legitimation process lead to tension, that tends to generate a network effect, which describe the network value increase or decrease to any given user due to the number of other users with whom they can interact (Eisenmann, 2007). This effect, in turn, increases the impacts of defenders and critics in the legitimation process, since it amplifies their voices within the social media environment, creating a buzz that drives participation. For instance, posts where critics make comments have far more engagement than others. Statements from critics also tend to go beyond the SMIP's profile and can be found in many other profiles where they create a tension of contrary arguments.

Through our findings we construct a proposed model to help understand the legitimation process of SMI (Figure 1). The judgments and actions present in the model are examples that can be adapted to different types of SMIs.

CONCLUSIONS

Our study makes two contributions that go beyond prior research. First, by better understanding the process through which SMIs acquire legitimacy, we can understand how the tension provoked by competing logics can enhance legitimacy sources' voices, whether they are positive or negative. As seen, previous research tended to focus on judgments and actions pro-legitimation, and the existence of strategies of delegitimating and logic tensions between actors have been little explored. Second, we propose that network effects amplify the SMIs reach and influence and that both critics and defenders contribute to these effects, therefore actively influencing the legitimation process.
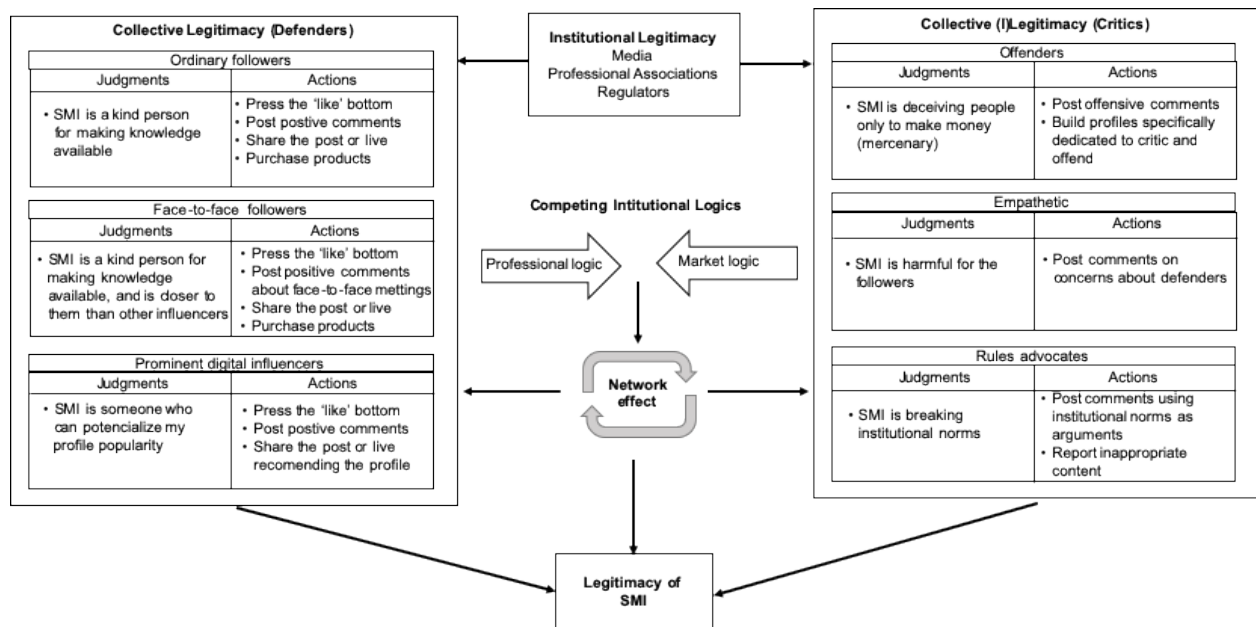
Figure 1: The Legitimation Process of SMI

REFERENCES

American Psychiatric Association (2017), "APA Commentary on Ethics in Practice," (accessed December 2019), [available at https://www.psychiatry.org/psychiatrists/practice/ethics].

Ardley, B.C. and L. Quinn (2014), "Practitioner Accounts and Knowledge Production: An Analysis of Three Marketing Discourses," *Marketing Theory*, 14(1), 97–118.

Audrezet, A., G. de Kerviler, and J. G. Moulard (2018), "Authenticity under threat: When social media influencers need to go beyond self-presentation," *Journal of Business Research*, in press.

Banerjee, D and N. Bespalova (2019), "Social media and psychiatry: challenges and opportunities." Presented at: the American Psychiatric Association Annual Meeting; May 18, 2019; San Francisco, CA.

Bansal, P. and I. Clelland (2004), "Talking Trash: Legitimacy, Impression Management, and Unsystematic Risk in the Context of the Natural Environment," *The Academy of Management Journal*, 47(1), 93–103.

Bardin, L. (2013), *Content Analysis*, 3. ed, Lisboa: Edicoes.

Barnhart, M. and A. D. Huff (2018), "Negotiating the Legitimacy of an American Icon: Myth and the U.S. Gun Market," in *Advances in Consumer Research*, 46, ed. Andrew Gershoff, Robert Kozinets, and Tiffany White, Duluth, MN: Association for Consumer Research, 335–36.

Bitektine, A. (2011), "Toward a Theory of Social Judgments of Organizations: The Case of Legitimacy, Reputation, and Status," *Academy of Management Review*, 36(1), 151–79.

Bitektine, A. and P. Haack (2015), "The 'macro' and the 'micro' of Legitimacy: Toward a Multilevel Theory of the Legitimacy Process," *Academy of Management Review*, 40(1), 49–75.

Brooks, G. and M. Piskorski (2018), "The Trusted Influencer: How They Do It and How Brands Can Benefit" in *Advances in Consumer Research Volume*, 46, ed. Andrew Gershoff, Robert Kozinets, and Tiffany White, Duluth, MN: Association for Consumer Research, 489–90.

Castelló, I., M. Etter, and F. Å. Nielsen (2016), "Strategies of legitimacy through social media: The networked strategy," *Journal of Management Studies*, 53, 402–32.

Coskuner-Balli, G. and C. J. Thompson (2013), "The Status Costs of Subordinate Cultural Capital: At-Home Fathers' Collective Pursuit of Cultural Legitimacy through Capitalizing Consumption Practices," *Journal of Consumer Research*, 40(June), 19–41.

Deephouse, D. L. (1996), "Does isomorphism legitimate?" *Academy of Management Journal*, 39(4), 1024–39.

Eisenmann, T. R. (2007) *Platform Mediated Networks*: definitions and core concepts. Boston, MA: Harvard Business School.

Evans, N. J., J. Phua, J. Lim, and H. Jun (2017), "Disclosing Instagram Influencer Advertising: The Effects of Disclosure Language on Advertising Recognition, Attitudes, and Behavioral Intent," *Journal of Interactive Advertising*, 17(2), 138–49.

Giesler, M. (2012), "How Doppelgänger Brand Images Influence the Market Creation Process: Longitudinal Insights from the Rise of Botox Cosmetic," Journal of Marketing, 76(6), 55–68.

Hakala, H., L. Niemi, and M. Kohtamaki (2017), "Online brand community practices and the construction of brand legitimacy," *Marketing Theory*, 17(4), 537–58.

Handelman, J. M. and S. J. Arnold (1999), "The role of Marketing Actions with a Social Dimension: Appeals to the Institutional Environment," *Journal of Marketing*, 63(July), 33–48.

Hu, M., P. Qiu, F. Wan, and T. Stillmand (2018), "Love or hate, depends on who's saying it: How legitimacy of brand rejection alters brand preferences," *Journal of Business Research*, 90, 164– 70.

Humphreys, A. (2010a), "Megamarketing: The creation of markets as a social process," *Journal of Marketing*, 74(2), 1–19.

Humphreys, A. (2010b), "Semiotic structure and the legitimation of consumption practices: The case of casino gambling," *Journal of Consumer Research*, 37(3), 490–510.

Humphreys, A. and K. A. Latour (2013), "Framing the Game: Assessing the Impact of Cultural Representations on Consumer Perceptions of Legitimacy," *Journal of Consumer Research*, 40(4), 773–95.

Humphreys, A. and C. J. Thompson (2014), "Branding Disaster: Reestablishing Trust through the Ideological Containment of Systemic Risk Anxieties," *Journal of Consumer Research*, 41(4), 877– 910.

Hybels, R.C. (1995), "On legitimacy, legitimation, and organizations: A critical review and integrative theoretical model," *Academy of Management Journal*, Best conference proceedings, 241–45.

Johnson, C., T. J. Dowd, and C. L. Ridgeway (2006), "Legitimacy as a Social Process." *Annual Review of Sociology*, 32, 53–78.

Kates, S. M. (2004), "The Dynamics of Brand Legitimacy: An Interpretive Study in the Gay Men's Community," *Journal of Consumer Research*, 31 (2), 455–464.

Kozinets, R. (2019), *Nethnography*: The Essential Guide to Qualitative Social Media Research, 3rd ed., Los Angeles, CA: Sage.

Kozinets, R., R. Gambetti, and S. Biraghi (2018), "Faster Than Fact: Consuming in Post-Truth Society," in *Advances in Consumer Research*, 46, ed. Andrew Gershoff, Robert Kozinets, and Tiffany White, Duluth, MN: Association for Consumer Research, 413–19.

Lillqvist, E., J. K. Moisander, and A. F. Firat (2017), "Consumers as legitimating agents: How consumer-citizens challenge marketer legitimacy on social media," International Journal of Consumer Studies, 42(2), 197–204.

Lup, K., L. Trub, and L. Rosenthal (2015), "Instagram #Instasad?: Exploring Associations Among Instagram Use, Depressive Symptoms, Negative Social Comparison, and Strangers Followed," *Cyberpsychology, Behavior, and Social Networking*, 18(5), 247–52.

McCormick, K. (2016), "Celebrity endorsements: Influence of a product-endorser match on Millennials attitudes and purchase intentions," *Journal of Retailing and Consumer Services*, 32, 39–45.

McQuarrie J. M., J. Miller, and B. J. Phillips (2013), "The Megaphone Effect: Taste and Audience in Fashion Blogging," *Journal of Consumer Research*, 40(1), 136–58.

Meyer, J. W. and B. Rowan (1977), "Institutionalized organizations: formal structure as myth and ceremony," *American Journal of Sociology*, 83(2), 340–63.

Meyer, J. W. and W. R. Scott (1992), *Organizational environments*, Newbury Park, CA: Sage.

Phillips, N., T. Lawrence and C. Hardy (2004), "Discourse and Institutions," *Academy of Management Review*, 29(4), 635–52.

Press, M. and E. J. Arnould (2011), "Legitimating community supported agriculture through American pastoralist ideology," *Journal of Consumer Culture*, 11(2), 168–94.

Rao, H., P. Monin, and R. Durand (2003), "Institutional Change in Toque Ville: Nouvelle Cuisine as an Identity Movement in French Gastronomy," *American Journal of' Sociology*, 108(4), 795– 843.

Sandikc1, O. and G. Ger (2010), "Veiling in style: how does a stigmatized practice become fashionable?" *Journal of Consumer Research*, 37 (June), 15–36.

Scaraboto, D. and E. Fischer (2012), "Frustrated Fatshionistas: An Institutional Theory Perspective on Consumer Quests for Greater Choice in Mainstream Markets," *Journal of Consumer Research*, 39 (6), 1234–57.

Schouten, A. P., Loes Janssen, and Maegan Verspaget (2020), "Celebrity vs. Influencer endorsements in advertising: the role of identification, credibility, and Product-Endorser fit," *International Journal of Advertising*, 39(2), 258–81.

Scott, W. R. (1995), *Institutions and organizations*. Thousand Oaks, CA: SAGE Publications.

Scott, W. R. (2014), *Institutions and organizations*. Ideas, interests, and identities (4th ed.). Thousand Oaks, CA: Sage Publications.

Sood, S. O., E. F. Churchill, and J. Antin (2012), "Automatic identification of personal insults on social news sites," *Journal of the American Society for Information Science and Technology*, 63(2), 270–85.

Suchman, M. C. (1995), "Managing legitimacy: Strategic and institutional approaches," *Academy of Management Review,* 20(3), 571–610.

Thompson, C. J. (1997), "Interpreting Consumers: A Hermeneutical Framework for Deriving Marketing Insights from the Texts of Consumers' Consumption Stories," *Journal of Marketing Research*, 34 (4), 438–56.

Thornton, P. H., W. Ocasio, and M. Lounsbury (2012), *The institutional logics perspective*: A new approach to culture, structure and process, Oxford: Oxford University Press.

World Health Organization (2019), "Mental disorders," (accessed January 2020), [available at https://www.who.int/en/news-room/fact-sheets/detail/mental-disorders].

Wilner, S. J. S. and A. D. Huff (2016), "Objects of desire: the role of product design in revising contested cultural meanings," *Journal of Marketing Management*, 33(3-4), 244–71.

Is Effort Required by a Green Behavior Always Negative? The Moderating Effect of Male Gender Identification Strength

Constanze Gathen and Sandra Praxmarer-Carus, Universität der Bundeswehr München, Germany

INTRODUCTION

According to the principle of least effort, humans tend to avoid behaviors that require effort (Hull 1943). This research defines effort as a property of an activity or a product which determines the amount of labor that will be required to perform the activity or to generate utility from the product (Gibbs and Drolet 2003; Inzlicht, Shenhav, and Olivola 2018). Studies demonstrate that the effort necessary to carry out an activity acts as a barrier for performing that behavior (McKenzie-Mohr 2000). Consistently, Ludwig, Gray, and Rowell (1998) demonstrate that reducing effort increases the behavior's attractiveness. Therefore, a relevant recommendation to public policy makers who aim at motivating individuals to perform certain behaviors would be to reduce the effort that the behavior requires (Van Houten, Nau, and Merrigan 1981). However, many prosocial and green behaviors demand a significant amount of effort that is impossible to eliminate. Examples include household waste separation and picking up trash. As motivating individuals to perform such behaviors is valuable to society, it is necessary to understand the effects of the effort that such behaviors require. While the negative effect of effort is self-evident, few theories suggest that required effort may also increase the attractiveness of a behavior. This research aims to contribute to a clearer understanding of the potential positive effects of effort.

The literature has identified few positive effects of effort on the attractiveness of a behavior and has examined few moderators. Effort can positively affect the perceived quality and value of a product (Kruger et al. 2004; Mochon, Norton, and Ariely 2012) and determine how effective (Schunk 1983) and meaningful (Olivola and Shafir 2013) individuals perceive an activity to be. Furthermore, individuals with a high need for achievement actively search for challenges (Johnson and Perlow 1992), and Cutright and Samper (2014) demonstrate that individuals' perceived control over the outcome of a behavior affects how much effort they are willing to take. This research explores an additional effect of effort that the literature has not examined. We propose that the effort that a behavior requires may increase the perceived masculinity of that behavior and we argue that this potential effect may be highly relevant in the context of green behaviors.

Borau, Elgaaied-Gambier, and Barbarossa (2020) and Brough et al. (2016) demonstrate that individuals perceive green behaviors to be feminine. This perception can deter men from engaging in such behaviors (Brough et al. 2016). In line with this, Brough et al. (2016) find that presenting green behaviors in a more masculine way increases their attractiveness among men. We argue that emphasizing the effort required for a green behavior may make the behavior more masculine and therefore more attractive to men. We propose that male consumers' gender identification strength moderates the effect: when gender identification strength is low, the required effort has a negative effect on the attractiveness of the behavior; when male gender identification strength is high, the required effort makes the green behavior more attractive to consumers in comparison to without effort. We propose that the perceived congruence between the individual's self-concept and the proposed behavior mediates the effect. We report an experiment with male consumers. We provide implications for social marketers, green product marketing, and public policy makers.

THEORY AND HYPOTHESES

The negative effect of required effort on product attractiveness

Several studies support the principle of least effort and demonstrate that an option that requires more effort is less attractive than an option that requires less effort (Hull 1943). In the context of green products, for instance, Joshi and Rahman (2015) observe that consumers strive for convenience. As required effort causes consumers to invest time and energy and reduces one's free capacities, it is highly intuitive that effort reduces a choice's attractiveness (Steg and Vlek 2009).

Cutright and Samper (2014) report that individuals may prefer high effort choices versus low effort choices when they are able to observe timely progress towards achieving a goal. However, when fast progress is unlikely, individuals prefer low effort to high effort. The latter situation is typical for green choices because consumers often feel that their choice only has a small impact on the environment and real progress requires long-term and collective work. Thus, effort should decrease the attractiveness of green choices. We propose:

Hypothesis 1:   *Effort that a green product requires by the user has a negative effect on product attractiveness.*

Figure 1 illustrates the effects that this paper examines.
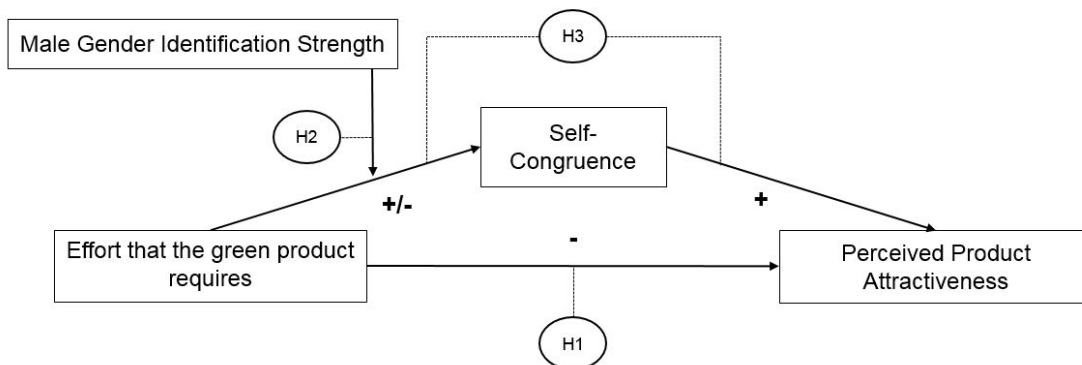
Figure 1: The Effects of Effort and the Hypotheses (H1, H2, and H3) of this Research

The moderating effect of male gender identification strength on the effect of effort on product attractiveness and self-congruence as mediator

We argue that emphasizing the effort required by a green behavior may make the behavior more masculine and therefore, more congruent with male consumers' self-concept. The perceived congruence between a behavior and the consumer's self-concept is a major determinant of consumers' choices (Malär et al. 2011). Thus, self-congruence should mediate the effect of effort on the attractiveness of that behavior.

Furthermore, we argue that male gender identification strength (GIS) moderates the effect of required effort on the perceived congruence between a green behavior and the male consumer's self-concept. The literature demonstrates that **individuals'** gender identity is a **substantial part of their self-concepts (Fischer and Arnold 1994) and defines it as "the** importance or centrality of gender group membership to one's overall self-concept" (Bosson and Michniewicz 2013, 427). We explain the moderating effect of male gender identification strength as follows. First, effort is associated with being capable, physically active, and forceful (Mochon et al. 2012), and these characteristics are associated with masculinity (Holt and Ellis 1998). Effort also relates to an individual's need for achievement and may empower them (Cutright and Samper 2014), both of which are positively related to perceived masculinity (Lobel and Agami-Rozenblat 1993). Thus, individuals should perceive a behavior (or product) that requires effort as more masculine than a behavior (or product) that does not. Secondly, the more relevant gender identity is for a male consumer, the more it influences his self-concept. When gender identification strength is high, being a man is the central reflection of the consumer's self-concept. (Bosson and Michniewicz 2013). When gender identification strength is lower, the male consumer's self-perception focuses less on his gender and instead considers other characteristics, such as his values and interests. Thus, the more relevant male gender identity is to a consumer the more the perceived masculinity of a product should determine the perceived congruence with that product. Concluding, effort that we assume to increase the perceived masculinity of a green product should particularly increase the perceived congruence with the consumer's self-concept when masculinity is the crucial part of their self-concept, that is, when gender identification strength is high. We propose:

Hypothesis 2: *Gender identification strength moderates the effect of effort on the perceived congruence between a green product and the male consumer's self-concept. With increasing male GIS effort compared to no effort increases the perceived self-congruence.*

Because the perceived congruence between a behavior and the consumer's self-concept is a major determinant of consumers' choices (Malär et al. 2011), we propose:

Hypothesis 3: *With increasing male gender identification strength, effort (compared to no effort) makes a green product more attractive, instead of less attractive, to consumers. Perceived self-congruence mediates the effect.*

STUDY

Design and stimuli

Our experiment (green product requiring effort vs. green product not requiring effort) used advertisements for a green heating system. Participants were randomly assigned to one of the advertisements. The ads described the advantages of the green, wood-burning heating system. The "no effort" version did not mention any effort for the user. The "effort" version either explained that the user must layer the firewood in order to allow the system to automatically transport it into the boiler, or explained that the user must split pieces of the firewood in order to make it the right size for the boiler (time requirement in both cases: 15 minutes per week). We used two versions of effort in order to avoid that consumers may like or dislike a specific effort. The analyses did not show differences between the effects of the two effort types and we combined them into one "effort group".

Participants

Four hundred fifty-six male respondents participated in the online experiment. Seventy-seven participants did not respond correctly to a control question. We excluded them from data analysis because they had not read the information provided. The final data set consisted of 379 males. Eighty-seven percent were students and their mean age was 22.

Measures

We measured green consumer values (Haws, Winterich, and Naylor, 2010) with four items like "I am willing to actively do something for the environment" (1 = fully disagree; 7 = fully agree). We measured gender identification strength (Bosson and Michniewicz 2013) with the following items: "Being a man is the most important reflection of who I am" and "Being a man is important to me" (1 = fully disagree; 7 = fully agree). Next, we included a filler task to draw the participants' attention away from the previous topics. Before seeing one of the advertisements, we asked participants to imagine that they were going to buy or build their own home and that they were looking for a heating system. After ad exposure, we measured the perceived attractiveness of the green product with the following items: "How attractive is this heating system to you?" (1 = highly unattractive; 7 = highly attractive) and "How likely are you to look for additional information about this heating system?" (1 = very unlikely; 7 = very likely). Furthermore, we measured the congruence between the participants' self-concept and their perception of the heating system (Malär et al. 2011). The items were: "This heating system is consistent with how I see myself", "Heating with this heating system is consistent with how I see myself", and "This heating system is consistent with the person I would like to be" (1 = fully disagree; 7 = fully agree). In addition, we measured perceived masculinity of the product (7-point rating scale).

Data analyses and findings

Cronbach's Alpha of the green consumer values was .87, the correlation of the gender identification strength-items was .67; Cronbach's Alpha of the three congruence-items was .89, and the correlation between the two dependent attractiveness-variables was .80. Thus, we aggregated the respective items. Participants perceived the products that required effort to be more masculine than the product with no effort (no effort: 3.86; effort: 4.13, p = .068).

We used Process Model 7 (Hayes 2018) to test our hypotheses. The independent variable was the manipulated effort (no effort vs. effort). The perceived attractiveness of the product was the depen-

dent variable. Perceived self-congruence was the mediating variable and gender identification strength (Male GIS) was the moderator. We included green consumer values (Green values) as a covariate, because it affects consumers' green behavior. Table 1 illustrates our findings.

Test of hypothesis 1. The second model of table 1 demonstrates a significant negative effect of effort on product attractiveness (-.241, $p = .048$). The findings support hypothesis 1. In line with the principle of least effort, an effortful choice is less attractive than a choice without effort.

TABLE 1: The Moderating Effect of Male GIS on the Effect of Effort

Process Model 7			
Mediator Variable Model (Perceived Self-Congruence)			
	Coefficient	SE	t
Constant	3.871	.751	5.157**
Effort	-.995	.425	-2.338*
Male GIS	-.390	.175	-2.224*
Effort x Male GIS	.271	.100	2.710**
Green Values	.370	.060	6.185**
R^2	.108		
Conditional Effects of Effort at Values of Male GIS			
Value	Effect	SE	t
2.50	-.318	.213	-1.492
4.00	.089	.155	.571
6.00	.630	.257	2.455*
Dependent Variable Model (Product Attractiveness)			
	Coefficient	SE	t
Constant	2.443	.311	7.863**
Effort	-.241	.121	-1.987*
Perceived Self-Congruence	.830	.040	20.732**
Green Values	-.086	.049	-1.733
R^2	.546		
Conditional Indirect Effects of Effort at Values of Male GIS			
Value	Effect	BootLLCI	BootULCI
2.50	-.263	-.616	.080
4.00	.074	-.181	.343
6.00	.523	.043	1.056
Index of Moderated Mediation Male GIS	Index .225	.036	.429
Mean Values (SD) of Product Attractiveness Dependent on Effort and Male GIS			

	Effort		
Male GIS	No Effort	Effort	
Low	5.13 (2.12)	4.71 (1.76)	
Moderate	5.38 (1.46)	5.03 (1.56)	
High	4.97 (1.97)	5.44 (1.35)	

Please note:	** p < 1%	* p < 5%

Test of hypothesis 2. The first model of table 1 shows that effort has a negative effect on perceived self-congruence (-.995, $p = .02$). This finding makes sense because humans tend to value efficiency (Payne, Bettman, and Johnson 1993) and should therefore perceive a product requiring effort as less congruent with their self-concept than a product that does not. As expected, male GIS moderates the effect of effort on perceived self-congruence. The interaction effect of effort x male GIS is significant (.271, $p = .007$). The conditional effects

of effort at different values of male GIS demonstrate that when male GIS is high, the effect of effort on perceived self-congruence is positive. The results support hypothesis 2.

Test of hypothesis 3. The conditional indirect effect of effort on product attractiveness at values of male GIS is positive when male GIS is high (effect: .523, interval [.043; 1.056]). The index of moderated mediation is .225 and significant because the confidence interval excludes zero (interval [.034; .429]). The findings support hy-

pothesis 3. Among male consumers with high GIS, the green product requiring effort is more attractive than the green product that does not require effort. Perceived self-congruence mediates this effect. Table 1 also reports the mean values of product attractiveness dependent on male GIS and effort. For this illustration, we split male GIS into three groups (percentiles: 3; 5). Again, the mean values demonstrate that product attractiveness was lower when the choice contained effort – only when male GIS is high effort increased attractiveness.

DISCUSSION

We argue that effort that a behavior requires can make the behavior manlier. Because the feminine perceptions of green behaviors may deter males from performing them (Brough et al. 2016), we examined whether an effort that a green product requires may increase the attractiveness of that green product. As expected, we find that, on average, effort reduces a green product's attractiveness. However, male consumers with high male gender identification strength (GIS) find a green product that requires effort compared to one that does not to be more congruent with their self-concept and more attractive.

We make the following contributions. Only few studies have examined the positive effects of effort and previous research has not studied the moderating effect of male GIS in this context. Our findings suggest that when targeting male consumers to whom being manly is of high importance, emphasizing the effort that is required by a green choice may increase the attractiveness of that choice. Based on our theory, we suggest that the presentation of an effort needs to be masculine in order to make the behavior more attractive to males with high GIS. Furthermore, our findings suggest that linking an effort to masculine perceptions (e.g., being active or being capable) should make the choice more attractive to male consumers. The latter may be possible by emphasizing the physical component of an effort. As an example, the request "sweating for the environment" may be more attractive to males than "spending time for the environment" as part of a cleanup campaign. Thus, well-considered presentations of a required effort can help to make green behaviors more attractive to male consumers.

Our theory does not only apply to green behavior. Effort may make any behavior manlier. However, since green behaviors suffer from their feminine perceptions the findings seem most relevant in this context.

Limitations

This study tested two types of effort in a specific context, and the specific effort types are likely to be perceived as masculine. Therefore, we cannot distinguish the effect of the effort involved from the effect of its masculine nature. Future studies should test the effects of other types of effort.

The required time investment in this study was 15 minutes per week, which is relatively low. Future studies should investigate the effects of increasing amounts of effort that may result in different effects. This study measured the perceived attractiveness of a green heating system but did not observe behavior. Future studies may observe real behavior.

REFERENCES

Borau, Sylvie, Elgaaied-Gambier, Leila, and Barbarossa, Camilla (2020), "The Green Mate Appeal: Men's Pro-Environmental Consumption is an Honest Signal of Commitment to their Partner," *Psychology & Marketing*, 1–20.

Bosson, Jennifer K. and Michniewicz, Kenneth S. (2013), "Gender Dichotomization at the Level of Ingroup Identity: What It Is, and Why Men Use It More Than Women," *Journal of Personality and Social Psychology*, 105(3), 425–42.

Brough, Aaron R., Wilkie, James E. B., Ma, Jingjing, Isaac, Mathew S., and Gal, David (2016), "Is Eco-Friendly Unmanly? The Green-Feminine Stereotype and its Effect on Sustainable Consumption," *Journal of Consumer Research*, 43(4), 567–82.

Cutright, Keisha M. and Samper, Adriana (2014), "Doing It the Hard Way: How Low Control Drives Preferences for High-Effort Products and Services," *Journal of Consumer Research,* 41(3), 730–45.

Fischer, Eileen and Arnold, Stephen (1994), "Sex, Gender Identity, Gender Role Attitudes, and Consumer Behavior," *Journal of Psychology and Marketing*, 11(2), 163–83.

Gibbs, Brian J. and Drolet, Aimee (2003), "Consumption Effort: The Mental Cost of Generating Utility and the Role of Consumer Energy Level in Ambitious Consumption," *Journal of Consumer Psychology,* 13 (3), 268–277.

Haws, Kelly L., Winterich, Karen P., and Naylor, Rebecca W. (2010), "Seeing the World Through GREEN-Tinted Glasses: Motivated Reasoning and Consumer Responses to Environmentally Friendly Products," working paper, Texas A&M University, College Station, TX 77843.

Hayes, Andrew F. (2018), *Introduction to Mediation, Moderation, and Conditional Process Analysis*: *A Regression-Based Approach,* 2nd ed., New York: The Guilford Press.

Holt, Cheryl L. and Ellis, Jon B. (1998), "Assessing the Current Validity of the Bem Sex-Role Inventory," *Sex Roles,* 39(11/12), 929–41.

Hull, Clark L. (1943), *Principles of Behavior,* New York, Appleton-Century.

Inzlicht, Michael, Shenhav, Amitai, and Olivola, Christopher Y. (2018), "The Effort Paradox: Effort Is Both Costly and Valued," *Trends in Cognitive Sciences,* 22 (4), 337–349.

Johnson, Debra Steele and Perlow, Richard (1992), "The Impact of Need for Achievement Components on Goal Commitment and Performance," *Journal of Applied Social Psychology,* 22 (21), 1711–20.

Joshi, Yatish and Rahman, Zillur (2015), "Factors Affecting Green Purchase Behaviour and Future Research Directions," *International Strategic Management Review,* 3 (1-2), 128–43.

Kruger, Justin, Wirtz, Derrick, van Boven, Leaf, and Altermatt, T. William (2004), "The Effort Heuristic," *Journal of Experimental Social Psychology,* 40(1), 91-98.

Lobel, Thalma E. and Agami-Rozenblat, Ornit (1993), "Self-Esteem, Need for Achievement and Sex-Role Orientation Among Kibbutz and Urban Men and Women," *Personality and Individual Differences,* 15(5), 523–29.

Ludwig, Timothy D., Gray, Timothy W., and Rowell, Allison (1998), "Increasing Recycling in Academic Buildings: A Systematic Replication," *Journal of Applied Behavior Analysis,* 31(4), 683–86.

Malär, Lucia, Krohmer, Harley, Hoyer, Wayne D., and Nyffenegger, Bettina (2011), "Emotional Brand Attachment and Brand Personality: The Relative Importance of the Actual and the Ideal Self," *Journal of Marketing*, 75(4), 35–52.

McKenzie-Mohr, Doug (2000), "Promoting Sustainable Behavior: An Introduction to Community-Based Social Marketing," *Journal of Social Issues,* 56 (3), 543–54.

Mochon, Daniel, Norton, Michael I., and Ariely, Dan (2012), "Bolstering and Restoring Feelings of Competence via the IKEA Effect," *International Journal of Research in Marketing,* 29(4), 363–69.

Olivola, Christopher Y. and Shafir, Eldar (2013), "The Martyrdom Effect: When Pain and Effort Increase Prosocial Contributions," *Journal of Behavioral Decision Making,* 26 (1), 91–105.

Payne, John W., Bettman, James R., and Johnson, Eric J. (1993), *The Adaptive Decision Maker,* Cambridge: Cambridge University Press.

Schunk, Dale H. (1983), "Ability versus Effort Attributional Feedback: Differential Effects on Self-Efficacy and Achievement," *Journal of Educational Psychology*, 75(6), 848–56.

Steg, Linda and Vlek, Charles (2009), "Encouraging Pro-Environmental Behaviour: An Integrative Review and Research Agenda," *Journal of Environmental Psychology,* 29(3), 309–17.

Van Houten, Ron, Nau, Paul A., and Merrigan, Michael (1981), "Reducing Elevator Energy Use: A Comparison of Posted Feedback and Reduced Elevator Convenience," *Journal of Applied Behavior Analysis,* 14(4), 377–388.

To Give or Not to Give: The Roles of Narcissistic Grandiosity and Vulnerability in Gift-Giving

Jen-Hsien Hsu, De Montfort University, UK
Suha Omar, De Montfort University, UK

INTRODUCTION

What drives narcissistic consumer in gift-giving—an opportunity to showcase a grandiose self-image, or a battle to maintain current self-image or a matter of both? In this research, we investigate how narcissistic grandiosity, vulnerability, and their interplay, collectively impact gift-giving orientations—to what extent consumers find pleasure from gift-giving and from buying gifts as well as a tendency to offer a generous gift that exceed recipient's expectations.

The research contribution is twofold. Firstly, we provide further insights regarding the role of narcissistic vulnerability in gift-giving which is underrepresented in the extant literature. More importantly, we further investigate how the interaction between narcissistic grandiosity and vulnerability impacts gift-giving, which is largely neglected in existing studies.

NARCISSISM AND GIFT-GIVING

The evidence for the relationship between narcissistic grandiosity, narcissistic vulnerability, and their interplay is sparse and tentative. As to the relationship between gift-giving and narcissistic grandiosity, extant literature suggests grandiose narcissists regard gift-giving as an opportunity to achieve their interpersonal goals. For instance, Hyun, Park, and Park (2016) found that in a romantic relationship, grandiose narcissists gift-giving behaviors are driven by the motivations to secure their current relationship and to show off in front of others. This inclination reflects the mentalities that grandiose narcissists hold—linking gift-giving with interpersonal goal pursuits (Emmons 1987; Raskin and Terry 1988; Wink 1991). As such, we hypothesize that grandiose side in narcissism positively influences gift-giving orientations.

Hypothesis 1: Narcissistic grandiosity positively predicts gift-giving orientations.

The relationship between narcissistic vulnerability and gift-giving is underrepresented in the extant literature. A plausible reason lies in a fact that this covet side of narcissism, having a fragile self-esteem, is not strongly related to general goal pursuits (Boldero, Higgins, and Hulbert 2015; Miller et al. 2011; Wink 1991). However, when it comes to self-image threats, such facet could come into play. For instance, Casale et al. (2016) found that narcissistic vulnerability is positively correlated with the motivation of hiding imperfection in the self-presentations. Therefore, we conjecture that narcissistic vulnerability, though triggered by self-protections, still positively impacts gift-giving orientations.

Hypothesis 2: Narcissistic vulnerability positively influences gift-giving orientations.

Lastly, we hypothesize that interplay between narcissistic grandiosity and vulnerability, though largely neglected in the extant literature, also positively impacts gift-giving orientations as we argue pure high levels of narcissistic grandiosity or vulnerability are insufficient to promote gift-giving. More precisely, high levels of narcissistic grandiosity would also lead to high levels of self-inflation and arrogance which would demotivate consumers to engage gift-giving (Emmons 1987; Raskin and Terry 1988). Similarly, high levels of narcissistic vulnerability can result in high levels of introversion (Miller et al. 2011; Wink 1991); the need of maintaining self-image through gift-giving becomes less pressing. Therefore, we conjecture gift-giving are boosted under high levels of both narcissistic grandiosity and vulnerability. Our view regarding such interplay is supported by the recent work from Manley et al. (2018) in which they found the conditional effect of narcissistic vulnerability between narcissistic grandiosity and goal persistence.

Hypothesis 3: The interplay between narcissistic grandiosity and vulnerability positively influences gift-giving orientations

PRESENT STUDY

We conducted two studies to examine the roles of narcissistic grandiosity, narcissistic vulnerability and their interplay in gift-giving orientation. In our first study, we investigate how narcissistic traits are associated with the two sources of pleasure in gifting—buying gifts and giving gifts (Macklin and Walker, 2015; Mortelmans and Damen, 2001). In our second study, we examine how these factors impact gift choices—choosing a standard gift that meets the recipient's expectations or a generous one that exceeds the expectations.

STUDY 1

Research Design and Measurements

We recruited 103 US participants from Amazon Mturk (M_{age} = 31.3; Male = 66) to investigate the influences of narcissistic grandiosity, narcissistic vulnerability and their interplay on two types of pleasure in gifting— pleasure from gift-giving (PGG) and pleasure from buying gifts (PBG). With respect to measurements, we used the narcissism single item scale (Konrath, Meier, and Bushman 2014), the narcissism grandiosity scale (Rosenthal et al. 2019) and the narcissism vulnerability scale (Crowe et al. 2018) to measure the narcissistic trait as a whole (M = 4.41), narcissistic grandiosity (α = .911, M = 4.21), and narcissistic vulnerability (α = .950, M = 4.62). The self-esteem scale (Rosenberg 1965) was included to contrast differences between non-narcissistic and narcissistic gift-giving tendencies and to treated as a covariate in the model (α = .727, M = 4.52). As to the two dependent measures, we used Mortelmans and Damen (2001) gift-giving satisfaction scale to measure pleasures from gift giving (α = .773, M = 6.07) and Macklin and Walker (2015)'s gift-giving joy scale to measure pleasures from buying gifts (α = .791, M = 5.71). All the research instruments were assessed on a 7-point Likert-type scale (1 = strongly disagree and 7 = strongly agree) apart from the narcissism single item scale in which we asked participants to indicate to what extent they feel they are a narcissist from 0 (totally disagree) to 10 (totally agree). Lastly, participants also reported their gifting budgets by stating the number of gifts they generally buy a year and the average price of each gift.

RESULTS

We first assessed common method bias (CMB) by performing Harman's single factor test in SPSS. Having constrained the number of factors to one, an un-rotated exploratory factory analysis revealed that the total variance explained by a single factor is 36.566 which is below the threshold of 50% (Podsakoff et al. 2003). This suggests that the dataset does not exhibit CMB issues.

We then conducted the Pearson's correlation test to contrast differences between non-narcissistic and narcissistic gift-giving tendencies (PGG and PBG). The results suggest that narcissistic traits, compared to self-esteem, yield to different gift-giving tendencies. Firstly, all the narcissistic traits are found positively correlated to PBG ($r_{narcissism}$ = .337, p = .000; $r_{grandiosity}$ = .405, p = .000; $r_{vulnerability}$ = .238, p = .016); the correlation between self-esteem and PBG is found insignificant. Contrastingly, none of the narcissistic traits is significantly correlated with PGG whereas self-esteem is ($r_{self-esteem}$ = .309, p = .001).

The follow-up moderation tests were conducted to further examine how narcissistic grandiosity, vulnerability, and their interplay collectively influence PGG and PBG with the use of PROCESS (Model 1) for SPSS (Hayes 2013). Self-esteem, gender, and budget were treated as covariates in these models. We then observed two positively significant interaction effects in both models. As to the pleasure from gift-giving, the results showed that both grandiosity and vulnerability negatively predicts PGG ($\beta_{Grandiosity}$ = -.44, p = .013; $\beta_{Vulnerability}$ = -.98, p = .000) whereas the interplay positively predicts PGG ($\beta_{Grandiosity * Vulnerability}$ = .169, p = .000, 95% CI [.10, .26]). The follow-up floodlight analysis (Johnson and Neyman 1936) revealed that grandiosity positively predicts PGG under the condition when the levels of vulnerability are at 3.5 and above. Similarly, the negative correlations between vulnerability and PGG turns insignificant when the levels of grandiosity are at 4.09 and above.

As to pleasure from buying gifts, we observed a negatively significant effect from vulnerability ($\beta_{Vulnerability}$ = -.63, p = .013) and a positively significant interaction effect from the interplay ($\beta_{Grandiosity * Vulnerability}$ = .121, p = .005, 95% CI [.04, .21]). In the follow-up floodlight analysis, the results showed that grandiosity positively predicts gift-buying pleasure when the levels of vulnerability are at 2.45 and above; the negative influence of vulnerability on PBG turns insignificant when the levels of grandiosity levels are at 2.58 and above. To sum up, we observed narcissistic grandiosity, vulnerability and their interplay yield to different impacts on gift-giving tendencies when they are collectively analyzed in the model. More importantly, the results imply that gift-giving is likely to be driven under high levels of both narcissistic grandiosity and vulnerability. In our next study, we examine whether such pattern is observed in a choice scenario: giving a standard (or a generous) gift that meets (or exceeds) the recipient's expectations?

STUDY 2

Research Design and Measurements

We recruited 100 US participants from Amazon Mturk with research incentives (M_{age} = 36.7; Male = 53); one participant was excluded from the analysis owing to incomplete responses. In this study, participants were asked to indicate to what extent they are inclined to offer a standard gift (a $50 reading lamp that meets the recipient's expectations) or a generous gift (a $90 backpack that exceeds the recipient's expectations) on an 11-point scale (0 = definitely the lamp; 10= definitely the backpack). The authors used the same instruments to measure narcissism (M = 2.31), narcissistic grandiosity (α = .91, M = 2.65), narcissistic vulnerability (α = .93, M = 2.57), self-esteem (α = .92, M = 4.74), and budget. Using the same procedure as in Study 1, CMB analysis showed that the total variance explained by a single factor is 26.493 indicating that CMB is not an inherent feature of our dataset.

RESULTS

The results suggest that narcissistic traits, contrasting to self-esteem, yield to a different gift-giving preference in this scenario. In the Pearson's correlation test, we observed narcissistic traits are positively correlated to the preference for the generous gift ($r_{narcissism}$ = .265, p = .008; $r_{grandiosity}$ = .282, p = .005; $r_{vulnerability}$ = .323, p = .001); the correlation between self-esteem and this preference was found insignificant. We then conducted a moderation test to examine how narcissistic grandiosity, vulnerability, and their interplay collectively influence gift preference with the use of PROCESS (Model 1) for SPSS (Hayes 2013). Self-esteem, gender, and budget were treated as covariates. The results revealed that the simple main effects of narcissistic grandiosity and vulnerability are insignificant, but the interplay is ($\beta_{Grandiosity * Vulnerability}$ = .31, p = .019, 95% CI [.05, .57]). The follow-up floodlight analysis revealed that narcissistic grandiosity positively predicts preference for the generous gift under the condition that the levels of vulnerability are 4.33 and above; narcissistic vulnerability also positively predicts PGG when the levels of grandiosity are 3.01 above.

In summary, we found the same pattern in this gift preference scenario. Whilst self-esteem is not associated with a preference for a generous gift, both narcissistic grandiosity and vulnerability are. More importantly, this inclination is driven under high levels of narcissistic grandiosity and vulnerability.
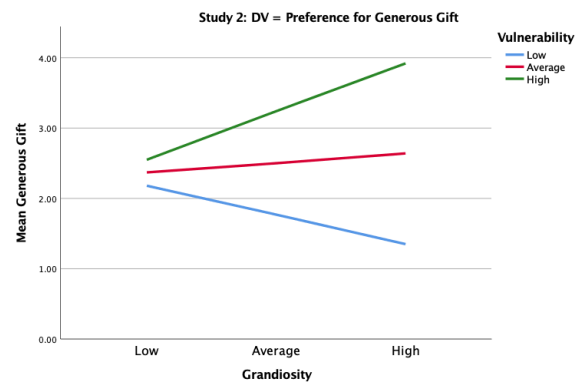
Figure 1: The interaction plot

GENERAL DISCUSSION

Across the two studies, we examined the interactive relationship between the narcissistic traits upon gift-giving. Both studies showed that these traits yield to different gift-giving orientations, compared to self-esteem, in zero-order correlations. We found that both narcissistic grandiosity and vulnerability are positively correlated to pleasure from buying gifts (study 1) and to an inclination to offer generous gifts that exceeds the recipient's expectations (study 2), which validate our hypothesis that instrumental values play a central role in narcissistic gift-giving—be it to showcase or maintain their self-image (Campbell, Foster, and Finkel 2002; Hyun et al. 2016; Sherry 1983).

More importantly, we found narcissistic grandiosity, vulnerability and their interactions yield to different impacts on gift-giving orientations. Regarding the single main effect of narcissistic grandiosity, we found that it is only negatively associated with pleasure from giving gifts, compared to that of narcissistic vulnerability which is negatively associated with both pleasure from giving and buying gifts (study 1). We suggest this is owing to the reason that gift-giving is more associated with interpersonal gains (Emmons 1987; Raskin and Terry 1988; Wink 1991). As such, the grandiose side in narcissism makes gift-giving more enjoyable, compared to the vulnerable

counterpart. However, in terms of behavioral tendencies, these two facets in narcissism lead to a similar outcome (study 2).

What actually drives gift-giving? We found that all the gift-giving indices in our studies, the pleasure from gift-buying and gift-giving along with the generous gift-giving tendencies, were consistently positively predicted by the interplay. These results support our third hypothesis that only under adequate levels of both narcissistic grandiosity and vulnerability would consumers strongly associate the interpersonal gains/ maintenance in the gift-giving which then promotes gift-giving. To the best of our knowledge, we are the earliest who capture such detailed insights regarding how the two sides in narcissism collectively impact gift-giving behaviors.

Table 1: Summary of the findings:

H1	Narcissistic grandiosity positively predicts gift-giving orientations	Supported at zero-order correlations (to PBG and generous gift-choice). However, the single main effect of narcissistic grandiosity negatively predicts PGG.
H2	Narcissistic vulnerability predicts gift-giving orientations	Supported at zero-order correlations (to PBG and generous gift-choice). However, the single main effect of narcissistic grandiosity negatively predicts both PGG and PBG.
H3	The interaction between narcissistic grandiosity and vulnerability positively predicts gift-giving orientations	Supported. The interaction effect consistently and positively predicts all three gift-giving measures.

LIMITATION AND FUTURE RESEARCH

This research presents compelling evidence regarding how narcissistic grandiosity and vulnerability operate as a complex dyad in explaining gift-giving. However, as the present research was taken under a one-shot hypothetical gift choice, it is inevitably exposed to the issue of hypothetical bias which limits the external validity of the research (Hensher 2010). We recommend future researchers to study consumer's actual gift purchases to overcome this limitation. In addition, as this research only captures the correlation relationship among gift-giving intentions and two forms of narcissism, we also recommend future researchers to adopt the priming technique to further validate the research hypotheses and provide further managerial implications.

As to future research caveat, we recommend researchers to investigate different types of narcissistic gift-giving tendencies such as their preferences to offer experiential (vs. material) gifts as well as how would narcissistic consumers prioritize the potential interpersonal gains (e.g., demonstrating economic vs. social vs. cultural capital) in their gift-giving practices (Chan and Mogilner 2016). Secondly, we recommend future researchers to consider the role of publicity (Griskevicius, Tybur, and van den bergh 2010) in gift-giving and investigate the potential interplay in the decision-making process.

REFERENCES

Boldero, J. M., E. T. Higgins, and C. A. Hulbert (2015), "Self-Regulatory and Narcissistic Grandiosity and Vulnerability: Common and Discriminant Relations," *Personality and Individual Differences*, 76, 171-76.

Campbell, W. Keith, Craig A. Foster, and Eli J. Finkel (2002), "Does Self-Love Lead to Love for Others? A Story of Narcissistic Game Playing," *Journal of Personality and Social Psychology*, 83 (2), 340-54.

Casale, Silvia, Giulia Fioravanti, Laura Rugai, Gordon L. Flett, and Paul L. Hewitt (2016), "The Interpersonal Expression of Perfectionism among Grandiose and Vulnerable Narcissists: Perfectionistic Self-Presentation, Effortless Perfection, and the Ability to Seem Perfect," *Personality and Individual Differences*, 99, 320-24.

Chan, Cindy and Cassie Mogilner (2016), "Experiential Gifts Foster Stronger Social Relationships Than Material Gifts," *Journal of Consumer Research*, 43 (6), 913-31.

Crowe, Michael L., Elizabeth A. Edershile, Aidan G. C. Wright, W. Keith Campbell, Donald R. Lynam, and Joshua D. Miller (2018), "Development and Validation of the Narcissistic Vulnerability Scale: An Adjective Rating Scale," *Psychological Assessment*, 30 (7), 978-83.

Emmons, Robert A. (1987), "Narcissism: Theory and Measurement," *Journal of Personality and Social Psychology*, 52 (1), 11-17.

Griskevicius, Vladas, Joshua Tybur, and Bram van den bergh (2010), "Going Green to Be Seen: Status, Reputation, and Conspicuous Conservation," *Journal of Personality and Social Psychology*, 98, 392-404.

Hayes, Andrew F. (2013), *Introduction to Mediation, Moderation, and Conditional Process Analysis*, New York: The Guilford Press.

Hensher, David A. (2010), "Hypothetical Bias, Choice Experiments and Willingness to Pay," *Transportation Research Part B: Methodological*, 44 (6), 735-52.

Hyun, Na Kyong, Yoobin Park, and Sun W. Park (2016), "Narcissism and Gift Giving: Not Every Gift Is for Others," *Personality and Individual Differences*, 96, 47-51.

Johnson, Palmer O and Jerzy Neyman (1936), "Tests of Certain Linear Hypotheses and Their Application to Some Educational Problems," *Statistical Research Memoirs*, 1, 57-93.

Konrath, Sara, Brian P. Meier, and Brad J. Bushman (2014), "Development and Validation of the Single Item Narcissism Scale (Sins)," *PLoS ONE*, 9 (8), e103469.

Macklin, M. Carole and Mary Walker (2015), "The Joy and Irritation of Gift Giving," Cham: Springer International Publishing, 28-32.

Manley, Harry, Ross Roberts, Stuart Beattie, and Tim Woodman (2018), "I'll Get There Because I'm Great, or Am I? Narcissistic Vulnerability Moderates the Narcissistic Grandiosity – Goal Persistence Relationship," *Personality and Individual Differences*, 120, 65-74.

Miller, Joshua D., Brian J. Hoffman, Eric T. Gaughan, Brittany Gentile, Jessica Maples, and W. Keith Campbell (2011), "Grandiose and Vulnerable Narcissism: A Nomological Network Analysis," *Journal of Personality*, 79 (5), 1013-42.

Mortelmans, Dimitri and Sofie Damen (2001), "Attitudes on Commercialisation and Anti-Commercial Reactions on Gift-Giving Occasions in Belgium," *Journal of Consumer Behaviour*, 1 (2), 156-73.

Podsakoff, Philip, Scott MacKenzie, Jeong-Yeon Lee, and
Nathan Podsakoff (2003), "Common Method Biases in
Behavioral Research: A Critical Review of the Literature and
Recommended Remedies," *The Journal of applied psychology*,
88, 879-903.

Raskin, Robert and Howard Terry (1988), "A Principal-
Components Analysis of the Narcissistic Personality Inventory
and Further Evidence of Its Construct Validity," *Journal of
Personality and Social Psychology*, 54 (5), 890-902.

Rosenberg, M. (1965), *Society and the Adolescent Self-Image*,
Princeton, NJ: Princeton University Press.

Rosenthal, Seth A., Jill M. Hooley, R. Matthew Montoya, Sander
L. van der Linden, and Yulia Steshenko (2019), "The
Narcissistic Grandiosity Scale: A Measure to Distinguish
Narcissistic Grandiosity from High Self-Esteem," *Assessment*,
1073191119858410.

Sherry, John F. (1983), "Gift Giving in Anthropological
Perspective," *Journal of Consumer Research*, 10 (2), 157-68.

Wink, Paul (1991), "Two Faces of Narcissism," *Journal of
Personality and Social Psychology*, 61 (4), 590-97.

The Role of Consumption Activities Within Symbolic Spaces in Shaping the Identities of People Living in Poverty

Anis Jounaid, Institut de Recherche en Gestion-UPEC, France
Abdelmajid Amine, Institut de Recherche en Gestion-UPEC, France

INTRODUCTION

Market-driven consumption has become one of the main factors of status access and identity projects' definition, both individually and collectively (Arnould and Thompson 2005). However, many individuals and groups are found to have a merely partial participation in the marketplace, marginal, even. This may be due to (non-)consumption choices following ideological (Kozinets and Handelman 2004), cultural (Hebdige 2002) or status (Arsel and Thompson 2011) considerations. Moreover, some vulnerability factors such as a physical disability (Baker, 2006), old age (Barnhart and Peñaloza 2013), illiteracy (Adkins and Ozanne 2005) or a precarious financial situation (Williams and Windebank 2002) may also exclude individuals from taking part in consumption activities.

These vulnerable populations suffer a power imbalance in the market consumption sphere (Baker et al. 2005). In that sense, their vulnerable condition (*ibid.*) is not a status, but rather the result of the interaction between individual characteristics and external elements (commercial strategies, social context) in a given situation. It is a constraining, permanent or temporary condition where consumers deal with institutional structures (market, public actors...) that are not tailored to their distinctive characteristics.

The present study tackles the condition of poverty from an identity viewpoint as we adhere to the idea that (non-)consumption choices and activities are socioculturally and spatially embedded (Saatcioglu and Ozanne 2013), and can influence consumers' identity projects (Arnould and Thompson, 2005). Limited economic, social and cultural resources put people living in poverty (referred to as "PLP" throughout the paper) in a weak position in the market (Alwitt 1995), which leads to a discrepancy between what consumption society enables to do and what material constraint prevents from doing. PLP may then resort to non-governmental organizations to tend to some of their daily needs, such as food. This dual access of vulnerable consumers, either to conventional marketplaces (market-sphere-related) that express valued (or at least normal) identities or to charity-related spaces (assistance-related) associated with stigmatized ones, results in activating identity negotiation strategies that unfold through (non) consumption activities. Being that consumption is spatially anchored (Saatcioglu and Ozanne 2013), the latter consumption spaces are assumed to shape people's identities, in the sense that these places of consumption impose behavioral codes and standards that forge individual identities, either by adopting or endorsing them (conforming to the norm), or by circumventing or resisting them (deviance from the norm) (Amine and Gicquel 2011). In accordance with the consumption spaces (unconstrained vs constrained) backed by different offer schemes (wide and free choice vs limited and imposed choice), identities are expressed through the adoption of singular behaviors (overt and claimed vs inconspicuous and unacknowledged) and the expression of differentiated feelings (pleasure and accomplishment vs shame and losing face) (Chase and Walker 2013).

Our goal is to delve into identity strategies used by PLP to (de) subscribe (from)to (rejected)valued social identities and navigate between them, framing our research question as follows: How does PLP's affiliation to charity-related consumption spaces shape their social identity? And how do they negotiate these identities?

Following a quasi-ethnographic research design, we have conducted observations and interviews with affiliates of a situated space of non-market-driven consumption, "Les Restos du Cœur", one of the most prominent charities in France. The thematic-content analysis of our respondents' discourses highlighted different space-bound consumption activities adopted by PLP. Three symbolic consumption spaces have been identified: constrained (stigmatized), non-constrained (normal) and hinge, among which PLP navigate, using cultural and social resources.

LITERATURE REVIEW

PLP In A Consumption Society

We envision poverty as a social dynamic (Simmel 1907/1998) that transcends material constraints to encompass important status, identity and social dimensions (Hamilton and Catterall 2006; Paugam 1998). People Living in Poverty (PLP) are individuals lacking economic, social and cultural resources (Bourdieu 1984; Holt 1998) and/or the ability to activate them, and are therefore restricted in their evolution potential in a consumption society, partly made of "exclusionary" spaces (i.e. marketplaces) (Castilhos and Dolbec 2018,5). Marketplaces are consumption spaces produced as a result of negotiation between social actors (Castilhos 2019), including businesses which, among other things, promote a cleaving social organization (Saatcioglu and Ozanne 2013) resulting in the "segregation of less resourceful people from specific places" (Castilhos 2019, 582).

Furthermore, the marketing paradigm underlying access to products and services, which enable individuals' material aspirations and full inclusion into the consumption society, is middle-class-biased (Hill 2002), and based on the idea that consumption choices derive mainly from preference (Bone, Christensen, and Williams 2014), irrespective of economic and cultural considerations. Consumers outside of this marketing-defined field (Hill 2002) are partially or totally excluded from the market-driven consumption sphere, which can translate into higher access-to-consumption costs compared to privileged classes (Caplovitz 1967). Thus, the lack of financial resources can exclude PLP from the marketplace and bring about a set of vulnerabilities, such as severed social connections (Paugam 1998), and an exit from the conventional economic sphere, leading to a break with society (Castel 1991), all of which have a substantial impact in shaping PLP's identities (Cohen 1997; Reutter et al. 2009).

PLP: An Identity Perspective

In line with both our conceptions of poverty and consumption (i.e. a socio-culturally and spatially situated activity) we mobilize the work of Goffman (1963) who studied identity dynamics through the lens of social interactions and noted a tension between virtual (attributed) and actual components of an individual's identity. This is linked to a discrediting attribute, a stigma (e.g. physical, mental or character disabilities), which "constitutes a special discrepancy between virtual and actual social identity" (*ibid*, 3). The said discrepancy is all the more present in the case of social interactions between normal individuals (people who conform to social norms) and stigma bearers. The latter can potentially be stigmatized due to their non-conforming situation (Goffman 1963), so they resort to identity negotiation strategies to cope with the tension between their actual and virtual social identities. Hence, analyzing people's identity configuration seems quite relevant when studying individuals whose consumption needs are not always met.

In the French context, PLP can benefit from welfare programs under certain conditions. Still, the welfare state cannot bridge the gap created by an unequal wealth distribution system, so non-governmental charity organizations take on the mission of preventing a total disconnect from society (and from consumption access) (Hamilton and Catterall 2006; Oosterlynck et al. 2013). These social innovations, such as charities, that develop on the fringes of institutional structures, are contextually localized responses to the inability of both the market and the public sphere to tend to PLP's full needs and mitigate the risks of social exclusion. The spatial separation between charities and mainstream marketplaces can materialize a distinction between market-related and charity-related identities, leading to downgrading feelings and stigmatization (Nau, Derbaix, and Thevenot 2016). This matter of fact legitimates the use of a Goffmanian framework to explore the tensions between PLP's experiences with non-governmental organizations and "the idealized consumption-oriented lifestyles that global consumer culture promotes" (Yurdakul, Atik, and Dholakia 2017, 299) and the ways they cope with. The charity-related space affiliation can be seen as stigma symbols referring to poverty and assistance (Chase and Walker 2013), whereas the conventional consumption area (i.e. supermarkets) can be seen as a prestige symbol (Goffman 1963) related to market-driven experiences in a consumption society where self-perception is closely linked to the capacity to consume (Holt 2002).Studies linking identity and consumption have mainly focused on affluent consumers (Belk 1988; Kozinets and Handelman 2004; Sandikci and Ger 2010) rather than vulnerable ones like PLP in a context of subsistence and market exclusion. We propose to cover this ground by analyzing how PLP consumption activities, embedded in consumption spaces, can shape their identities. More precisely, we study the consumption activities that PLP adopt inside the charity space and outside this area (i.e. marketplace), and the ways they combine the two to negotiate their identities.

METHODOLOGY

Fieldwork is conducted in the French charity, "Les Restos du Cœur," operating nationwide to provide, mainly, food assistance to eligible PLP[1]. The heterogeneity of profiles benefitting from this charity presents a broad scope of social, cultural and identity elements, allowing for a more thorough account of identity negotiation strategies through consumption activities. A qualitative method based on a quasi-ethnographic research design was selected to shed light on the meanings of consumption activities for PLP and to analyze the identity implications thereof.

Firstly, we made several visits to the Restos Du Cœur distribution center in Créteil in the suburbs of Paris, where we informally spoke with managers, volunteers and beneficiaries, to grasp the functioning of this non-market-driven space of consumption. Frequent observations were then made twice a week for 12 months along with semi-structured interviews with fifteen beneficiaries (nine women and six men), aged 32 to 63. Given the sensitive nature of the poverty topic (Hill 1995), we started by building a trusty relationship with the respondents to make them feel comfortable with the interviewing process, and also to establish the necessary empathy to be the closest possible to the meanings of their statements.

We asked open-ended questions about respondents' backgrounds and trajectories, both charity and market-related consumption activities and experiences as well as their perceptions, attitudes and judgments of their living situation with respect to themselves and others both inside and outside charities. Interviews lasted one hour on average and took place either in the distribution center, cafés or respondents' homes, at their convenience.

The interviews were transcribed and analyzed via thematic-based coding following an iterative process between literature and gathered data. The authors double-coded a portion of the collected data both to validate and stabilize the coding scheme (Miles and Huberman 1994). Interviews were first coded with the purpose of remaining as close to the respondents' intended meanings as possible at a category level, and then emerging themes were built while moving up in terms of theorization (Spiggle 1994).

FINDINGS

The analysis of the collected data shows that (non-)consumption activities hold ambivalent meanings in regard to identity implications. These activities are analyzed in light of their potential ability to position PLP in of the following three symbolic consumption spaces:

Consumption Activities that Place Individuals to the Constrained (Stigmatized) Space

In addition to their non-market-driven consumption activities inside charities, other ones like compromise between basic expenses such as housing (Amine and Toumi 2018) and food consumption through storing and consuming goods after the expiration date as Jean (56 years, lost his job due to health problems) states: "they gave me a veggie pizza in June, it's still in the freezer even though it shouldn't have exceeded September", anchor consumers in poverty, as identification between beneficiaries is facilitated by their sharing said consumption activities. Consumers who partake in these activities reify the constrained dimension of this consumption space (i.e. charities), as an '*entre-soi*' that either consecrates participants' internalization of the beneficiary, stigmatized (Chase and Walker 2013) social identity, or allows others to use this space as a place to socialize even with people experiencing the same constrained situation, which is illustrated by the following excerpt from Jean: "Coming here is to have, to be able to communicate (…) there are [people] who understand or happen to be in the same situation".

Consumption Activities that (Re-)Place Individuals in the Non-Constrained (Normal) Space

The Identification/disidentification among PLP is based on the similarity/divergence of adopted consumption practices compared to other individuals living in poverty. PLP can reject the beneficiary social identity by, temporarily, adopting affluent consumers' practices such as consuming paid cultural or hedonic services (Holt 1998), as Jean asserts:" Oh, leisure, well, when I have some savings every now and then (…) it's Louvre Museum, it's Musée de l'Homme, I am still a scientist". By doing so, impoverished consumers momentarily escape their constraining materiality and the related beneficiary identity, by (re)placing themselves in a non- constrained (normal) symbolic consumption space. They do not give up their charity-related consumption activities, though, as long as they resort to information control strategies, like concealment and/or selective disclosure (Goffman 1963) regarding their beneficiary status to avoid stigmatization and to be able to navigate securely between the two spaces, such as Alain (45 years, unemployed, temporarily homeless): "No, few people know (that I am a charity beneficiary), only my friend and my mom".

---

1   Respondents earning less than 667 euros a month which is beneath the 50 % economic poverty threshold established by INSEE in France (867 euros) in 2019.

Consumption Activities Between Normalcy and Poverty: A Hinge Space

The hinge space is composed of consumption places where people consume either for economic or status (symbolic) reasons, installing a blurred distinction or a confusion between constrained (i.e. non-market-driven) and alternative (i.e. market-driven) identities expressed in these interstice places. Activities pertaining to this consumption space refer to both financially constrained and affluent consumers. This ambivalence can be understood by comparing the meanings associated with human-scale market buying of both consumers' profiles. While there is a statutory dimension (Thompson and Coskuner-Balli 2007) related to said activity for the former (i.e. alternative ideology), the economical dimension is what drives the latter to adopt it as Gabriel (38 years old, unemployed) states: "You fall back on local growers (…) there is a farm near Chennevières, as we are directly dealing with growers, it's way cheaper". Collecting discarded goods (or Gleaning) presents itself as an analogous case as it holds practical meaning for Amélie (48 years, retired) who resorts to it rather out of necessity, "when I need a piece of furniture (…) something expensive, if I find it [even] broken [in the street], I'll repair it", than as a form of alternative provisioning (Guillard and Roux 2014).

DISCUSSION AND CONCLUDING REMARKS

Our first theoretical contribution is a conceptualization of consumption spaces as a framework for understanding PLP's identity configuration, which we illustrate in table 1 below. We focus on identity strategies PLP resort to in order to (de)subscribe (from)to (non) constrained spaces.

Consumption spaces have been conceptualized as spatial types marked by dynamics of participation/subjugation and negotiation/ consensus (Castilhos and Dolbec 2018). We find charities to share specificities with segregating (entre-soi) and emancipating (rehabilitating vulnerable consumers) spaces.

In our analysis, the frontier between constrained and non-constrained spaces is not clearly defined, it's more of a junction (inclusive) space between the exclusive spaces than a limit separating the two. Rather than a classification of disjointed elements, the constrained and non-constrained consumption spaces are linked by the hinge space, forming a continuum through which PLP can navigate, switching from one space to another, depending on their social contexts and the social identity they want to (dis)identify (from)with, using information control strategies for instance (Goffman 1963).

The second contribution of this exploratory research is highlighting the potential of the symbolic dimension to transcend, even temporarily, the material one (Hogg, Banister, and Stephenson 2009). As consumption practices hold social meaning, they enable PLP to navigate from constrained to non-constrained consumption spaces and briefly dissociate from material difficulties by adopting consumption choices, hedonic ones for instance, that (re-)place them in a valued social identity set (Hamilton 2012). This contrasts with the opposite movement, from non-constrained to constrained space, motivated by status and ideological dimension as it is the case with collecting discarded goods (Guillard and Roux 2014). This highlights the ambivalent nature of consumption activities' meanings, which can be used as an identity strategy based on the blurred distinction between the constrained and the chosen nature of consumption activities such as the collection of discarded objects (or gleaning) or human-scale market buying to distance themselves from the rejected impoverished identity.

Finally, the pendulum swings depend on the availability of social and cultural resources (Bourdieu 1986; Holt 1998) along with the capacity of the PLP to activate them. This relates to the temporality (transitory or enduring) of the poverty situation, a structural element in the experiences of our respondents (Amine and Toumi 2018).

As our research focuses only on one charity, we are currently working on gaining access to another non-governmental organization to broaden the scope of our study and circumvent the possibility

Table 1: Consumption spaces and identity negotiation

Consumption activities	Identity strategies	Consumption space
• Fare evasion • Food consumption after expiration date • Charitable consumption	• Identification to other beneficiaries to avoid isolation	*Constrained space:* Non market-driven consumption (Charities)
• Human scale markets (farms) • Buying second-hand goods • Collecting discarded goods (Gleaning)	• Prevalence of economic reasons over identity and status' motives to attend these places • Blurred distinction between constrained and alternative identities	*Hinge space:* Market and non-market-driven consumption (interstice places)

• Hedonic consumption
• Cultural consumption
	• Information control:
	  o Concealment
	  o Selective disclosure
		Non-constrained space:
		Market-driven consumption (Traditional markets)

of a structuring effect of the organization on the beneficiaries 'consumption activities, and, therefore, identity negotiation. In addition, we are negotiating with our interviewees to allow us to follow and observe them as they make forays into an unconstrained space (supermarkets, paid leisure spaces, etc.), in order to understand the way they behave, consume and use material signs (such as clothing) to express their identity, and put these elements into perspective with what we have observed in the charity constrained space.

REFERENCES

Adkins, Nathalie R. and Julie L. Ozanne (2005), "The Low Literate Consumer," *Journal of Consumer Research*, 32 (1), 93–105.

Alwitt, Linda F. (1995), "Marketing and the Poor," *American Behavioral Scientist*, 38(4), 564–577.

Amine, Abdelmajid and Yohan Gicquel (2011), "Rethinking resistance and anti-consumption behaviours in the light of the concept of deviance," *European Journal of Marketing*, 45 (11/12), 1809–1819.

Amine, Abdelmajid and Alia Toumi (2018), «La transition des individus par des épisodes de pauvreté:de l'ajustement de la consommation à la reconfiguration identitaire,» *Management International*, 22 (2), 144–158.

Arnould, Eric J. and Craig J. Thompson (2005), "Consumer culture theory (CCT): Twenty years of research," *Journal of Consumer Research*, 31 (4), 868-882.

Arsel, Zeynep and Craig J. Thompson (2011), "Demythologizing Consumption Practices: How Consumers Protect Their Field-Dependent Identity Investments from Devaluing Marketplace Myths," *Journal of Consumer Research*, 37 (5), 791–806.

Baker, Stacy M. (2006), "Consumer normalcy: Understanding the value of shopping through narratives of consumers with visual impairments," *Journal of Retailing*, 82 (1), 37–50.

Baker, Stacy M., James W. Gentry, and Terri L. Rittenburg (2005), "Building understanding of the domain of consumer vulnerability," *Journal of Macromarketing*, 25 (2), 128-139.

Barnhart, Michelle and Lisa Peñaloza (2013), "Who Are You Calling Old? Negotiating Old Age Identity in the Elderly Consumption Ensemble," *Journal of Consumer Research*, 39 (6), 1133–1153.

Belk, Russel W. (1988), "Possessions and the Extended Self," *Journal of Consumer Research*, 15 (2), 139–168.

Bone, Sterling A., Glenn L. Christensen, and Jerome D. Williams (2014) "Rejected, Shackled, and Alone: The Impact of Systemic Restricted Choice on Minority Consumers' Construction of Self," *Journal of Consumer Research*, 41 (2), 451–474.

Bourdieu, Pierre (1984), *Distinction: A Social Critique of the Judgement of Taste*, Cambridge, MA: Harvard University Press.

Bourdieu, Pierre (1986). "The forms of capital," in *Handbook of Theory and Research for the Sociology of Education,* ed. John G. Richardson, New York: Greenwood, 241–258.

Caplovitz, David (1967), *The poor pay more: Consumer practices of low-income families*, New York: Free Press.

Castilhos, Rodrigo B. (2019), "Branded places and marketplace exclusion," *Consumption Markets and Culture*, 22 (5–6), 582–597.

Castilhos, Rodrigo. B. and Pierre-Yann Dolbec (2018), "Conceptualizing spatial types," *Marketing Theory*, 18 (2), 154–168.

Chase, Elaine and Robert Walker (2013), "The Co-construction of Shame in the Context of Poverty: Beyond a Threat to the Social Bond," *Sociology*, 47 (4), 739–754.

Cohen, Jodi R. (1997), Poverty : Talk , Identity , and Action. *Qualitative Inquiry*, 3 (1), 71–92.

Goffman, Erving (1963), *Stigma : Notes on the management of spoiled identity*, Englewood Cliffs. NJ: Spectrum.

Guillard, Valérie and Dominique Roux (2014), «De la pauvreté à l'excentricité: le glanage comme révélateur desmarges de la consommation». Économies et sociétés, Série KC, Études critiques en management,*ISMEA*, 48 (3), 117–142.

Hamilton, Kathy (2012), "Low-income Families and Coping through Brands: Inclusion or Stigma?," *Sociology*, 46 (1), 74–90.

Hamilton, Kathy and Miriam Catterall (2006), "Social Exclusion in a Consumer Society: Lone Mothers in the Uk Welfare State," in *Gender and Consumer Behavior,* Vol 8, ed. Lorna Stevens and Jane Borgerson, 268–282).

Hamilton, Kathy, Hilary Downey, and Miriam Catterall (2006)," A sheep in wolf's clothing: Exploring researcher vulnerability," in *Advances in Consumer Research*, Vol 33, ed. Connie Pechmann and Linda Price, 672–677, Duluth, MN : Association for Consumer Research.

Hebdige, Dick (2002). *Subculture: The meaning of style*, London: Routledge.

Hill, Roland P. (1995), "Researching sensitive topics in marketing: The special case of vulnerable populations," *Journal of Public Policy & Marketing*, 14 (1), 143–148.

Hill, Roland P. (2002), "Consumer Culture and the Culture of poverty: Implications for Marketing theory and Practice," *Marketing Theory*, 2 (3), 273–293.

Hogg, Margaret K., Emman N. Banister, and Christopher A. Stephenson (2009) "Mapping symbolic (anti-) consumption," *Journal of Business Research*, 62 (2), 148–159.

Holt, Douglas B. (1998), "Does Cultural Capital Structure American Consumption ?," *Journal of Consumer Research*, 25 (1), 1–25.

Kozinets, Robert V. and Jay M. Handelman (2004), "Adversaries of Consumption: Consumer Movements, Activism, and Ideology," *Journal of Consumer Research*, 31 (3), 691–704.

Miles, Matthew B. and Huberman, Michael A. (1994), *An expanded sourcebook: Qualitative data analysis*, London: Sage Publications.

Nau, Jean-Phillipe, Christian Derbaix, and Géraldine Thevenot (2016), "Market offers and the construction of a stigmatisedidentity: Insights from the case of motor-disabled persons," *Recherche et Applications En Marketing (English Edition)*, 31 (4), 47–64.

Oosterlynck, Stijn, Yuri Kazepov, Andreas Novy, Pieter Cools, and Eduardo Barberis, Florian Wukovitsh, Tatiana Sarius, and Bernard Leublot (2013), The butterfly and the elephant: local social innovation, the welfare state and new poverty dynamics. *ImPRovE Discussion Paper No. 13/03*, Antwerp: Herman Deleeck Centre for Social Policy-University of Antwerp

Paugam, Serge (1998), «Les formes contemporaines de la pauvreté et de l'exclusion. Le point de vue sociologique," *Genèses*, 31 (1), 138–159.

Reutter, Linda I., Miriam J. Stewart, Gerry Veenstra, Rhonda Love, Dennis Raphael, and Edward Makwarimba (2009), ""Who Do They Think We Are, Anyway?": Perceptions of and Responses to Poverty Stigma," *Qualitative Health Research*, 19 (3), 297–311.

Saatcioglu, Bige and Ozanne, Julie L. (2013), "A Critical Spatial Approach to Marketplace Exclusion and Inclusion," *Journal of Public Policy & Marketing*, 32(special issue), 32–37.

Sandikci, Özlem and Güliz Ger (2010), "Veiling in Style: How Does a Stigmatized Practice Become Fashionable?," *Journal of Consumer Research*, 37 (1), 15–36.

Simmel, Georg (1907/1998). *Les pauvres,* Paris: P.U.F. Quadrige;

Spiggle, Susan (1994). "Analysis and Interpretation of Qualitative Data in Consumer Research," *Journal of Consumer Research*, 21 (3), 491–504.

Thompson, Craig J., and Gokcen Coskuner-Balli (2007), "Countervailing market responses to corporate co-optation and the ideological recruitment of consumption communities" J*ournal of Consumer Research*, 34 (2), 135-152

Williams, Colin C. and Jan Windebank (2002), "The "excluded consumer": a neglected aspect of social exclusion?," *Policy & Politics*, 30 (4), 501–513.

Yurdakul, Dicle, Deniz Atik, and Nikhilesh Dholakia (2017), "Redefining the bottom of the pyramid from a marketing perspective," *Marketing Theory*, 17 (3), 289–303.

When Saying Less Tells More:
The Impact of Socio-Economic Status on Justifying Luxury Consumption

Goedele Krekels, IÉSEG School of Management, France
Sandor Czellar, HEC Lausanne, Switzerland
David Dubois, INSEAD, France
Gilles Laurent, ESSEC Business School, France
Bruno Kocher, University of Neuchâtel, Switzerland

INTRODUCTION

When a person sends a signal by using a luxury brand, another person may acknowledge receiving the signal. Will the signaler then offer a justification? And how will this justification (or lack of) be perceived? The answers depend on the socio-economic status of both the signaler and the receiver.

SOCIO-ECONOMIC STATUS (SES) AND LUXURY JUSTIFICATIONS

Most of the literature on luxury consumption has focused on the signaling function of brands in a typical one-directional format: either from the signaler's perspective, or from the perspective of the target who receives the signal (Connelly et al. 2011). This research has shown that signalers expect receivers to make certain inferences about their identities based on which possessions and brands they choose to display and how they display them (e.g. Belk, Bahn, and Mayer 1982; Berger and Heath 2007; Dubois, Rucker, and Galinsky 2012; Wang and Griskevicius 2014). Furthermore, how receivers interpret such signals is based on a combination of the signal itself and of the signaler's characteristics (e.g. Bellezza, Gino, and Keinan 2014; Shalev and Morwitz 2012; Sirgy 1982).

However, the literature has neglected possible bi-directional effects. If the receiver indicates he or she has received the luxury signal, how does the original signaler respond? Through five studies we examine whether the original signaler offers a justification for the origin of the luxury product, and how this justification (or lack thereof) is received by the recipient. Most research on luxury justification has focused on self-justification. This includes consumers' tendency to construct a pre-purchase internal justification to allow for indulgent spending or consumption (Cheema and Soman 2006, Dubois, Laurent, and Czellar 2001, Kunda 1990, Okada 2005) or consumers' internal post-purchase reasoning aimed at justifying past indulgent expenses to reduce cognitive dissonance (Oxoby 2004, Mitchell and Boustani 1994).

In this research, however, we examine whether the original luxury signaler provides a justification to the person who has acknowledged receiving the signal, and the content of this justification. Given the lack of research on the topic, the five studies presented here offer a first investigation of how the original receiver of the luxury signal reacts to the presence or absence of a justification, and of the form it takes. More specifically, we examine the impact of socio-economic status (SES) on justifications and on the interpretation of justifications.

Research has shown that consumers with high socio-economic status (SES) are less likely to engage during social interactions (Kraus and Keltner 2009) and see less motivational relevance in other people (Dietze and Knowles 2016). Furthermore, high SES people should also be more familiar and experienced with luxury consumption, making a current luxury consumption less exceptional and therefore less noteworthy to them (Adler, Epel, Castellazzo, and Ickovics 2000). Thus, we predict that people with high SES would not justify their luxury consumption to a conversation partner.

There is only limited research on luxury conversations by consumers with lower SES. We do know that people are embarrassed when their identity signal (here, their public consumption of a luxury product) and their beliefs about themselves (here, their low SES) are incongruent (Cavanaugh, Nunes, and Han 2016). To solve this incongruence, people with a lower SES may offer some justification for the ownership of the luxury product. This could be seen as a type of impression management for low SES consumers (Schlenker 1980). Thus, we predict a general main effect of consumer SES, where a lower SES would lead to an increased likelihood of justification. Second, if justifying luxury could indeed be seen as a type of impression management, one could also predict that the social status of the receiver might influence the luxury consumer's justification. In fact, we predict that low SES consumers might feel more incongruence between their own status and their signal with a high-status conversation partner, and this might make them more likely to justify their luxury consumption. We predict the opposite effect with a low-status conversation partner, where the luxury signaler might be less likely to justify to distinguish themselves (Stephens, Markus and Townsend, 2007).

Five studies test the general prediction that a decrease in SES leads to an increase in justification of luxury consumption, due to impression management. In the fifth study we also examine if this main effect indeed depends on the SES of the conversation partner.

STUDY 1 – WHO JUSTIFIES?

A first study examined whether people do in fact justify luxury consumption and what types of justification they use. A sample of 379 Mturkers (132 Men, M_{age} = 36.7) participated in a scenario study. They read a scenario in which they attended a social gathering during which an unfamiliar person recognizes their luxury wristwatch and enquires whether it is a specific brand and model. Respondents then saw an open-ended question in which they were prompted to reply to the other person. Afterwards they completed measures on how they thought the other person would perceive them, and answered questions related to materialism (Richins and Dawson 1992), status consumption (Eastman et al. 2015), and social comparison (Gibbons and Buunk 1999). Respondents also indicated their SES both subjectively, with the MacArthur ladder question (Adler et al. 2000), a direct social class question (Jackman 1979), perceived financial security (Mittal and Griskevicius 2016) and perceived status (four items, e.g. "I have high social status") and objectively (measured as annual household income and education level).

Answers to the open-ended scenario question indicated that most respondents merely acknowledged the watch model (60%). Some respondents did justify their ownership of the watch as a gift or bonus (17%), inheritance (2%) or by indicating they borrowed it for the evening (1%). Other responses included claims of big discounts (3%) or counterfeit watches (5%). Logistic regression on these responses indicated that people high in subjective but not objective SES were more likely to purely acknowledge the watch without giving any justification (e.g. effect of perceived status B = -.260, SE = .082, Wald χ^2 (1) = 10.192, p = .001). Furthermore, those who gave

no justification for owning the watch believed this to indicate marginally less embarrassment ($M = 2.72$, $SD = 1.40$ versus $M = 3.00$, $SD = 1.26$, $t(337) = -1.735$, $p = .084$). This effect was reinforced by interactions with individual difference variables: the higher the respondent's materialism ($p = .011$), status consumption ($p = .026$) or social comparison propensity ($p = .057$), the stronger the effect of subjective SES on lack of justification. This is a first indication that impression management might be at play.

STUDY 2 – WHO JUSTIFIES WHEN?

In a second study, we wanted to confirm this lack of justification by high SES people. One reason for the high amount of mere acknowledgements in the first study could have been the lack of knowledge about the origin of the watch. Therefore, this time re-

FIGURE 1: Effect of Materialism and SES on the Likelihood to Justify

spondents were given an explicit origin for the luxury watch. A sample of 320 Mturkers (125 Men, $M_{age} = 37.7$) saw the same scenario as in the previous study, but were either told that they received the watch as an inheritance from family (ascribed condition) or as a professional performance bonus at work (acquired condition). After the scenario and purchase manipulation, respondents were asked whether they would justify their ownership of the watch ("Yes, it is indeed this brand. I received a family inheritance/professional performance bonus from my company") or not justify it but merely acknowledge it ("Yes, it is indeed this brand"). Respondents answered the same personality questions, individual difference measures and SES items as in study 1.

Results indicate that people were more likely to justify their ownership of the luxury watch in the acquired condition than in the ascribed condition (B = .572, SE = .233, Wald χ^2 (1) = 6.036, $p = .014$), in line with impression management. Furthermore, supporting the results from the first study, people scoring high on subjective SES were again less likely to offer a justification, regardless of the condition (e.g. effect of perceived status B = -.215, SE = .103, Wald χ^2 (1) = 4.312, $p = .038$). In both conditions we found that not giving a justification was thought to indicate less embarrassment ($M = 2.70$, $SD = 1.36$ versus $M = 3.10$, $SD = 1.34$, $t(312) = 2.54$, $p = .012$). Furthermore, the justification (or lack of it) mediated the effect of the subjective SES on embarrassment (b = .04, 95% CI .09 – .005, $t= 2.21$, $p < .05$). Thus, in both studies are people with low SES more likely to justify the consumption of a luxury watch in public, and a lack of justification is thought to indicate less embarrassment.

STUDY 3 – CAN PEOPLE PREDICT THE CONSEQUENCES OF JUSTIFICATION?

In a third study, we examined how luxury consumers predict that their justification (or lack of) will be interpreted. If impression management drives the justification of luxury, consumers should have specific predictions that could lead to a positive impression for a lack of justification. A sample of 184 Mturkers (64 Men, $M_{age} = 39.1$) read a similar scenario as in the previous studies. They were assigned to one of three conditions where they either did not justify wearing the watch (lack of justification condition) or justified it through an inheritance (ascribed condition) or work performance bonus (acquired condition). Afterwards, participants were asked to predict how their conversation partner would perceive their personality and subjective SES as well as their perceptions of the luxury watch. We also measured their self-image through self-esteem (Rosenberg 1965) and need for power (Anderson, John, and Ketlner 2012).

Respondents who gave a justification for wearing a luxury watch inferred that they would be perceived as having a lower SES (e.g. ladder score $M = 7.06$, $SD = 1.87$ vs. $M = 5.55$, $SD = 1.66$, $t(180) = 3.54$, $p = .003$) and being more embarrassed ($M = 1.53$, $SD = .89$ versus $M = 2.30$, $SD = 1.57$, $t(183) = 2.71$, $p < .001$) than those who did not justify. However, interaction effects with individual difference variables showed that justifying the luxury product might also have positive effects. In both justification conditions, a more positive self-image increased predicted status perception (e.g. effect of justification by self-esteem $F(1, 180) = 6.97$, $p < .05$) and decreased predicted perception of embarrassment (e.g. effect of justification by self-esteem $F(1, 176) = 3.95$, $p < .05$) to the same level as those in the justification condition. Furthermore, a positive self-image also led to predictions of being perceived as a more agreeable person (e.g., effect of justification by self-esteem on liking $F(3, 178) = 1.499$, $p < .05$) in the case of a justification.

STUDY 4 – WHAT ARE THE CONSEQUENCES OF A JUSTIFICATION?

A fourth study focused on the other side of the communication dyad: the target who receives first the signal then the justification. In this study we wanted to examine how luxury signalers are judged depending on the justification (or lack of) they offer. If the decision whether to offer a justification is a form of impression management, it is essential that the impression one wants to give is correctly iden-

TABLE 1 Effect of Signal Receiver's Self-esteem and Justification on Product Attitudes

	Beta	SE	*T*	*p*
Constant	4.947	1.031	4.800	.000
Justfication	1.180	.659	1.789	.797
Self-esteem	.060	.233	.258	.075
Justification * Self-esteem	-.310	.148	2.101	.037
F (df)	11.818 (3, 178)			
R²	.166			

tified. Thus, instead of signalers predicting how their justification (or lack of) could be perceived, we actually measure how the receiver perceives it. A sample of 187 Mturkers (87 Men, M_{age} = 37.3) read a scenario similar to those in the previous studies, but from the perspective of the person who recognizes the brand and type of the luxury watch of their conversation partner. They saw one of three conditions from the previous study: lack of justification, ascribed condition, and achieved condition. Afterwards, respondents indicated their perception of the signaler's personality and subjective SES as in previous studies as well as their perceptions of the luxury watch and the self-image measures.

Signalers who gave no justification for wearing a luxury watch were perceived as having a higher SES than those who did justify (e.g., status ladder score *M* = 8.33, *SD* = 1.00, vs. *M* = 8.05, *SD* = .73, *t*(97.389) = 2.545, *p* = .013). In line with signalers' expected positive perceptions in the previous study, interaction effects with the individual difference variables showed that justifying the luxury product might have positive effects. Receivers with a more positive self-image (measured through self-esteem and sense of power) indicated more positive product attitudes and better personality impressions in both justification conditions compared to the lack of justification condition (e.g. effect of justification by sense of power *F*(3, 178) = 11.818, *p* = .037).

STUDY 5 – WHO JUSTIFIES TO WHOM?

In the fifth and final study, we examined the impact of the receiver SES on the likelihood of offering a justification. If luxury justification could be a type of impression management, the social status of the receiver should influence signaler's justification. We predict that a lower SES individual might be more likely to offer a justification to reduce their incongruence in the eyes of a high-status receiver, but less likely to offer a justification to a similarly low-ranked individual, to distinguish themselves. A sample of 185 business school students (75 Men, M_{age} = 21.4) read a scenario similar to those in the previous studies, from the perspective of the person wearing the watch. They saw one of two conditions: either their conversation partner was a medical doctor earning a high income, or a sales worker owning a low income. Afterwards, they indicated how likely they were to justify wearing the watch, and indicated their own subjective SES as in previous studies, as well as that of the other person as a successful manipulation check. Finally, they responded to an "impostor syndrome from luxury consumption" scale (Goor et al. 2019) as a measure of incongruence between their luxury signal and their SES.

Results indicated a marginally significant interaction effect between signalers' and receivers' SES on the likelihood of offering a justification (B = -.242; SE = .135, *t*(181) = -1.797, *p* = .074). Respondents with a low SES were more likely to justify their luxury consumption to a high SES receiver than to a low SES receiver, in line with our predictions. The likelihood of a high SES respondent offering a justification, however, was independent of the receiver's SES. This interaction was mediated by impostor feelings for low but not high SES consumers (-1SD: B = .162, CI = .016 to .187; +1SD: B = -.097, CI = -.327 to .086; Index = -.113, CI = -.292 to -.001). Thus, it seems that impression management is indeed especially important among low SES luxury consumers.

CONCLUSION

These five studies are the first to examine how a signaler reacts to a receiver's inquiry about a luxury signal, and how this reaction in turn may influence the receiver's perception of the signaler. We show that people low in SES are more likely to justify their consumption of a luxury product in public when asked about it, though they are aware that they might give away their lower social status that way. However, interactions with the signaler's and receiver's personality might lead to positive effects of justifications, resulting in more positive perceptions of product and personality. Furthermore, in line with impression management theories, this justification effect only exists for high SES receivers but disappears for low SES receivers.

REFERENCES

Adler, N. E., Epel, E. S., Castellazzo, G., & Ickovics, J. R. (2000). Relationship of subjective and objective social status with psychological and physiological functioning: Preliminary data in healthy, White women. *Health psychology*, *19*(6), 586.

Anderson, C., John, O. P., & Keltner, D. (2012). The personal sense of power. *Journal of personality*, *80*(2), 313-344.

Belk, R. W., Bahn, K. D., & Mayer, R. N. (1982). Developmental recognition of consumption symbolism. *Journal of consumer research*, *9*(1), 4-17.

Bellezza, S., Gino, F., & Keinan, A. (2013). The red sneakers effect: Inferring status and competence from signals of nonconformity. *Journal of Consumer Research*, *41*(1), 35-54.

Berger, J., & Heath, C. (2007). Where consumers diverge from others: Identity signaling and product domains. *Journal of Consumer Research*, *34*(2), 121-134.

Cavanaugh, L. A., Nunes, J. C., & Han, Y. J. (2016). Please Don't Praise It: How Compliments on Identity Signals Result in Embarrassment. in Proceedings of the Society for Consumer Psychology 2017 Winter Conference, ed. Kate White and On Amir, San Francisco, CA: Society for Consumer Psychology, 34.

Cheema, A., & Soman, D. (2006). Malleable mental accounting: The effect of flexibility on the justification of attractive spending and consumption decisions. *Journal of Consumer Psychology*, *16*(1), 33-44.

Connelly, B. L., Certo, S. T., Ireland, R. D., & Reutzel, C. R. (2011). Signaling theory: A review and assessment. *Journal of management*, *37*(1), 39-67.

Dietze, P., & Knowles, E. D. (2016). Social class and the motivational relevance of other human beings: Evidence from visual attention. *Psychological Science*, *27*(11), 1517-1527.

Dubois, B., Laurent, G. & Czellar, S., (2006). How Do Consumers Overcome Ambivalence toward Hedonic Purchases? A Typology of Consumer Strategies. *Working paper*.

Dubois, D., Rucker, D. D., & Galinsky, A. D. (2011). Super size me: Product size as a signal of status. *Journal of Consumer Research*, *38*(6), 1047-1062.

Eastman, J. K., Fredenberger, B., Campbell, D., & Calvert, S. (1997). The relationship between status consumption and materialism: a cross-cultural comparison of Chinese, Mexican, and American student. *Journal of Marketing Theory and Practice*, *5*(1), 52-66.

Gibbons, F. X., & Buunk, B. P. (1999). Individual differences in social comparison: development of a scale of social comparison orientation. *Journal of Personality and Social Psychology*, *76*(1), 129.

Goor, D., Ordabayeva, N., Keinan, A., & Crener, S. (2019). The Impostor Syndrome from Luxury Consumption, *Journal of Consumer Research*, ucz044, https://doi.org/10.1093/jcr/ucz044

Jackman, M. R. (1979). The Subjective Meaning of Social Class Identification inthe United States. *Public Opinion Quarterly*, *43*(4), 443-462.

Kivetz, R., & Zheng, Y. (2006). Determinants of justification and self-control. *Journal of Experimental Psychology: General*, *135*(4), 572.

Kunda, Z. (1990). The case for motivated reasoning. *Psychological bulletin*, *108*(3), 480.

Kraus, M. W., & Keltner, D. (2009). Signs of socioeconomic status: A thin-slicing approach. *Psychological Science*, *20*(1), 99-106.

Mitchell, V. W., & Boustani, P. (1994). A preliminary investigation into pre-and post-purchase risk perception and reduction. *European Journal of Marketing*, *28*(1), 56-71.

Mittal, C., & Griskevicius, V. (2016). Silver spoons and platinum plans: How childhood environment affects adult health care decisions. *Journal of Consumer Research*, *43*(4), 636-656.

Okada, E. M. (2005). Justification effects on consumer choice of hedonic and utilitarian goods. *Journal of Marketing Research*, *42*(1), 43-53.

Oxoby, R. J. (2004). Cognitive dissonance, status and growth of the underclass. *The Economic Journal*, *114*(498), 727-749.

Richins, M. L., & Dawson, S. (1992). A consumer values orientation for materialism and its measurement: Scale development and validation. *Journal of Consumer Research*, *19*(3), 303-316.

Rosenberg, M. (1965). Rosenberg self-esteem scale (RSE). *Acceptance and commitment therapy. Measures package*, *61*(52), 18.

Schlenker, B. R. (1980). *Impression management*. Brooks/Cole Publishing Company.

Shalev, E., & Morwitz, V. G. (2012). Influence via comparison-driven self-evaluation and restoration: the case of the low-status influencer. *Journal of Consumer Research*, *38*(5), 964-980.

Sirgy, M. J. (1982). Self-concept in consumer behavior: A critical review. *Journal of consumer research*, *9*(3), 287-300.

Stephens, N. M., Markus, H. R., & Townsend, S. S. (2007). Choice as an act of meaning: the case of social class. *Journal of Personality and Social Psychology*, *93*(5), 814.

Wang, Y., & Griskevicius, V. (2014). Conspicuous consumption, relationships, and rivals: Women's luxury products as signals to other women. *Journal of Consumer Research*, *40*(5), 834-854.

I Don't Own It But It's Mine
The Impact of Materialism on Perceived Ownership of Rented Luxury

Goedele Krekels, IÉSEG School of Management, France
Bruno Kocher, University of Neuchâtel, Switzerland
Sandor Czellar, HEC Lausanne, Switzerland
Brigitte Müller, IAE De Toulon, France

INTRODUCTION

Renting luxury products has become a new trend. Due to their high need for ownership, literature theorizes that materialists should react negatively to renting. We demonstrate that high (low) materialists in fact feel an identical (higher) perceived ownership of and attitude towards bought versus rented luxury, because of brand attachment.

RENTING LUXURY AND MATERIALISM

Recently, new forms of acquisition such as renting luxury products gained traction in the sector, rendering luxury consumption no longer limited to the highest social classes. In general, renting produces positive effects on cognitive dissonance, self-exploration, budgeting and convenience (e.g. Yeoman, 2011). However, since renting means using the object for a limited time, it might not become part of the extended self (Belk, 1988), decreasing a sense of ownership and hence having a less positive effect on perceptions (Perkins and Forehand, 2012). Furthermore, renting *luxury* may blur the signaling power of luxuries (Wilcox, Kim, and Sen, 2009), making them less exclusive (Yeoman, 2011).

We argue that materialism, which denotes a set of centrally held beliefs about the importance and pursuit of possessions and wealth in one's life (Ger and Belk, 1996; Kasser, 2002), will play a key role in consumer response to how luxury product are acquired. According to literature, since possessiveness and control of ownership are important to materialists, materialists might react negatively to rented luxury (Belk, 1985). We predict however that materialists might actually become attached to the rented luxury objects and in turn construct a sense of perceived ownership leading to an equally positive reaction to rented and bought luxury.

There is strong evidence in the literature that materialistic consumers suffer from a lower self-esteem (e.g. Chaplin and John 2007; Kasser 2002), which they try to compensate through the consumption of luxury goods that can signal status and prestige (Dittmar, 1992, Kasser & Ryan, 1993), forming strong attachment to these luxury objects (Escalas and Bettman 2003; Richins and Dawson 1992). However, for these luxury product associations to bolster materialists' self-esteem and become part of their self-identity, they need to be perceived as 'mine' (Park and John 2010; Pierce, Kostova, and Dirks 2003; Weiss and Johar 2016). There are two routes to ownership: actual legal ownership, which is impossible in the case of renting, but also non-legal psychological ownership (Peck and Shu 2009; Pierce, Kostova, and Dirks, 2003). As psychological ownership is based on the strong connection and incorporation into the self of the object and its associations (Belk, 1988; Dittmar, 1992; Pierce, Kostova, and Dirks 2003), we believe that materialistic people's strong attachment to luxury might result in a sense of psychological ownership despite a lack of legal ownership in the case of renting. Thus, through a mechanism of brand attachment and perceived ownership, materialists might not experience many consumption differences between rented and bought luxury. However, as non-materialists' self-identity is less likely to encompass luxury, they will react more objectively to rented luxury, do not create attachment to or a sense of ownership over the product, and in turn have less positive reactions to rented than bought luxury.

We examine the positive impact of renting luxury on ownership for materialistic consumers (study 1) due to brand attachment (study 2). We test 2 boundary conditions of brand attachment (studies 3 and 4), showing that it is indeed attachment to the rented luxury that drives the effect. Finally, we investigate the impact of acquisition mode and materialism on managerially relevant outcomes (study 5).

STUDY 1 – IMPACT OF MATERIALISM ON RENTAL OWNERSHIP

In a first study, we examined the general impact that materialism has on the perceived ownership of rented and bought luxury goods. To test whether our predicted effects would hold for the target consumers of these luxury rental companies, in collaboration with a high-end watch and jewelry brand that was interested in new types of retailing strategies we employed 435 members of a national service organization (392 men, M_{age} = 57, SD = 11, M_{yearly_income} = [150,000 - 200,000 USD]). Respondents read a watch-shopping scenario in which they either bought or rented a luxury watch. To ensure respondents thoroughly read and visualized themselves in this scenario, participants spent several minutes answering an open–ended question in which they were asked to describe their feelings, emotions or thoughts that came to mind when they thought about wearing the watch. Afterwards, they indicated their sense of ownership over the watch (Peck and Shu, 2009) and answered the Material Values Scale (Richins and Dawson, 1992). We found the predicted interaction effect between materialism and acquisition mode on sense of ownership (β = -.265, t(430) = -2.045, p = .042): the more materialistic a participant, the less differences in perceived ownership were observed for a rented vs. bought watch (JN-value = 6.51). This study demonstrate that an increase in consumer materialism level increases the likelihood of viewing a rented (vs. bought) luxury product equally in terms of ownership.

STUDY 2 – THE IMPACT OF BRAND ATTACHMENT

In study 2 we directly examine why materialistic consumers process rented objects as owned objects by testing the underlying driver of brand attachment, and enhance the external validity of our effect by examining real behavior rather than using a scenario. 201 Students from a large university (94 men, M_{age} = 21.3, SD = 2.9) participated in a 3-day incentive compatible lab study. On the first day, participants were given an existing luxury pencil from a well-known luxury stationery brand, priming the luxury status of the brand and product. They were instructed that as part of the study, they would have to pay to rent or buy this luxury pencil. Respondents in the renting condition were emphasized that their rental period would be the two days in between stage 1 and stage 2 of the lab sessions, and that they would have to give the pencil back at the end of phase 2. Respondents in the buying condition were clearly instructed that the pen was theirs and they got to keep it, but that they had to bring it with them for phase 2. This was done to keep the physical proximity of the luxury pencil constant across conditions in the second stage.
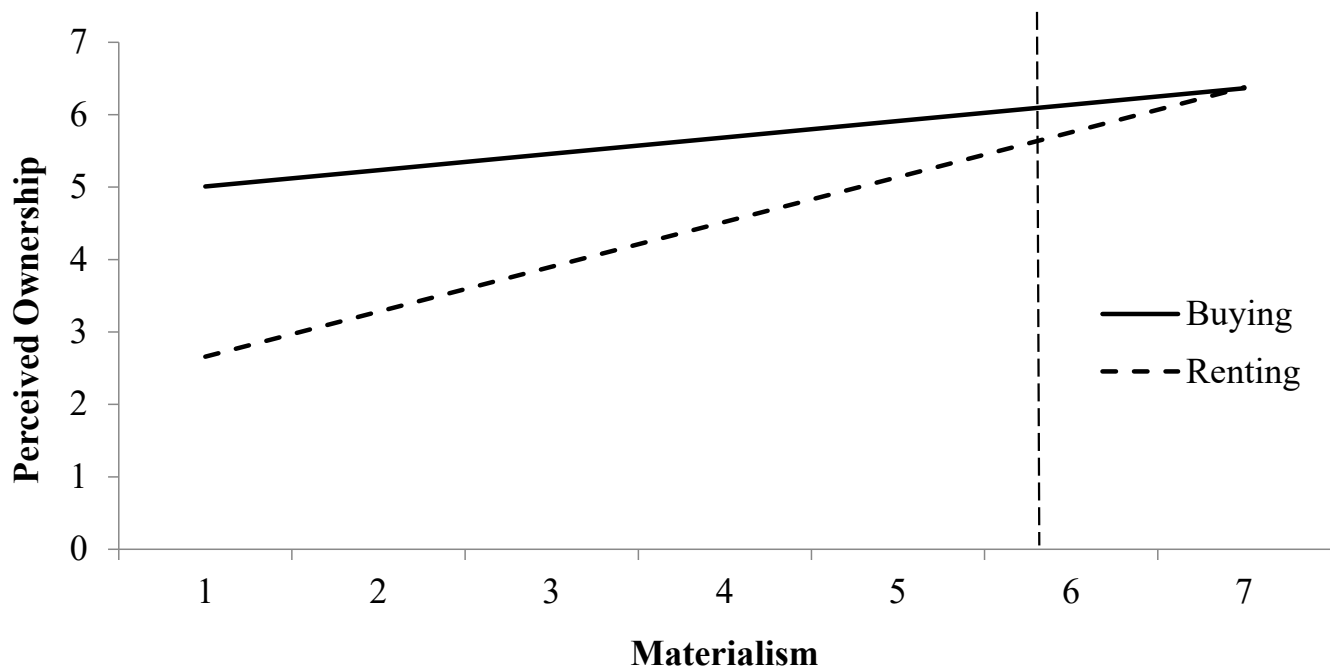
Figure 1 - Effect of Acquisition Mode and Materialism on Ownership

When respondents returned 2 days later, they indicated their brand attachment to the luxury pencil (Escalas and Bettman 2003), sense of ownership over the pencil (Paundra et al. 2017), and answered the Material Values Scale (Richins and Dawson, 1992) amongst other measures. Those who rented the pencil also had to return it at the end of phased 2.

A regression showed that materialism again moderated the effect of acquisition mode on perceived ownership (β = .61, t(198) = 2.58, p = .011, JN = 4.89) (figure 1). The more materialistic the participant, the less difference perceived by that individual with regards to the ownership of a rented (vs. bought) pencil. Furthermore, brand attachment mediated this moderation effect (Index = -.150, CI = -.331 to -.028), in line with our predictions.

STUDY 3 – DECREASING ATTACHMENT TO PRODUCT TYPE (LUXURY VS. NON-LUXURY)

In study 3, we further examined brand attachment as the underlying explanation of this positive effect of renting for higher (vs lower) materialistic consumers by testing a theoretical boundary condition. To do so, we investigated both luxury and non-luxury products. As non-luxury products do not help materialistic people enhance their self-identity and self-esteem through consumption, there is no reason for them to become attached to these products, and construe the rental of non-luxury products in line with owned products. We followed the same scenario design as in study 1 and added a non-luxury condition. The results from 742 online participants (308 Men, Mage = 39.7, SD = 11.0) showed a marginally significant three-way interaction, indicating that in the non-luxury condition all respondents felt more ownership of bought than rented products, indicating only a main effect of ownership and no interaction with materialism (β = .08, t(346) = .40, p = .688). In the luxury condition, we replicated the results from study 1 and 2, showing that materialism moderated the effect of acquisition on the sense of ownership, such that high (low) materialists felt similar (lower) sense of ownership

in the renting condition as in the buying condition (β = .50, t(394) = 3.04, p = .002).

The analyses confirm that the more materialistic consumers are, the less they perceive a difference in ownership between rented and bought luxury products. The results also indicate that decreasing the product associations needed for materialists' self-identity boost, hence the attachment to a certain product, indeed diminishes the inclination to view renting as a form of ownership for highly materialistic consumers. Taken together, the results of this study provide support for brand attachment as an underlying process behind the interaction effect between materialism and the acquisition mode on perceived ownership for luxury products.

STUDY 4 – DECREASING ATTACHMENT THROUGH INCREASING SELF-ESTEEM

In study 4, we expand the support for brand attachment by examining a second theoretically-relevant boundary condition: self-esteem. As stated, previous literature has shown that materialistic people use conspicuous consumption to cope with low self-esteem (Kasser 2002; Richins and Dawson 1992). Therefore, increasing consumer self-esteem may decrease the attachment to luxury products for higher (vs. lower) materialist consumers, and should decrease their psychological ownership. A sample of 884 online participants (342 men, Mage = 37.1, SD = 11.8) listed either four (easy, self-affirming) or twelve (hard, not self-affirming) positive characteristics of themselves (pretested to manipulate self-esteem), followed by the design of study 1b. The results showed a marginally significant three-way interaction (β = .370, t(882) = 1.750, p = .081). In the weak self-affirmation condition, we again replicated the effects from study 1, 2 and 3 (β = .545, t(394) = 3.589, p = .004): materialism significantly influenced sense of ownership for those who rented the product, and for highly materialistic consumers there was no difference between renting and buying. In the strong self-affirmation condition however, where materialistic respondents no longer suffered from a low self-esteem,cthere was only the main effect of acquisition mode but no

moderating influence of materialism on the effect of renting versus buying on ownership ($\beta = .175$, $t(464) = 1.187$, $p = .236$).

This study again supports the moderating effect of materialism on the relationship between the acquisition mode and perceived ownership of luxury products. Given the fact that highly materialistic consumers tend to suffer from chronically low self–esteem (Chaplin and John 2007; Sivanathan and Pettit 2010), the weak self–affirmation condition was similar to their standard level of well–being, leading to in increased sense of ownership of rented objects through brand attachment. In the strong self–affirmation condition however, consumers' self–esteem was boosted, in turn reducing their attachment to luxury rentals and in turn their sense of ownership. Overall, this study further supports our argument that brand attachment may drive the interaction between materialism and the effect of the acquisition mode on perceived ownership.

STUDY 5 – MANAGERIAL CONSEQUENCES

In Study 5, we explore the downstream consequence of our theorizing. Research on the endowment effect has shown that the sense of owning an object, even without real ownership, produces a strong positive effect on product attitudes (Beggan 1992, Perkins and Forehand 2012). Therefore, we investigated product attitude as the

CONCLUSION

Globally, our findings indicate luxury rentals as a viable new alternative mode of access to luxuries, besides currently used strategies such as masstige products. The finding that renting and buying luxury produces similar positive effects for more materialistic consumers, coupled with the fact that our current societies are becoming increasingly materialistic (Burroughs et al. 2013), leads us to believe that luxury rentals represent an important potential consumer market. Furthermore, considering the impact of materialism on renting luxury not only has practical implications, but also advances theoretical insights. We add to the materialism literature, corroborating previous theorizing on materialism as a motivated goal pursuit and indicating that renting luxury is a goal-oriented behavior for materialistic consumers, showing that usage rather than ownership of luxury items may be key for materialists' self-identity. Further, we extend the literature on solid versus liquid consumption, indicating that the difference between the two might not just be a theoretical construct, but that one might on fact be mentally construed as the other and vice versa based on consumers' needs. Finally, we add to the literature on ownership, indicating renting as a possible source of psychological ownership identical to buying, but also showing that

Study 4 - Effect of Acquisition Mode by Materialism and Self–Affirmation on Ownership

	β	SE	t	p
Constant	4.400	.907	4.853	.000
Acquisition mode	−1.820	1.295	−1.405	.161
Materialism	.349	.231	1.514	.130
Self–affirmation	−.276	.592	−.466	.641
Acquisition mode x Materialism	−.195	.332	−.589	.556
Acquisition mode x Self–affirmation	−.920	.827	−1.113	.266
Materialism x Self–affirmation	.047	.151	.309	.757
Acquisition mode x Materialism x Self–affirmation	.370	.212	1.750	.081
F (df)	57.471 (7, 876)			
R²	.31			

psychological ownership may be a discriminating process based on motivation besides only context clues.

key downstream construct. 204 students (113 men, Mage = 21.15, SD = 2.11) saw the same design as in Study 1b. They also indicated their attitude towards the product. A moderated mediation analysis showed that buying luxury led to higher product attitudes than renting moderated by respondents' materialism as in previous studies, and fully mediated by sense of ownership (Index = -.11, CI = -.02 to -.24).

The results of this study again confirm our main hypothesis: more materialistic people perceive less of a difference in ownership between rented and bought luxury products. Furthermore, we show that this effect is not only limited to the psychological concept of perceived ownership, but that it also influences consumption-relevant outcomes such as product attitudes. As product attitudes have been shown to influence consumer behaviors such as product valuation, purchase intention, willingness to pay and brand loyalty (e.g., Perkins and Forehand 2011), this study broadens the scope of our findings.

REFERENCES

Beggan, J. K. (1992). On the social nature of nonsocial perception: The mere ownership effect. *Journal of personality and social psychology*, *62*(2), 229.

Belk, R. W. (1985). Materialism: Trait aspects of living in the material world. *Journal of Consumer research*, *12*(3), 265-280.

Belk, R. W. (1988). Possessions and the extended self. *Journal of consumer research*, *15*(2), 139-168.

Burroughs, J. E., Chaplin, L. N., Pandelaere, M., Norton, M. I., Ordabayeva, N., Gunz, A., & Dinauer, L. (2013). Using motivation theory to develop a transformative consumer research agenda for reducing materialism in society. *Journal of Public Policy & Marketing*, *32*(1), 18-31.

Chaplin, L. N., & John, D. R. (2007). Growing up in a material world: Age differences in materialism in children and adolescents. *Journal of consumer research*, *34*(4), 480-493.

Dittmar, H. (1992). *The social psychology of material possessions: To have is to be.* Harvester Wheatsheaf and St. Martin's Press.

Dittmar, H., & Pepper, L. (1994). To have is to be: Materialism and person perception in working-class and middle-class British adolescents. *Journal of economic psychology*, *15*(2), 233-251.

Doosje, B., Spears, R., & Koomen, W. (1995). When bad isn't all bad: Strategic use of sample information in generalization and stereotyping. *Journal of Personality and Social psychology*, *69*(4), 642.

Escalas, J. E., & Bettman, J. R. (2003). You are what they eat: The influence of reference groups on consumers' connections to brands. *Journal of consumer psychology, 13(3),* 339-348.

Ger, G., & Belk, R. W. (1996). Cross cultural differences in materialism. *Journal of economic psychology*, *17*(1), 55-77.

Grewal, R., Mehta, R., & Kardes, F. R. (2004). The timing of repeat purchases of consumer durable goods: The role of functional bases of consumer attitudes. *Journal of Marketing Research*, *41*(1), 101-115.

Kasser, T. (2002). *The high price of materialism*. MIT press.

Kasser, T., & Ryan, R. M. (1993). A dark side of the American dream: Correlates of financial success as a central life aspiration. *Journal of personality and social psychology, 65(2),* 410.

Park, J. K., & John, D. R. (2010). Got to get you into my life: Do brand personalities rub off on consumers. *Journal of consumer research, 37(4),* 655-669.

Paundra, J., Rook, L., van Dalen, J., & Ketter, W. (2017). Preferences for car sharing services: Effects of instrumental attributes and psychological ownership. *Journal of environmental psychology*, *53*, 121-130.

Peck, J., & Shu, S. B. (2009). The effect of mere touch on perceived ownership. *Journal of consumer Research*, *36*(3), 434-447.

Perkins, A. W., & Forehand, M. R. (2012). Implicit self-referencing: The effect of nonvolitional self-association on brand and product attitude. *Journal of Consumer Research*, *39*(1), 142-156.

Pierce, J. L., Kostova, T., & Dirks, K. T. (2003). The state of psychological ownership: Integrating and extending a century of research. *Review of general psychology, 7(1),* 84-107.

Richins, M. L. (1994). Special possessions and the expression of material values. *Journal of consumer research*, *21*(3), 522-533.

Richins, M. L., & Dawson, S. (1992). A consumer values orientation for materialism and its measurement: Scale development and validation. *Journal of consumer research*, *19*(3), 303-316.

Richins, M. L., & Rudmin, F. W. (1994). Materialism and economic psychology. *Journal of Economic Psychology*, *15*(2), 217-231.

Sivanathan, N., & Pettit, N. C. (2010). Protecting the self through consumption: Status goods as affirmational commodities. *Journal of Experimental Social Psychology*, *46*(3), 564-570.

Wilcox, K., Kim, H. M., & Sen, S. (2009). Why do consumers buy counterfeit luxury brands?. *Journal of marketing research*, *46*(2), 247-259.

Yeoman, I. (2011). The changing behaviours of luxury consumption. *Journal of Revenue and Pricing Management*, *10*(1), 47-50.

Motives For Anonymous Gift-giving and Its Beneficiaries

Sarah Marth, University of Applied Sciences Wiener Neustadt, Austria
Barbara Hartl, Danube University Krems & Vienna University of Economics and Business, Austria
Eva Hofmann, Vienna University of Economics and Business, Austria
Elfriede Penz, Vienna University of Economics and Business, Austria

INTRODUCTION

The literature on gift-giving in recent years answered many questions. For instance: who are the *givers* and what are the motives behind gift-giving and re-gifting (Ballantine & Parsons, 2011; Segev, Shoham, & Ruvio, 2013) and how gifting can act as symbolic communication between *giver* and *recipient* (Sherry, 1983) and therefore indicate goodwill in a relationship (Caplow, 1982). Thereby, this research primarily focused on the giving aspect and hence, the *giver* of gifts. Gift-giving takes many different forms, starting with gifts that are given privately and directly, such as gifts for Christmas or birthdays, up to and including gift-giving in the form of charitable donations (Sherry, 1983). In all these acts of giving that research has focused on thus far, it is clear that the recipient is chosen deliberately. Either the giver shares a personal relationship with the recipient, or is giving to a particular group of people (e.g. victims of a natural disaster) for whom someone (e.g., organizations) is requesting donations. However, there are also forms of gift-giving which build upon the idea of giving to an unknown recipient without the need to ask for it. One example gaining increasing attention in the last couple of years are so-called public bookcases. These are used to give away unneeded books (gift-giver) but of which may be of some interest to others (recipients). Another novel example are food-sharing initiatives where people provide food in public areas for others to take (LittleFreePantry, n.d.). The aim of this current paper is to focus on emerging ways of gifting unknowns, using the example of public bookcases, to discover the motives behind utilizing this practice of giving and also to take a deeper look at the beneficiaries (recipients) of this new form of consumption.

THEORETICAL BACKGROUND

Public bookcases are boxes or some similar sort of bookcase that is publicly accessible allowing the placement and exchange of books, and providing a free, anonymous manner to give away, share and obtain access to books. In recent years, public bookcases have been widely implemented throughout Europe and especially in German speaking countries. For example, according to the website open-bookcase.org a total number of 4,228 public bookcases worldwide have been reported (OpenBookCase.org, n.d.). In Vienna, Austria, approximately 60 public bookcases and other public book sharing possibilities can be found. While the bookcases are mostly provided by associations, private initiatives or the city administration, it is upon private citizens to place, exchange and take books from the bookcase.

Regarding the process of using a public bookcase the well-researched motivations for gift-giving fall short here. The process of gift-giving requires a giver and a recipient (Mick & DeMoss, 1990). However, in the case of public bookcases the recipient is anonymous. Therefore, in this instance, gift-giving does not fulfill the function of establishing and maintaining a relationship as proposed by Belk (1976). Also, the motivation behind giving cannot include neither the sending of signals about future investments in a relationship (Camerer, 1988), nor a symbolic act of communication (Sherry, 1983). Furthermore, the usage of offers like public bookcases does not fit the definition of charitable donations. A charitable act is undertaken to help people, who are in need of special resources or assistance (Ranganathan & Henley, 2008; VandenBos, 2017). The usage of a public bookcase, from the perspective of giving, is not a purposive act benefitting socio-economic disadvantages, but rather an act with an unknown outcome for others (gift-givers). Important to note here is that public bookcases, as well as other examples in this segment such as food-sharing initiatives, offer both the possibility to give and receive simultaneously, which is unlike charitable donations, where the role of giver and recipient are distinct at the moment of donating. Furthermore, Sargeant & Woodliffe (2007) point out the necessity of asking for a charitable donation as a defining element, which cannot be applied to public bookcases. The research question emerging regarding this circumstance is:

RQ 1: What are the motives that lead people to give gifts to anonymous recipients?

The possibilities of anonymous gift-giving raise the question of who the recipients are. For example, public bookcases can either be utilized for the mere act of sharing, or as a way of giving to people of a lower socio-economic status who lack access or the resources to obtain books. Public bookcases can be discussed as part of the sharing economy (Belk, 2014; Botsman & Rogers, 2010) with the principal idea of less possession and finding alternative manners of consumerism. In addition to other characteristics, Bikos and Papadimitriou (2017) identify public book exchanges as "an act of social policy undertaken by the civil society itself" (Bikos & Papadimitriou, 2017, p. 32). They argue that public bookcases contribute to society providing access to educational material for those unable to afford it. Therefore, public bookcases may not only serve as a way to distribute good readings for booklovers, but also foster education, self-education, lifelong learning and intellectual learning to people who lack these benefits. It is against this background, that our second research question focuses on the recipients of books placed in public bookcases shedding light on if such initiatives of anonymous giving can reach the socio-economic poor and thus bear a charitable notion of gift-giving as described above.

RQ 2: Who are the recipients of anonymous gift-giving and does their socio-economic status differ from the givers?

METHODS

Sample

This current research builds on intensive field work on public book cases in Vienna, Austria. The research project used a mixture of methods, including *observations* and *photographical documentation* of three public book cases (for a period of two weeks with seven observations per bookcase per day, resulting in a total of 294 observations), as well as a *representative questionnaire*. For the latter, a representative sample from Vienna, Austria was drawn for an online survey. The survey link was opened by 1,206 visitors, out of which 105 participants aborted the survey. Overall, 1,101 participants completed the survey; out of all the participants, 179 reported to have neither having heard of nor seen a public bookcase and therefore excluded from the final analysis. Of the remaining sample, 421 participants reported never having used a public bookcase and thus also excluded. One participant did not provide demographic data and was therefore also excluded. Thus, the final sample consisted of 500 par-

Table 1: Descriptive and statistical values regarding the ANOVAs testing of differences in the three groups.

	Recipients (R) n = 84		Givers (G) n = 120		Sharer (S) n = 296		F	p	η^2_p
	M (SD)	Mdn (IQR)	M (SD)	Mdn (IQR)	M (SD)	Mdn (IQR)			
Age	39.00 (14.16)		43.13 (13.00)		44.31 (14.42)		4.70	<.01	.02
Books owned		4.00 (3.00-6.00)		5.00 (3.00-6.00)		5.00 (4.00-6.00)	3.30	<.05	.01
Books read in 2018		3.00 (2.00-4.00)		3.00 (2.00-4.00)		4.00 (3.00-5.00)	7.36	<.01	.03
Universalism	6.24 (1.29)		6.48 (1.20)		6.74 (0.95)		7.81	<.001	.03
Self-direction	6.53 (1.15)		6.54 (1.22)		6.81 (0.95)		3.88	<.05	.02

ticipants (48.4% men, M_{age} = 43.13 years, SD_{age} = 14.15, $Range_{age}$ = 18-69) for further analyses.

Procedure

First, we asked participants how many books they placed in or took from the bookcase in the last year and how many they place or take on average per visit. Participants then indicated how often they visit a public bookcase and why they use (place and take books) it. Next, participants answered the social value scale (56 items; adapted from Schwartz, 1992) in which we asked them to rate the importance of each item (e.g. "equality – equal opportunity for all"; "social recognition – respect, approval of others") as a principle in their life on an 8-point Likert scale, ranging from 1 ("completely unimportant") to 8 ("totally important"). The 56 items represent ten different values (achievement, benevolence, conformity, hedonism, power, self-direction, security, stimulation, tradition, universalism). The internal consistency was satisfying for all value scales (Cronbach's α > .69). Furthermore, participants estimated the number of books they possess and how many books they read per year on average. Using an open question, we asked them for their motives behind giving and/or receiving books and if they use other methods to give away or receive books and if so, which distribution channels they use besides public bookcases (e.g. "Why do you put books in a public bookcase?"). For these final questions we used an open-ended question format to ensure the answers were unrestricted and handled the participants' answers as qualitative data. Finally, socio-demographic data was assessed.

RESULTS

Concerning the observation and photographical documentation of the three public bookcases, we registered a total of 4,547 books in the bookcases during the two weeks of observation. On average 84 books were located in a bookcase per observation and an individual book remains there for 20 hours until removed.

For the representative questionnaire, as a first step to uncover the motives behind giving gifts to anonymous recipients, we focused on participants who indicated to having placed books in a public bookcase at least once, independent of their removal behaviors, (N = 416, 47.6% men, M_{age} = 44.00 years, SD_{age} = 14.02, $Range_{age}$ = 18-69) and the reasons they gave for placing books in a public case. Accordingly, we did a qualitative content analysis to categorize their answers (Mayring, 2010) and found seven different motive catego-

ries in a total of 611 given reasons. The most common reason was the benefit for others (25.53%, e.g. "So that others can also read a good book for free"), followed by the motive of merely discarding books (21.93%, e.g. "because I already read a book and don't need it anymore"). The third most often stated reason was to use a public bookcase as an alternative to throwing books away (20.62 %, e.g. "I don't want to throw away books I don't need anymore. Books are too valuable to throw away.")[1]. After this analysis we further examined the most mentioned motive behind benefitting others. The answers in this category were again divided into two groups. The first one and most mentioned was benefitting an undefined other person (80.13%, e.g. "to give others pleasure"). The other group of motives was benefitting people with a lower socio-economic status and supporting a societal social balance (19.87%, e.g. "so that people who cannot afford to buy books can read the newest bestsellers", "it is knowledge for free, a contribution to nature and society").

When looking at motives users of public bookcases state for taking books, again independent of their giving behaviors (N = 380, 50.8% men, M_{age} = 43.14 years, SD_{age} = 14.52, $Range_{age}$ = 18-69) we found eight different motive categories in a total of 388 given motives. The most common motive was the interest and curiosity in one or more of the books in the bookcase (40.98%, e.g. "because I often find interesting books"), followed by financial motives (17.27%, e.g. "in order to have a book at hand for free which I couldn't afford otherwise") and the motive of wishing for a constant supply of books to fulfil ones' reading habits (14.95%, e.g. "because I need new reading material"). Eighty-four people of this sample reported to have taken books without replacing any in public bookcases (52.4% men, M_{age} = 39.00 years, SD_{age} = 14.16, $Range_{age}$ = 18-69). When we look at their book taking motives, the results show the same most important reason, that of interest and curiosity (39.29%), followed by financial motives (17.86%) and other unclassified reasons (17.86%, e.g. "to gather knowledge").

In order to answer the question of who the beneficiaries of anonymous gift-giving are and if their socio-economic status differs from the givers (RQ2), we ran an ANOVA to compare the mere recipients of books (R) with the mere givers (G) and people who engage in both, giving and taking books (sharer; S). The results show that recipients are significantly younger and own significantly less books than the other groups. Concerning values, recipients showed significantly lower scores in universalism. Furthermore, the groups

---

1   Detailed data available upon request.

differ significantly in self-direction and in the number of books they indicated to have read in the last year (see table 1 for detailed results). However, we did not find any significant differences of the three groups concerning socio-economic variables (e.g. educational status and income).

GENERAL DISCUSSION AND CONCLUSION

Our observation of three public bookcases in Vienna, Austria clearly demonstrates a high usage rate and acceptance of this manner to give and receive books anonymously and for free in the population and stresses the relevance to scientifically study similar initiatives of anonymous gift-giving. The results of the representative study show that the most common motive behind giving to anonymous recipients is a benevolent one, in which the focus is on the joy and pleasure of others. However, this motive is closely followed by other motives that are rather self-interested, i.e., the motives of discarding books and the aversion of disposing unneeded books. However, one fifth of people who want to benefit others explicitly want to assist those of a lower socio-economic status. This result supports the importance to find out who the recipients of anonymous gift giving are in comparison to the givers. Our results show that currently the recipients of anonymous gift-giving are significantly younger, own less books and have a lower score of the universalism value than givers of books, as well as people who report to give and take books. However, we did not find that recipients necessarily had a lower socio-economic status than the givers, even if the second most common motive to take books are financial reasons. Furthermore, we found that sharers show significantly higher scores in self-direction. Based on Schwartz (1992) the value of self-direction is connected to creativity, independence, curiosity, self-respect and a high appreciation of freedom of action and thought. Due to the aspect of curiosity and a kind of open-mindedness that comes with this value, sharers might also be users who are seeking ̄new experiences, like public bookcases in general and are interested in both the experience of giving as well as the experience of taking books. However, in order to sufficiently explain this aspect, future research should further examine the characteristics of givers, recipients and sharers.

Alongside its merits, the current study also has some limitations. First, when asking people about their motives behind giving gifts, social desirability might lead people to overstate their own benevolent motives. However, the collected data clearly shows that the participants do not hesitate to also report self-interested motives (e.g. not enough space to keep books). We therefore assume a negligible effect of social desirability. Second, in order to provide people of lower income and/or educational level with free educational material, public libraries are a valuable source, that was not included in our study. However, public bookcases and libraries differ in some aspects. For example, with public bookcases the focus lies on the exchange of books between consumers, unlike in libraries. Furthermore, unlimited loan-periods apply to public bookcases as the books are not traced and there are no means of recording the placing and taking of them. Also, owing to the issuance of a library card and opening hours, we expect the hurdles in borrowing books from a library to be greater than that of those taking a book of a public bookcase, which can be utilized by anyone at any time as they are publicly accessible. We suggest to include the role of libraries in comparison to public bookcases in future studies.

Public bookcases and other initiatives enabling people to gift anonymous recipients have the potential to reach the ones in need. By providing books publicly, those with lower income and educational levels can be encouraged to read and therefore strengthen their involvement in cultural and societal activities (Otnes & Ilhan, 2009),

and foster lifelong learning and self-education (Bikos & Papadimitriou, 2017). However up to this point, the books placed in public bookcases are not reaching the socio-economic disadvantaged. We advise providers of public bookcases to encourage people with a low socio-economic status to make use of the bookcases. Also, we want to draw the city administrations and other initiators of public anonymous gift-giving projects' attention to the possibility of promoting these activities as a way to help others and thereby integrating them in the discourse and practice of creating a socially sustainable and educating society.

REFERENCES

Ballantine, P. W., & Parsons, A. G. (2011). Re-Gifting: the Gift You Can't Wait to Re-Give. *ACR European Advances*.

Belk, R. (1976). It's the thought that counts: A signed digraph analysis of gift-giving. *Journal of consumer research, 3*(3), 155-162.

Belk, R. (2014). You are what you can access: Sharing and collaborative consumption online. *Journal of Business Research, 67*(8), 1595-1600. doi:http://dx.doi.org/10.1016/j.jbusres.2013.10.001

Bikos, G., & Papadimitriou, P. (2017). Exchange libraries: Greece's response to a global trend. *Library Review, 66*(1/2), 28-38.

Botsman, R., & Rogers, R. (2010). Beyond Zipcar: Collaborative Consumption. *Harvard Business Review, 88*(10), 30-30.

Camerer, C. (1988). Gifts as economic signals and social symbols. *American journal of Sociology, 94*, S180-S214.

Caplow, T. (1982). *Middletown families: Fifty years of change and continuity*: U of Minnesota Press.

LittleFreePantry. (n.d.). Retrieved from http://www.littlefreepantry.org/

Mayring, P. (2010). *Qualitative Inhaltsanalyse* (11 ed.). Weinheim: Beltz.

Mick, D. G., & DeMoss, M. (1990). Self-gifts: Phenomenological insights from four contexts. *Journal of consumer research, 17*(3), 322-332.

OpenBookCase.org. (n.d.). Retrieved from https://openbookcase.org/index

Otnes, C., & Ilhan, B. E. (2009). Curling Up and Reaching Out: Meanings and Motivations For Passionate Readers. *ACR North American Advances*.

Ranganathan, S. K., & Henley, W. H. (2008). Determinants of charitable donation intentions: a structural equation model. *International journal of nonprofit and voluntary sector marketing*, 13(1), 1-11.

Sargeant, A., & Woodliffe, L. (2007). Gift giving: An interdisciplinary review. *International Journal of Nonprofit and Voluntary Sector Marketing*, 12(4), 275-307.

Schwartz, S. H. (1992). Universals in the content and structure of values: Theoretical advances and empirical tests in 20 countries. In *Advances in experimental social psychology, Vol 25* (pp. 1-65). San Diego, CA: Academic Press; US.

Segev, R., Shoham, A., & Ruvio, A. (2013). Gift-giving among adolescents: exploring motives, the effects of givers' personal characteristics and the use of impression management tactics. *Journal of Consumer Marketing*, *30(5),* 436-449. doi: https://doi.org/10.1108/JCM-01-2013-0426

Sherry Jr, J. F. (1983). Gift giving in anthropological perspective. *Journal of consumer research, 10*(2), 157-168.

VandenBos, G. R. (2007). *APA dictionary of psychology*. American Psychological Association.

Co-consuming a Pet Home: Balancing Functionality and Aesthetics of a Taste Regime

Anu Norrgrann, Hanken School of Economics, Finland
Henna Syrjälä, University of Vaasa, Finland

INTRODUCTION

In this paper, we aim at exploring how the aesthetics and functionality of pet homes are balanced in the socio-material practices produced in the interaction within digital platforms. The home as a place for consumption is previously addressed in culturally oriented consumer studies discussing practices, and agentic and expressive capacities of objects in home (e.g., Arsel & Bean, 2013; Csikszentmihalyi & Rochberg-Halton, 1981; Figueiredo, 2016; Epp & Price, 2010; Valtonen & Närvänen, 2015). Recent work has addressed the notion of taste (Arsel & Bean, 2013, 2018), conceptualized as an accretion of material goods through processes of socialization, sensemaking and preference shaping. Taste as a reflexive, systematic practice that creates social hierarchies is thus regarded to emerge and become negotiated in interactions between consumers. Our study joins the discussion in which online platforms are considered as the mediators, re-creators and modifiers of taste (Arsel & Bean, 2013; Phillips, Miller & McQuarrie, 2014).

We build particularly on Arsel and Bean's (2013) concept of problematization, which shows how deviations from normative and cultural standards of taste question the alignment of everyday objects, doings and meanings. This conception appears particularly omnipresent in pet homes. Literature on consumer-animal relations describe a balancing between aspired aesthetics of a certain taste regime and the multiple functionalities living with pets requires. To illustrate, Jyrinki (2012) discusses how pets act as their owners' "character developers", and Belk (1996, 127) describes pets as "problems", in which roles they may, "be messy, do damage, and disrupt normal routines" in homes.

The focus of this paper is in the intersection between two areas of consumption; pet ownership and interior decoration, the Scandi-modern taste regime, in particular. We investigate how the socio-material consumption practice of problematization appears as a constant balancing between aesthetics and functionality, and how solutions for these mundane negotiations are produced in the interaction emerging in digital platforms. In doing so, we adopt a distributed agency perspective (Bajde, 2013), rooted in assemblage theory (Canniford & Bajde, 2016). We expand the notion of co-consumption (Kylkilahti et al., 2016) to describe shared agency between fellow consumers, and between human consumers and non-human, technological and material entities. To this end, the study draws on two sets of qualitative, netnographically generated data from two extensive Facebook-groups related to pets and to interior decoration. We contribute to the extant research by interlinking the prior examinations on co-consumption and non-human animal agency (e.g., Bettany & Daly, 2008; Bettany & Kerrane, 2011; Smith, 2016; Syrjälä et al., 2016; Syrjälä & Norrgrann, 2018, 2019) with literature on socio-material practices illuminating taste regime at home (e.g., Arsel & Bean, 2013, 2018; Phillips, Miller & McQuarrie, 2014; Epp & Price, 2010; Valtonen & Närvänen, 2015).

THEORETICAL FOUNDATIONS

Agentic Animals as Co-consumers in Home Assemblage

Although pet animals cohabit with their owners, most of the extant research on consumers and their animals lacks focus on home as a shared consumption space, home emerging only as a by-product of living together with non-humans. To illustrate, one of the earliest consumer studies on pets by Hirschman (1994) illuminates the various roles pets may possess, and the boundaries assigned to pets at home (e.g., if they are allowed on the sofa, or in the bedroom) demonstrate the meanings given to the animals. Similarly, most prior studies on companion animals rely on a human-centered view as, for instance the roles of animals are elaborated from the human's perspective, that is, how consumers experience what their pets mean to them (e.g., Belk, 1996; Brockman, Taylor, & Brockman, 2008; Hirschman, 1994; Holbrook et al., 2001; Jyrinki, 2012).

To address these gaps, the current study joins the post-humanist stream of consumer studies on animal companions (e.g., Bettany & Daly, 2008; Bettany & Kerrane, 2011; Smith, 2016; Syrjälä et al., 2016) and focuses on non-human agencies in home assemblage (Syrjälä & Norrgrann, 2018, 2019). In these accounts, the idea that agency is solely possessed by human consumers is left aside, and instead, the differences and interdependencies between human and non-human entities are illuminated to show how agency appears in varied and multiple qualities in assemblages (Canniford & Bajde, 2016), such as homes.

Furthermore, by directing attention to both human and animal agency, we regard humans and non-human animals co-consumers (Kylkilahti et al., 2016), whose agency may be captured as co-existing and mutable in relation to emerging situations and conditions that flicker in the networks that produce home. From this post-human perspective, human and animal constitute a co-consuming unit with distributed agency, where both are co-implicative and intertwined within the material-cultural environment of the home. This relates to Cheetham and McEachern (2013), whose notion of inter-subjectivity emphasises subjectivity of the animal entity and the reciprocity of this subject-subject relationship (also, Haraway, 2003). Borgerson (2013) has proposed a typology in which agency is analyzed in terms of effects and intentions, in a way that living entities (be they human or non-human) may hold intentional capacities of agency, whereas non-living things trigger only effects (see also, Syrjälä et al., 2016). For instance, Epp and Price (2010) and Figuereido (2016) understand that the agentic capabilities of material objects in the home are not as purposefully intentional, but they are capable of being agentic through their relations.

Taste regimes and agentic digital communities

A particular characteristic of the home as a place of consumption is that it often involves aesthetic pursuits. Consumers' ideas of a beautiful home can be understood through the notion of taste, which, in Bourdieu's (1984) definition, is a mechanism through which individuals judge, classify, and relate to objects and acts of consumption. In recent work by Arsel & Bean (2013; 2018) taste is conceptualized as reflexively performed everyday practice that reinforce symbolic boundaries, creating social distinction. They have introduced the notion of taste regime, which encapsulates the linkage between aesthetic and action - dimensions that particularly characterize consuming homes. The taste regime concept illustrates the orchestration of objects, doings and meanings in an aesthetic system, and enroll consumers in processes of problematizing (questioning material objects' relation to the taste regime's meanings), ritualizing (establishing behaviors that align objects with doings) and instrumentalizing (enrolling objects and doings to actualize meanings).

Table 1: Integration between pet-related practices and Scandi-modern taste regime in Facebook groups

	Problematization	Balancing	Interaction in the digital communities	Illustrations from diglital platforms (openings of discussion threads)	
Objects	toys, beds, bowls, food, leashes, sofas, rugs, floor materials, space	optimizing the astheic-functional ratio in objects, redefining "ownership" boundaries of objects, hiding/camouflageing, accessorizing	seeking and sharing product ideas, recommendations, inspiration; reinforcement of the taste regime through shared product understandings and preferences	"What kind of baskets for dog toys you have? Preferably, some that look stylish enough to be kept in the living room by force of circumstance 😄"	"We are expecting a puppy to our home. Could you post pictures of how your dog with his/her bed, bowls, and equipement is part of your home"
Doings	sleeping, eating, playing, destroying, messing up, storing, cleaning, moving between indoor/outdoor, taking into possession	finding material solutions that enable an integration pet-related doings and the taste regime; handling animal agency beyond human control □	seeking and sharing ideas for organizing and planning the home and its functionalities	"Do you have a restricted area in you homes in which your dogs are allowed to go or not? We are about to move to a new home, and I am "tempted" by the idea that our dogs (three big, long-haired 😊) would not be allowed into the bedroom or living room. The dogs would still have a plenty of space, the entire hall, kitchen and dining room. Wouldn't need to worry about them jumping onto the brand new leather couch, and it would be possible to keep at least a couple of rooms in a bit tidier condition 😄"	"I have a project of staircase painting ahead, which I have been avoiding already a year. And ever bigger pain comes from stair mats / anti-slip mats. Me, myself, I wouldn't ever want such a thing, but I need to think about our old dog, who still rushes wrecklessly in the stairs. So, please, post pictures of what kinds you have in use. 🐾 I can find web-pages myself, so what I need is just pictures to assure me that they are not all ugly 😄"
Meanings	challenged mininmalism, uncletteredness, tidyness, lightness, purity, threatened design orientation	integrating demands of easy maintenance (e.g. detachable and washable) into material objects; re-assessing the "sancity" of designer items	discursive portrayal of pets as obstacles in the taste regime; as unproblematic extensions of the taste regime; as a way to express individuality within the taste regime	"Honest opinions and viewpoints, please. Dare I really buy an off-white wool rug in a dog and cat family? Are they really so dirt-repelling that the occasional vomiting (which of course always ends up on the newest or most expensive rug) doesn't cause stains? Am I dreaming in vain of a white wool rug?"	"It would be nice to see photos of other Scandinavian and modern homes with pets 😊♀ This is ours (+ one dog not in the picture)"

In this research, we focus on pet homes as we elaborate particularly on Arsel & Bean's (2013; 2018) problematization practice, exploring how pet-related practices problematize, and become integrated into a specific interior decoration regime.

Culturally oriented consumer studies have emphasized the way in which discursive systems normatively shape and regulate consumption (Arnould and Thompson 2005; Arsel & Bean 2013), and the role of mediated culture, such as online communities and social media are acknowledged as central tastemakers, cultural intermediaries and triggers of desire today (Arsel & Bean 2018; Phillips et al 2014; Kozinets et al 2016). Participation in communities where a specific taste regime is cultivated offers a fruitful ground for exploring taste from a co-consumption and distributed agency perspective, revealing how the peer-to-peer interactions' show the "flickering" agency in the heterogeneous network of various human and non-human entities.

METHODOLOGY

Our research is grounded in a particular stream of practice theory, the socio-material practice approach, that acknowledges practices not only as social and cultural, but also as material (Fuentes, 2014). Most practice theoretical approaches place the *social* in practices, as activities of social life are carried out over and over again, and this mundane performativity is organized through a variety of collectively shared practices (Halkier and Jensen, 2011). However, as practices are manifested in individual performances and embedded in cultural structures (Halkier et al., 2011; Warde, 2005), the individual *human* consumer is seen as the carrier of practices. Although *material* artefacts are also situated in practices, in these views, they have no agency of their own (Fuentes, 2014) as, for instance, 'objects are handled' (Rexwitz, 2002) by a human activity.

In contrast, post-human practice approaches consider the agentic capacities of non-human entities as pivotal in the making of social practices (Schatzki, 2001). As Fuentes (2014) highlights, "to think in terms of socio-material practice is to treat materiality and its meanings, image and things, humans and non-humans simultaneously and as intrinsically interlinked." This resembles how assemblages are regarded as continuously shaped in the interactions between heterogeneous entities, both human and non-human, which "gain their qualities and capacities through more or less stable connections with fellow elements" (Canniford & Bajde, 2016, 2). In this way, prac-

tices and assemblages are mutually dependent as practices construct assemblages and assemblages in turn shape and have an impact on practices (Fuentes, 2014).

To generate an in-depth understanding on the prevailing socio-material practices and construction of taste in home assemblages as they appear in digital platforms, we employed netnography (Kozinets, 2015). Relying on the premises of (n)ethnographic research, in which the researcher ideally participates in the interaction within the community under study (Kozinets, 2015), we followed and participated in discussions in two Finnish Facebook groups, one focusing on dogs ("Dogs") and the other on interior decoration ("Modern and Scandinavian interior decoration"). In the dog-related Facebook group, we focused on the discussions on home-related matters, whereas in the interior decoration group we did the same in relation to pets in homes. As the idea of netnography is to study everyday life within virtual social interaction (Kozinets, 2015), it offers an unobtrusive way to generate data (Kozinets, 2006). Indeed, the topics appeared abundantly in both of the groups, which enabled us to observe the discussion without deliberately triggering any further discussions ourselves. Our material consists of both verbal discussion as well as pictures shared in the two communities.

FINDINGS

Our empirical examination addresses the questions of how pet-related practices intersect with and problematize adherence to a Scandi-modern taste regime, and how the digital Facebook communities as discursive systems play a role in this. Our findings and empirical illustrations, summarized in Table 1, are structured according to how objects, doings, and meanings are linked and orchestrated into patterns of consumption. The analysis focuses particularly on the problematization practice (Arsel & Bean 2013) when pet-related consumption considerations are assessed against the taste regime.

Even if pet-related *objects*, like their beds, toys or food containers can be perceived as challenging to align with the taste regime in a satisfactory way, the digital community contributes by offering a platform to share ideas, inspiration and concrete product tips on how to resolve these problems and balance functionality and aesthetics in the pet home.

Pet-related *doings*, from neutral activities such as eating or sleeping, to more strongly interfering like smirching or destroying, problematize the taste practice, particularly considering that the

agency of these doings is partly beyond of the human consumer's control and intention. In this respect, the digital community can provide peer resources for handling this integration by, for instance, providing ideas how, and with what kind of material resources to organize the pet-related activities in accordance with the taste regime (e.g. storing various pet items practically, but out of sight) or proactively plan interior solutions with a consideration of pet-related doings.

The *meanings* and material expressions related to Scandi-modernism are recurring topics of online discussion. Members of the Scandi-modern group characterize the style with terms such as clarity, minimalism, neutral colors, natural materials and designer items. When a pet is co-consuming the home, it may be perceived as a threat or limitation to these pursuits, expressed for instance as reluctance or hesitance to invest in delicate and/or expensive products, that one would choose were it not for the practical considerations. The collective online discourse reflects such trade-offs and problems, seeking peer reassurance, recommendations and warnings, as well as suggested solutions for integration. Nevertheless, pets and the Scandi-modern home are not always regarded as a problematic clash in the online discourse, but the groups also exhibit content of the two becoming integrated in unproblematic ways. From this viewpoint, the pet as a cultural symbol in fact rather enhances the specific taste regime and is used to match the décor (Syrjälä & Norrgrann 2019). While dogs carry a symbolic meaning related to homeliness in general ("a house without a dog is not a home"), the data provide examples that the role of dogs is also an aesthetic one. Picture material in the forums showcase dogs that are, for instance, color matched with their surroundings, or accessorizing the décor similarly as sheepskin rugs as typically used within the taste regime to indicate warmth and texture.

Overall, the social platforms where taste is negotiated, and practices discussed contribute to the integration of practices in several ways. In line with previous research (Phillips et al., 2014, Kozinets et al., 2016) these networks allow consumers to dream, plan, develop desires, and discover and refine their taste, be it by passively following the content, or more actively taking part in interaction and even through concrete peer-to-peer problem solving and practice integration.

CONCLUSIONS

In this study, we have delved into the socio-material practice of problematization (Arsel & Bean, 2013), and elaborated on how it appears and is balanced in the interaction emerging in digital platforms concerning pet homes. Furthermore, we provided illustrations on how agency appears distributed across various human and non-human entities when assembling home. The human consumer and non-human animal appear as a co-consuming unit, in which the non-human animal poses several functional demands for the human consumer in their attempts to align with Scandi-modern aesthetics. Yet, the solutions for these problematizing occasions, regarding objects, doings and meanings are sought for in digital platforms, which in itself also exhibit agency by resolving problems, mediating, and re-creating the Scandi-modern taste regime. In this way, we have advanced extant knowledge by combining research on socio-material practices and taste in homes (e.g., Arsel & Bean, 2013, 2018; Epp & Price, 2010; Valtonen & Närvänen, 2015) with distributed (animal) agency (e.g., Bajde, 2013; Bettany & Daly, 2008; Bettany & Kerrane, 2011; Smith, 2016; Syrjälä et al., 2016; Syrjälä & Norrgrann, 2018, 2019).

From a managerial viewpoint, we believe that the socio-material practice view that considers how different consumption arenas intersect, offers new ways to understand what constitutes value for customers, and which different kinds of requirements need to be negotiated in specific consumption practices intertwined in a taste regime. Such understanding may offer new business opportunities for companies who manage to take a broader view of the practices surrounding their products and integrate the diverse requirements - for instance practicality and aesthetics - into their offerings. In our empirical context, examples of such include pet products that are positioned as interior design and lifestyle products, or in the marketing communication of a design sofa brand, that emphasizes the fabric's suitability for domestic life including pets and children.

Future research should indeed focus on other co-consuming units, such as parents and children (Thompson, 1996), which would open up not only novel managerial implications but also views to distributed agency. Further, a limitation of the current study is that it has employed visual materials only in a supporting role for interpretation, so future examinations should dig deeper into visual analysis, as pictures are constantly pervading as a larger and more meaningful part of social media communication.

REFERENCES

Arsel, Z., & Bean, J. (2013), "Taste Regimes and Market-Mediated Practice," *Journal of Consumer Research*, *39*(5), 899-917.

Arsel, Z., & Bean, J. (2018), "Social Distinction and the Practice of Taste," In Arnould, E.A. & Thompson, C.J. (Eds) *Consumer Culture Theory.* London: Sage.

Bajde, D. (2013), "Consumer Culture Theory (Re)visits Actor–Network Theory: Flattening Consumption Studies," *Marketing Theory, 13*(2), 227–242.

Belk, R.W. (1996), Metaphoric relationships with pets. *Society & Animals, 4*(2), 121–145.

Bettany, S., & Daly, R. (2008), "Figuring Companion-Species Consumption: A Multi-Site Ethnography of the Post-Canine Afghan Hound," *Journal of Business Research, 61*, 408–418.

Bettany, S., & Kerrane, B. (2011), "The (Post-human) Consumer, the (Post-avian) Chicken and the (Post-object) Eglu: Towards a Material-Semiotics of Anti-Consumption", *European Journal of Marketing, 45*(11/12), 1746–1756.

Borgerson, J. (2013), "The Flickering Consumer: New Materialities and Consumer Research," In R. Belk, L. Price, & L. Peñaloza (Eds.), *Consumer Culture Theory: Research in Consumer Behavior* (Vol. 15, pp. 125–144). Bingly: Emerald.

Bourdieu, Pierre (1984), *Distinction: A Social Critique of the Judgement of Taste*, Cambridge, MA: Harvard University Press.

Brockman, B.K., Taylor, V.A. & Brockman, C.M. (2008), "The Price of Unconditional Love: Consumer Decision Making for High-dollar Veterinary Care," *Journal of Business Research*, 61, 397–405.

Canniford, R., & Bajde, D. (2016), "Assembling Consumption," In R. Canniford & D. Bajde (Eds.), *Assembling consumption: researching actors, networks and markets* (pp. 1–18). Oxon: Routledge.

Cheetham, F. & McEachern, M.G. (2013), "Extending Holt's Consuming Typology to Encompass Subject–Subject Relations in Consumption: Lessons from Pet Ownership," *Consumption Markets & Culture,* 16, 91–115.

Csikszentmihalyi, M., & Rochberg-Halton, E. (1981), *The Meaning of Things: Domestic Symbols and the Self*. New York: Cambridge University Press.

Epp, A., & Price, L. (2010), "The Storied Life of Singularized Objects: Forces of Agency and Network Transformation," *Journal of Consumer Research, 36*(5), 820–837.

Figueiredo, B. (2016), "Home in Mobility: An Exercise in Assemblage Thinking," In R. Canniford & D. Bajde (Eds.), *Assembling Consumption: Researching Actors, Networks and Markets* (pp. 77–91). Oxon: Routledge.

Fuentes, C. (2014), "Green Materialities: Marketing and the Socio-material Construction of Green Products," *Business Strategy and the Environment*, *23*(2), 105-116.

Halkier B and Jensen I (2011), "Methodological Challenges in Using Practice Theory in Consumption Research: Examples from a Study on Handling Nutritional Contestations of Food Consumption," *Journal of Consumer Culture* 11(1): 101–123.

Haraway, D. (2003), *The Companion Species Manifesto: Dogs, people & significant otherness,* Chicago, IL: Prickly Paradigm Press.

Hirschman, E.C. (1994), "Consumers and Their Animal Companions," *Journal of Consumer Research, 20*, 616–632.

Holbrook, M.B., Stephens, D.L., Day, E., Holbrook, S.H. & Strazar, G. (2001), "A Collective Stereographic Photo Essay on Key Aspects of Animal Companionship: The Truth about Dogs and Cats," *Academy of Marketing Science Review* 1, 1-17.

Jyrinki, H. (2012), "Pet-Related Consumption as a Consumer Identity Constructor," *International Journal of Consumer Studies*, 36, 114–120.

Kjellberg, H., & Helgesson, C. F. (2007), "On the Nature of Markets and Their Practices," *Marketing Theory*, *7*(2), 137-162.

Kozinets, R.V. (2006a), "Click to Connect: Netnography and Tribal Advertising," *Journal of Advertising Research* 46(3): 279–288.

Kozinets, R.V. (2015), *Netnography: Redefined*. 2nd Edition. Sage: London.

Kozinets, R., Patterson, A. & Ashman, R. (2016), "Networks of Desire: How Technology Increases our Passion to Consume," J*ournal of Consumer Research* 43: 659-681.

Kylkilahti, E., Syrjälä, H. Autio, J., Autio, M., & Kuismin, A. (2016), "Understanding Co-consumption between Consumers and Their Pets," *International Journal of Consumer Studies, 40*(1), 125–131.

Phillips, B., Miller, J. & McQuarrie, E. (2014), "Dreaming out Loud on Pinterest. New Forms of Indirect Persuasion," *International Journal of Advertising* 33(4):633-655.

Schatzki, T. R. (2001), "Introduction: Practice Theory," In T. R. Schatzki, K. Knorr Cetina & E. von Savigny (Eds.), *The practice turn in contemporary theory* (pp. 10–23). Routledge: London.

Smith, A. (2016), "Empathetic Engagements and Authentic Detachments: On Horses, Leaders and Interspecies Becomings," In R. Canniford & D. Bajde (Eds.), *Assembling Consumption: Researching Actors, Networks and Markets* (pp. 105–118). Oxon: Routledge.

Syrjälä, H., Jaskari, M., & Leipämaa-Leskinen, H. (2016), "Object Agency of a Living/Non-living Entity: The Case of Horse/Horsemeat,". In D. Rinallo, N. Özçağlar-Toulouse & R. Belk (Eds.), *Consumer Culture Theory: Research in Consumer Behavior* (Vol. 18, pp. 65–92)*.* Bingly: Emerald.

Syrjälä, H., & Norrgrann, A. (2018), "Autoethnography in the Digitalized World: Using Auto-netnography in Analyzing Object Agency in Home Assemblage,". In H. Syrjälä & A. Norrgrann (Eds.), *Multifaceted Autoethnography: Theoretical Advancements, Practical Considerations and Field Illustrations* (pp. 147-180).: New York: Nova Science Publishers.

Syrjälä, H., & Norrgrann, A. (2019), "When Your Dog Matches Your Decor" Object Agency of Living and Non-living Entities in Home Assemblage, *Consumer Culture Theory (Research in Consumer Behavior, Volume 20). Emerald Publishing Limited*, 39-54.

Thompson, C.J. (1996), "Caring Consumers: Gendered Consumption Meanings and the Jiggling Life-style," J*ournal of Consumer Research*, 22, 388–407.

Valtonen, A., & Närvänen, E. (2015), "Gendered Reading of the Body in the Bed," *Journal of Marketing Management, 31*(15–16), 1583–1601.

Warde A (2005), "Consumption and Theories of Practice," *Journal of Consumer Culture* 5(2): 131–153.

Don't Take My Warm Glow: Unasked Prosocial Gifts Reduce Subsequent Donations

Ekin Ok, University of British Columbia, Canada
Rishad Habib, University of British Columbia, Canada
Karl Aquino, University of British Columbia, Canada

EXTENDED ABSTRACT

Prosocial gifts, defined as *charitable donations made by gift-givers on gift-recipients' behalf, which support a cause rather than benefit the gift-recipient directly*, are growing in popularity, promoted by many prominent non-profit organizations such as World Vision, Plan International, and Oxfam. These organizations enable consumers to donate to their causes as gifts for others. For instance, on Plan International's website, consumers can purchase school supplies for kids in developing countries on someone else's behalf for a variety of special occasions ranging from a birthday, Christmas, or even Valentine's Day (Plan International Canada, 2018).

Also known as "socially responsible gifts" (Cavanaugh, Gino, & Fitzsimons, 2015), prosocial gifts offer a seemingly win-win arrangement for all parties involved. For the gift-giver, they offer a unique and meaningful way to fulfill the task of buying a gift and convey a favorable self-expression as a moral person, while eliciting feelings of warm glow that arise from "doing good" (Andreoni, 1990). They constitute an additional source of revenue for the non-profit organization, enable them to enlarge their potential donor base and increase awareness for the cause they seek to address. A unique aspect of the prosocial gifts is that the direct recipient of the donation (i.e., the beneficiary) is different from the gift-recipient, on whose behalf the donation is made. While the gift-giver's donation is used to provide the beneficiary with the resources they need, the gift-recipient typically receives a personalized e-card that is customized for the gift-giving occasion, notifying them that a donation has been made in their honor. In this arrangement, the gift recipient is presumed to enjoy the indirect psychological benefit of sharing the warm glow (Cavanaugh et al., 2015).

Despite their growing popularity, research on prosocial gifts is limited. To our knowledge, the only academic work on prosocial gifts investigates the interpersonal outcomes of this type of gift-giving, documenting an asymmetry in givers' anticipated and recipients' reported appreciation of them based on social distance (Cavanaugh et al., 2015). Furthermore, the majority of the existing research on gift-giving (including non-prosocial, traditional gifts) targets the relationship between the gift-giver and the gift-recipient. Expanding this focus, our research investigates the consequences of receiving prosocial gifts from the recipient's perspective. We examine how receiving a prosocial gift affects recipients' subsequent involvement with the non-profit organization (i.e., their willingness to donate to and volunteer for the organization in the future). To that extent, it is novel not only for focusing on the relationship between the gift-recipient and the brand (i.e., the charity organization), but also for doing so in the scantly studied domain of prosocial gifts. It also carries managerial relevance for the organizations promoting socially responsible gift-giving practices.

According to impure altruism theory, people are motivated to do good deeds partly because of the emotional benefit and utility they receive from the act of giving itself – a benefit often referred to as "warm glow" (Andreoni, 1990). The concept of warm glow has been applied in a variety of domains in the marketing literature, including work on corporate social responsibility and cause marketing (Krishna, 2011; Habel, Schons, Alavi, & Wieseke, 2016), consumer responses to discount- vs. donation-based promotions (Winterich &

Barone, 2011), and involvement in 'green consumption' programs (Giebelhausen, Chun, Cronin Jr, & Hult, 2016).

Recent research reveals that choosing to give voluntarily and intentionally in the presence of an opportunity to behave self-servingly is necessary for experiencing warm glow (Evren & Minardi, 2017). For instance, Giebelhausen et al. (2016) show that individuals feel greater warm glow when they participate in an eco-friendly program voluntarily, compared to when participation is mandatory. The notion that warm glow is dependent on a sense of agency is also supported by work in neuroscience, which shows that neural activity in the reward processing areas of the brain is highest when giving is voluntary, and thus eliciting "warm glow" (Harbaugh, Mayr, & Burghart, 2007; Tankersley, Stowe, & Huettel, 2007). Based on these findings, we theorize that an important element missing in prosocial gift-giving is the recipients' sense of agency over having made the donation decision. To the extent that agency is a precondition for experiencing warm glow, and that people primarily gain pleasure from heling others when they feel ownership over their good deeds (Berman & Small, 2012), then this experience should not occur when a person receives a prosocial gift, thereby eliminating one of the possible sources of motivation for subsequent engagement with the organization. Importantly, we hypothesize that this effect will occur only when the initial donation is not explicitly requested by the recipient. Figure 1 below shows our conceptual model.
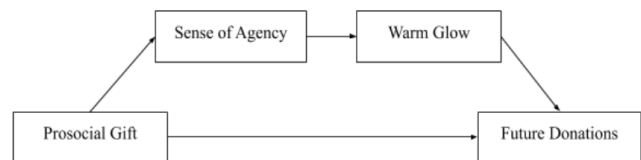
Figure 1. Conceptual Model

In three experiments, we show that when prosocial gifts are not explicitly requested by the recipient, the recipient's future intentions to donate to the organization is lower, compared to when they are specifically requested ('asked condition') or to a 'control condition' that does not involve a gift exchange. This effect is reliable across two different organizations (Greenpeace and a local children's hospital), two distinct gift-giving occasions (birthday and Holidays season), for both money and time donations, and with both MTurk and undergraduate student samples. We also have preliminary evidence that this effect occurs due to a reduction in recipients' feelings of warm glow, resulting from a perceived lack of agency over the donation decision and find that restoring agency can decrease this gap.

Study 1 tested our main hypothesis that receiving unasked prosocial gifts results in lower future donations to the organization. 152 participants from MTurk took part in a three-condition between-subjects study: Unasked gift vs. Asked gift vs. Control. In the control condition participants simply read some information about Greenpeace. In the unasked gift condition, after reading the same information about the organization, participants saw an e-card notifying them that a friend had donated $50 to Greenpeace on their behalf as a birthday gift. In the asked gift condition, prior to seeing the same card and the message as in the unasked gift condition, they were asked to imagine that they had suggested their friends to make such

a donation (instead of a traditional gift) on their Facebook. Next, all participants answered how likely they were to donate money to Greenpeace three months from now (1 = *very unlikely*, 7 = *very likely*). A one-way ANOVA showed that there was a significant difference in the donation likelihood between conditions. The donation likelihood in the unasked condition ($M_{unasked}$ = 2.80, $SD_{unasked}$ = 1.68) was significantly lower than the asked (M_{asked} = 3.92, SD_{asked} = 2.00, p = .003), and marginally lower than the control condition ($M_{control}$=3.48, $SD_{control}$=1.90, p = .07). There was no difference between the control and asked conditions, p =.23.

Study 2 was conducted just before the Holidays season with 162 students, who were randomly assigned to one of two conditions: Unasked vs. Asked gift. Participants were asked to imagine receiving an e-card from a friend who had made a $50 donation to Children's Hospital on their behalf as a Christmas gift. We used the same manipulation as in Study 1: Participants in the asked condition read that they had requested such a donation instead of a traditional gift, whereas those in the unasked condition read that they had not mentioned anything about their preference for such a gift. We then measured their likelihood of donating time (*i.e.,* volunteering at a local fundraiser organized by the hospital) and money in counterbalanced order (on a scale from 1 = *very unwilling* to 7 = *very willing),* and their feelings of warm glow upon receiving the gift, with six items (e.g., *happy*, *proud*, *satisfied, a = .96)*) adapted from Giebelhausen et al (2016). Replicating Study 1, those in the asked condition were significantly more likely to donate time (M_{asked} = 6.08$_{asked}$, SD_{asked} = 1.26, $M_{unasked}$ = 4.81, $SD_{unasked}$ = 1.42 p < .001) and marginally more likely to donate money (M_{asked} = 5.70, SD_{asked} = 1.18, $M_{unasked}$ = 5.09, $SD_{unasked}$ = 1.02 p = .06) than those in the unasked condition. Furthermore, this effect was mediated by feelings of warm glow: Those in the unasked condition reported feeling less warm glow, resulting in lower intentions to donate time (B=.34, 95%CI =[.09, .62]) and money (B=.37, 95% CI= [09,.67] to the organization in the future.

Study 3 (N=229) provides further evidence for the role of agency driving our effect. We employed the same materials and procedure as in Study 1 (donation to Greenpeace for the recipient's birthday); but added a third condition to manipulate the sense of agency over the donation decision. In this condition ('unasked gift, choice present'), after reading that their friend had made a $50 donation to Greenpeace on their behalf, participants were shown five Greenpeace initiatives (e.g., Protecting Our Oceans, Living Toxic-Free) and were asked to select which specific initiative(s) they would want the donation to go towards. Participants in the other two conditions (unasked gift and asked gift) saw the same list of initiatives but were not allowed to choose specific ones. In this study, in addition to the same warm-glow items from Study 2, we also included questions on perceptions of choice restriction and controlled for participants' prior attitudes toward Greenpeace. Finally, all participants indicated their likelihood of donating money and time to Greenpeace three months from now.

Likelihood of Donating Money. An ANCOVA on the likelihood of donating money with experimental condition as the independent variable and liking for Greenpeace as a control variable revealed that condition marginally affected participants' reported donations, F(2,225) = 2.49, p = .085. Liking for Greenpeace was also a significant predictor, F(1,225) = 45.14, p < .001. We find that the unasked choice absent condition (M = 4.10) led to significantly lower likelihood of donations than the asked condition (M = 4.94), F(1,225) = 4.97, p = .027. The unasked choice present condition (M = 4.53) was not significantly different from the asked condition, F(1,225) = 1.14, p = .29, thus eliminating the negative effect of a lack of choice.

Likelihood of Donating Time. An ANCOVA on likelihood of donating time with experimental condition as the independent variable and liking for Greenpeace as a control variable revealed that condition significantly affected participants' reported donations of time, F(2, 225) = 4.56, p = .01. Liking for Greenpeace was also a significant predictor, F(1, 225) = 34.14, p < .001. We find that the unasked choice absent condition (M = 3.95) led to significantly lower likelihood of donating time than the asked condition (M = 4.97), F(1,225) = 9.11, p = .003. The unasked choice present condition (M = 4.62) was not significantly different from the asked condition, F(1,225) = 2.45, p = .12

Restriction of Choice. We also predicted that there would be differences in feelings of choice in the three conditions. We conducted an analysis of covariance (ANCOVA) on feelings of choice with experimental condition as the independent variable and liking for Greenpeace as a control variable. Condition had a significant effect on feelings of choice restriction, F(2, 225) = 21.59, p < .001. Liking for Greenpeace was also a significant predictor, F(1, 225) = 7.04, p = .009. We find that the unasked choice absent condition (M = 6.83) led to significantly higher perceived restriction of choice than the asked condition (M = 4.81), F(1,225) = 40.08, p < .001. The unasked choice present condition (M = 6.26) was also significantly higher than the asked condition, F(1,225) = 21.72, p < .001.

Warm Glow. We conducted an analysis of covariance (ANCOVA) on feelings of warm glow with experimental condition as the independent variable and liking for Greenpeace as a control variable. Condition had a significant effect on feelings of warm glow, F(2, 225) = 8.21, p < .001. Liking for Greenpeace was also a significant predictor, F(1, 225) = 45.16, p < .001. We find that the unasked choice absent condition (M = 4.34) led to significantly more negative emotions and thus lower warm glow than the asked condition (M = 3.40), F(1,225) = 16.07, p < .001. The unasked choice present condition (M = 3.85) led to more negative emotions than the asked condition, F(1,225) = 6.23, p = .01.

Mediation through choice and warm glow. To determine whether choice and warm glow mediated the effect of prosocial gift condition on intentions to donate, we conducted mediation analysis (Hayes PROCESS Model 6 with condition coded as a categorical variable and liking of Greenpeace as a covariate). Compared to the unasked choice absent condition, we found a significant indirect effect on intentions to donate money through choice and warm glow for the asked condition ($b_{indirect}$ = .57, 95% CI = [.33, .87]). Indirect effects through only choice (95% CI = [-.18, .49]) or warm glow (95% CI = [-.17, .69]) alone were not significant. The reverse serial mediation where condition predicts warm glow, choice and then donations was not significant ($b_{indirect}$ = .04, 95% CI = [-.05, .15]).

A recent survey conducted with 1000 Canadians revealed that 62% of Millennials and Gen Z adults reported interest in giving a prosocial gift in the next year (Plan International, 2019). Academic research on this increasingly popular form of gift-giving practice is currently scant, and no work to date has explored the downstream consequences of receiving prosocial gifts on recipients' subsequent involvement with the organization. In three studies, we show that receiving prosocial gifts that one did not explicitly request hinders agency perceptions and feelings of warm glow, which results in lowered intentions to donate money and time to the organization in the future. Our findings offer substantial managerial importance for the organizations that promote this type of gift-giving practice, particularly since we provide evidence that receiving such gifts may backfire when they are not explicitly requested by the recipient. We also demonstrate a theoretically consistent and managerially relevant

way to restore gift-recipients' sense of agency to minimize their negative reactions to receiving prosocial gifts.

REFERENCES

Andreoni, J. (1990). Impure Altruism and Donations to Public Goods: A Theory of Warm-Glow Giving. *The Economic Journal*, 100(401), 464–477.

Berman, J. Z,, & Deborah A. Small.(2012). "Self-Interest without Selfishness: The Hedonic Benefit of Imposed Self-Interest," *Psychological Science*, 23(10), 1193-1199.

Cavanaugh, L. A., Gino, F., & Fitzsimons, G. J. (2015). "When doing good is bad in gift giving: Mis-predicting appreciation of socially responsible gifts," *Organizational Behavior and Human Decision Processes*, 131, 178–189.

Giebelhausen, M., Chun, H. H., Cronin Jr, J. J., & Hult, G. T. M. (2016). "Adjusting the Warm-Glow Thermostat: How Incentivizing Participation in Voluntary Green Programs Moderates Their Impact on Service Satisfaction," *Journal of Marketing*, 80(4), 56–71.

Habel, Johannes, Laura Marie Schons, Sascha Alavi, and Jan Wieseke (2016), "Warm Glow or Extra Charge? The Ambivalent Effect of Corporate Social Responsibility Activities on Customers' Perceived Price Fairness," *Journal of Marketing*, 80(1), 84–105.

Harbaugh, W. T., Mayr, U., & Burghart, D. R. (2007). "Neural responses to taxation and voluntary giving reveal motives for charitable donations," *Science*, 316(5831), 1622–1625.

Krishna, Aradhna (2011), "Can Supporting a Cause Decrease Donations and Happiness? The Cause Marketing Paradox," *Journal of Consumer Psychology*, 21(3), 338–45.

Maciejewsky, J. (2008). Gifts that give twice: Charitable gift cards. Retrieved from: http://www.creditcards.com/credit-card-news/charitable-gift-cards-1271.php.

Plan International Canada. (2018). Plan Canada. Retrieved July 24, 2019, from Plan Canada Gifts of Hope website: https://plancanada.ca/giftsofhope/

Winterich, Karen Page and Michael J. Barone (2011), "Warm Glow or Cold, Hard Cash? Social Identity Effects on Consumer Choice for Donation versus Discount Promotions," *Journal of Marketing Research*, 48(5), 855–68.

How do we Measure the Impact of Word-of-Mouth on Social Networking Sites?

Delane Osborne, Curtin University, Australia
Graham Ferguson, Curtin University, Australia
Sonia Dickinson, Curtin University, Australia

INTRODUCTION

Word-of-mouth and social media have been areas of significant research interest during the past decade however in reviewing past research there appears a lack of consistency in exploring its operation and measurement. Furthermore, the majority of social media research has focused on the platforms of emails, reviews, and blogs, with little research focusing on social networking sites. As such, there remains a need for development of a holistic model of the operation of word-of-mouth communications on social networking sites and their outcomes.

WORD-OF-MOUTH ON SOCIAL NETWORKING SITES

With the rapid growth of social media and the introduction of platforms such as review sites, blogs, and social networking sites, word-of-mouth communications are becoming increasingly influential. According to recent statistics, 62% of Australians use social media each day, with 23% using such sites for the purpose of retail research (Yellow 2018). These social media sites facilitate the exchange of electronic word-of-mouth communications not just from one person to another, but from one person to thousands of others. These 'one-to-many' communications can take many forms including 'Tweets' and replies on Twitter, posts and comments on Facebook, comments on blogs, and location based 'check ins'. Redsicker (2013) explains, "when a Facebook user sees that her friend has checked into a particular store, she'll be curious to learn more about that location and will probably click through for more information". With the expanding capabilities of social media sites, interpersonal influence now has the potential of occurring without written communication even taking place. For example, when Facebook users acknowledge a positive association with a brand or company by 'liking' their page, when Twitter users 'retweet' a communication by another user, or when Instagram users post photos of products. According to Chitty, Hughes, and D'Alessandro (2012, 177), "86% of Australian internet users contact other internet users seeking their opinions and information about products, services and brands". The way in which consumers behave post-purchase or post-consumption has also greatly changed with the emergence of social media with consumers now publicly rating and evaluating their experiences with products and services.

Social networking sites such as Facebook are becoming increasingly popular among young adults who utilise the sites to communicate with others and express themselves through sharing content such as photos and music and comments about products and brands. Whilst the primary motive for using social networking sites is to keep in touch with family and friends, some interesting consumption related motives have also emerged (Yellow 2018). According to a recent survey, 28% of users cited 'to follow or find particular brands or businesses', 22% of users cited 'to research products / services you might want to buy', and 10% of users cited 'to provide reviews / blogs about products you have bought' as reasons for use (Yellow 2018). The 22% of people who cited 'to research products services you might want to buy' as a main motive for use were asked to list the types of products they typically search for with results showing popular items include clothing and fashion, appliances and electronic equipment, furniture / homewares, trade services, cosmetics and beauty products, health and medical services, and computer hardware and software (Yellow 2018). Additionally, 59% of respondents indicated that the last time they used social media for the purpose of researching a product or service it resulted in a purchase (Yellow 2018). As such, interactions that take place on social networking sites can have a powerful influence on consumption behaviour and thus, understanding the nature in which consumers are communicating on social networking sites is paramount for marketing practitioners.

RESEARCH GAPS

Upon review of past studies in the research areas of word-of-mouth and social media, it is evident there exist several gaps in the literature that support the need not only for further research but additionally for development of a holistic model in order to measure influence. The first of such gaps relates to incorporation and measurement of the various antecedent and moderating characteristics of word-of-mouth communications. Despite being acknowledged as significant moderators of influence from word-of-mouth communications, receiver characteristics such as prior knowledge, personal involvement, and personal expertise are often neglected. As Subramani and Rajagopalan (2003) highlight, additional research is also required into product characteristics that can affect the influence of communications such as the level of involvement and the nature of the product (hedonic / utilitarian). Whilst numerous word-of-mouth studies have acknowledged the interaction of combinations of characteristics, such as sender and receiver characteristics (Bone 1995; Fan and Miao 2012), sender and message characteristics (Jalilvand, Esfahani, and Samiei 2011; Lee and Koo 2012; Li and Zhan 2011; Schindler and Bickart 2012), receiver and message characteristics (Floh, Koller, and Zauner 2013), sender and product characteristics (Smith, Menon, and Sivakumar 2005), and sender, message, and product characteristics (Adjei, Noble, and Noble 2010), there remains a lack of research incorporating all of these factors and the numerous variables within them. Secondly, whilst outcomes such as perceived influence, purchase intention, and share intention have been explored in past studies, they have typically only been measured by a single item and / or measured in conjunction with other behavioural intentions. As single item measures have low reliability and may not capture the total concept of the variable, further studies should engage in more rigorous testing of these variables, utilising separate multi-item constructs to measure each unique outcome. Lastly, whilst social media and electronic word-of-mouth studies have explored the effectiveness of various platforms such as emails (Shabsogh, Liao, and Reynolds 2012), reviews (Cheung and Lee 2012; Park and Kim 2008; Park and Lee 2009), and blogs (Chu and Kamal 2008), no previous studies have examined the effectiveness of social networking sites as a platform for word-of-mouth communications. Thus, research into social networking sites and the various forms of communications within them is required.

SOCIAL NETWORKING SITE WORD-OF-MOUTH FRAMEWORK

Drawn from the review of past research on the operation of word-of-mouth and the subsequent research gaps identified, Figure 1 proposes a holistic conceptual framework of the operation of word-of-mouth communications on social networking sites.

RECEIVER CHARACTERISTICS
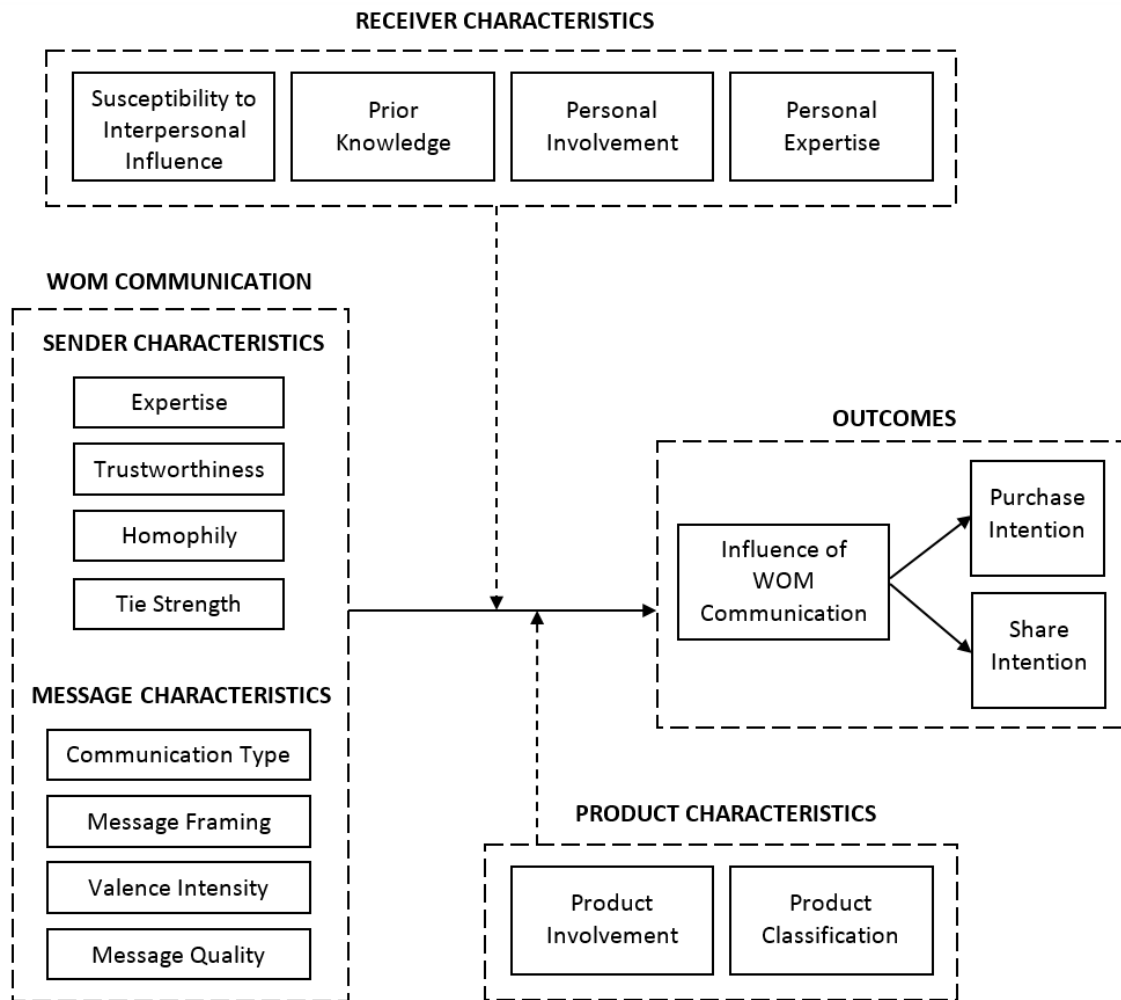
Figure 1: Framework of Social Networking Site Word-of-Mouth Communications

Sender Characteristics

Whilst previous studies have identified the sender characteristics of expertise, trustworthiness, homophily, and tie strength as antecedents to influence from word-of-mouth communications, they have typically only tested combinations of one or two characteristics, for example, expertise and homophily (Gilly et al. 1998), expertise and tie strength (Bansal and Voyer 2000), and homophily, expertise, and trustworthiness (Shabsogh, Liao, and Reynolds 2012), and not all four characteristics. Additionally, whilst the four sender characteristics have been found to be positively related to influence for traditional word-of-mouth communications (Bansal and Voyer 2000; Brown and Reingen 1987; Gilly et al. 1998), electronic word-of-mouth studies haven't always confirmed this with Airs and Ang (2012) finding no significant relationship for homophily and Steffes and Burgee (2009) finding no significant relationship for tie strength. As traditional word-of-mouth originates from a sender known to the receiver, their credibility can by evaluated however due to the nature of electronic word-of-mouth, the anonymity of senders doesn't facilitate this evaluation given the weak tie strength of strangers. As communication exchanges on social networking sites are more representative of traditional word-of-mouth than electronic word-of-mouth due to receivers' existing friendship with the sender, it is anticipated that as with traditional word-of-mouth, all four sender characteristics will be positively related to influence for communications exchanged on social networking sites.

Message Characteristics

Message characteristics refer to aspects of the actual message being communicated, independent of the characteristics of the sender and receiver. Four key characteristics of messages are acknowledged as impacting the level of influence of communications; communication type, message framing, valence intensity, and message quality. Communication type refers to the means by which a message is communicated from a sender to a receiver (e.g. review, comment, share, like, etc.). Message framing refers to whether the communication is written in a positive or negative tone whilst valence intensity, also referred to as argument quality or argument strength, refers to the persuasive strength of arguments contained within word-of-mouth communications (Cheung and Thadani 2012). Valence intensity has been found to play a significant role in the level of influence of word-of-mouth communications with stronger messages bearing greater influence than weaker messages resulting in stronger responses (Floh et al. 2013). Message quality refers to the content of a communication (the information it provides) and the style in which it is written (Schindler and Bickart 2012). Communications can vary in length and nature (objective / subjective, evaluative / descriptive) and are subsequently classified as either high or low quality (Lee, Park, and Han 2008). Past research has found a positive relationship between communication quality and influence with high quality communications found to have a greater impact on consumers purchase intentions (Lee et al. 2008; Park, Lee, and Han 2007).

Receiver Characteristics

Moderating the level of influence of word-of-mouth communications are the receiver characteristics of susceptibility to interpersonal influence, prior knowledge, personal involvement, and personal expertise. The susceptibility to interpersonal influence construct is derived from influenceability theory which purports that individuals respond differently from one another in the presence of social influence (Cox & Bauer 1964). Janis (1954) cites early studies that suggest some individuals are highly amenable to social influence whilst others are predisposed to be resistant. Based on this theory of differences in response to social influence, it is possible that two individuals could receive the same message however be influenced differently dependent upon their susceptibility to interpersonal influence rendering it an important factor to control for when measuring influence from word-of-mouth communications. Prior knowledge refers to a receiver's prior knowledge of or familiarity with a product or brand and is based on consumers' memories or known knowledge (Shirin and Kambiz 2011). When receivers have no prior knowledge of a product, they are more likely to be receptive of information regarding the product (Bansal and Voyer 2000). However, if they are familiar with the product and hold existing attitudes towards the product then they will be less affected by word-of-mouth communications (Bansal and Voyer 2000). Receiver's personal involvement refers to the importance an individual places on a product and describes the feelings of interest and enthusiasm consumers hold toward product categories (Goldsmith and Emmert 1991). High-involvement consumers may be more influenced by word-of-mouth than low-involvement consumers who may be less attentive if they do not consider the product to be important (Skourtis et al. 2012). Due to this, personal involvement is recognised as a significant moderator of the influence of word-of-mouth communications (Skourtis et al. 2012; Wu and Wang 2011). Personal expertise refers to the extent to which an individual perceives themselves to be knowledgeable, competent, trained, and experienced in relation to a particular subject (Adjei et al. 2010). Consumers who consider themselves as having greater expertise are likely to place less value on information provided by others and thus be less influenced by information received (Adjei et al. 2010). Conversely, consumers who consider themselves less informed regarding a product acknowledge the need for additional information and thus are more likely to be influenced by information received (Adjei et al. 2010).

Product Characteristics

An additional important factor to consider when exploring the influence of word-of-mouth communications is the moderating effect of the type of purchase decision the communication relates to. Purchase decisions can be classified according to the level of product involvement (high or low) and whether the products being purchased are considered to be hedonic or utilitarian (Stafford, Stafford, and Day 2002). Product involvement refers to the effort consumers exert in the decision making process prior to purchasing a product (Solomon et al. 2014). Due to the increased risk and more complex nature of the decision making process for high involvement products, consumers typically seek out more information before purchasing these types of products than they do for low involvement products (Lovelock and Wirtz 2007). Products can be classified as being either utilitarian or hedonic in nature (Botti and McGill 2011). Past research has found that the influence of word-of-mouth communications differs dependent upon whether the product being reviewed is of a utilitarian or hedonic nature (Sen and Lerman 2007).

Outcomes

The outcomes of a communication are described by Hovland (1948) as how the behaviour of the receiver is modified following receipt of the communication. The first outcome is that of influence as a receiver must first be influenced by a communication for it to lead to behavioural change (Smith et al. 2005). If a receiver doesn't pay attention to a communication or receives a communication but ignores it, no behavioural changes will be effected. Once a communication has been acknowledged as having an influence on the receiver, the resultant behavioural outcomes can be explored. Purchase intention is defined as an individual's willingness to purchase and perceived likelihood of purchasing a particular brand, product, or service (Rezvani et al. 2012). Past studies have generally found a positive relationship between word-of-mouth communications and purchase intention; that positive word-of-mouth has a positive impact on purchase intention and negative word-of-mouth has a negative impact on purchase intention (Jalilvand and Samiei 2012; Skourtis et al. 2012; Sparks and Browning 2011). Whilst many word-of-mouth studies have examined purchase intention as an outcome, few studies have focused on share intention or willingness to recommend. Furthermore, whilst some studies have measured willingness to recommend, it has typically only been measured by a single item in conjunction with other behavioural intentions such as purchase intention. Share intention is an important outcome to include in word-of-mouth research as whilst receivers' purchase intentions may not be influenced, they may share the communication with others who in turn may be influenced, termed amplification (Lipsman et al. 2012).

CONCLUSION

This study contributes theoretically to the existing body of knowledge on social influence through conceptualising a holistic model of the operation of word-of-mouth on social networking sites. Whilst previous studies have acknowledged and tested varying combinations of outcomes and sender, message, receiver, and product characteristics, none have expanded on this to develop a holistic model encompassing all of these variables nor anything capable of accurately measuring the word-of-mouth effect on social networking sites. As such, this framework will prove useful for marketing practitioners in understanding how consumers are influenced by one another on social networking sites.

REFERENCES

Adjei, M.T., Noble, S.M., & Noble, C.H. (2010). "The Influence of C2C Communications in Online Brand Communities on Customer Purchase Behaviour". *Journal of the Academy of Marketing Science*, 38(5), 634-53.

Airs, M., & Ang, L. (2012). "Avoiding Ads on Facebook Brand Pages: An Empirical Study into Brand Page Content and Homophily". Proceedings of the Australia and New Zealand Marketing Academy Conference 2012. Adelaide, Australia.

Bansal, H.S., & Voyer, P.A. (2000). "Word-of-Mouth Processes Within a Services Purchase Decision Context". *Journal of Service Research, 3*(2), 166-77.

Bone, P.F. (1995). "Word-of-Mouth Effects on Short-Term and Long-Term Product Judgments". *Journal of Business Research, 32*(3), 213-23.

Botti, S., & McGill, A.L. (2011). "The Locus of Choice: Personal Causality and Satisfaction with Hedonic and Utilitarian Decisions". *Journal of Consumer Research, 37*(6), 1065-78.

Brown, J.J., & Reingen, P.H. (1987). "Social Ties and Word-of-Mouth Referral Behavior". Journal of Consumer Research, 14(3), 350-362.

Cheung, C.M.K., & Lee, M.K.O. (2012). "What Drives Consumers to Spread Electronic Word of Mouth in Online Consumer-Opinion Platforms". *Decision Support Systems, 53*(1), 218-25.

Cheung, C.M.K., & Thadani, D.R. (2012). "The Impact of Electronic Word-of-Mouth Communication: A Literature Analysis and Integrative Model". *Decision Support Systems, 54*(1), 461-70.

Chitty, W., Hughes, A., & D'Alessandro, S. (2012). *Services Marketing*. South Melbourne, VIC: Oxford.

Chu, S.C., & Kamal, S. (2008). "The Effect of Perceived Blogger Credibility and Argument Quality on Message Elaboration and Brand Attitudes: An Exploratory Study". *Journal of Interactive Advertising, 8*(2), 1-31.

Cox, D., & Bauer, R.A. (1964). "Self-Confidence and Persuasibility in Women". *Public Opinion Quarterly, 28*(3), 453-66.

Fan, Y.W., & Miao, Y.F. (2012). "Effect of Electronic Word-of-Mouth on Consumer Purchase Intention: The Perspective of Gender Differences". *International Journal of Electronic Business Management, 10*(3), 175-81.

Floh, A., Koller, M., & Zauner, A. (2013). "Taking a Deeper Look at Online Reviews: The Asymmetric Effect of Valence Intensity on Shopping Behaviour". *Journal of Marketing Management, 29*(5-6), 646-70.

Gilly, M.C., Graham, J.L., Wolfinbarger, M.F., & Yale, L.J. (1998). "A Dyadic Study of Interpersonal Information Search". *Journal of the Academy of Marketing Science, 26*(2), 83-100.

Goldsmith, R., & Emmert, J. (1991). "Measuring Product Category Involvement: A Multitrait-Multimethod Study". *Journal of Business Research, 23*(4), 363-71.

Hovland, C.I. (1948). "Social Communication". *Proceedings of the American Philosophical Society, 92*(5), 371-75.

Jalilvand, M.R., Esfahani, S.S., & Samiei, N. (2011). "Electronic Word-of-Mouth: Challenges and Opportunities". *Procedia Computer Science, 3*, 42-6.

Jalilvand, M.R., & Samiei, N. (2012). "The Effect of Electronic Word of Mouth on Brand Image and Purchase Intention: An Empirical Study in the Automobile Industry in Iran". *Marketing Planning & Intelligence, 30*(4), 460-76.

Janis, I.L. (1954). "Personality Correlates of Susceptibility to Persuasion". *Journal of Personality, 22*(4), 504-18.

Lee, K.T., & Koo, D.M. (2012). "Effects of Attribute and Valence of e-WOM on Message Adoption: Moderating Roles of Subjective Knowledge and Regulatory Focus". *Computers in Human Behavior, 28*(5), 1974-84.

Lee, J., Park, D.H., & Han, I. (2008). "The Effect of Negative Online Consumer Reviews on Product Attitude: An Information Processing View". *Electronic Commerce Research and Applications, 7*(3), 341-52.

Li, J., & Zhan, L. (2011). "Online Persuasion: How the Written Word Drives WOM – Evidence from Consumer-Generated Product Reviews". *Journal of Advertising Research, 51*(1), 239-57.

Lipsman, A., Mudd, G., Aquin, C., & Kemp, P.K. (2012). *The power of like 2: How social marketing works*. Comscore.

Lovelock, C. & Wirtz, J. (2007). *Services Marketing: People, Technology, Strategy* (6th ed.). Upper Saddle River, NJ: Pearson Prentice Hall.

Park, D.H., & Kim, S. (2008). "The Effects of Consumer Knowledge on Message Processing of Electronic Word-of-Mouth via Online Consumer Reviews". *Electronic Commerce Research and Applications, 7*(4), 399-410.

Park, C., & Lee, T.M. (2009). "Information Direction, Website Reputation and ewom Effect: A Moderating Role of Product Type". *Journal of Business Research, 62*(1), 61-7.

Park, D.H., Lee, J., & Han, I. (2007). "The Effect of On-line Consumer Reviews on Consumer Purchasing Intention: The Moderating Role of Involvement". *International Journal of Electronic Commerce, 11*(4), 125-48.

Redsicker, P. (2013). New Facebook marketing research shows what works. Retrieved from https://www.socialmediaexaminer.com/new-facebook-marketing-research/

Rezvani, S., Dehkordi, G.J., Rahman, M.S., Fouladivanda, F., Habibi, M, & Eghtebasi, S. (2012). "A Conceptual Study on the Country of Origin Effect on Consumer Purchase Intention". *Asian Social Science, 8*(12), 205-15.

Schindler, R.M., & Bickart, B. (2012). "Perceived Helpfulness of Online Consumer Reviews: The Role of Message Content and Style". *Journal of Consumer Behaviour, 11*(3), 234-43.

Sen, S., & Lerman, D. (2007). "Why Are You Telling Me This? An Examination Into Negative Consumer Reviews on the Web". *Journal of Interactive Marketing, 21*(4), 76-94.

Shabsogh, N., Liao, M.N., & Reynolds, N. (2012). "The Influence of Positive and Negative eWOM on Purchase Intention". *Proceedings of the Academy of Marketing Conference 2012*. Southampton, England.

Shirin, K., & Kambiz, H.H. (2011). "The Effect of the Country-of-Origin Image, Product Knowledge and Product Involvement on Consumer Purchase Decisions". *Chinese Business Review, 10*(8), 601-15.

Skourtis, G., Pollalis, Y., Assiouras, I., & Koniordos, M. (2012). "Exploring the Impact of Product Knowledge and Product Involvement on Receiver's Reactions: The Role of Negative Word of Mouth Motivations". *Proceedings of the Academy of Marketing Conference 2012*. Southampton, England.

Smith, D., Menon, S., & Sivakumar, K. (2005). "Online Peer and Editorial Recommendations, Trust, and Choice in Virtual Markets". *Journal of Interactive Marketing, 19*(3), 15-37.

Solomon, M.R., Hughes, A., Chitty, B., Marshall, G.W., & Stuart, E.W. (2014). *Marketing: Real People, Real Choices* (3rd ed.). Frenchs Forest, NSW: Pearson.

Sparks, B.A., & Browning, V. (2011). "The Impact of Online Reviews on Hotel Booking Intentions and Perception of Trust". *Tourism Management, 32*(6), 1310-23.

Stafford, M.R., Stafford, T.F., & Day, E. (2002). "A Contingency Approach: The Effects of Spokesperson Type and Service Type on Service Advertising Perceptions". *Journal of Advertising, 31*(2), 17-36.

Steffes, E.M., & Burgee, L.E. (2009). "Social Ties and Online Word of Mouth". *Internet Research*, 19(1), 42-59.

Subramani, M.R., & Rajagopalan, B. (2003). "Knowledge-Sharing and Influence in Online Social Networks via Viral Marketing". *Communications of the ACM, 46*(12), 300-07.

Wu, P.C.S., & Wang, Y.C. (2011). "The Influences of Electronic Word-of-Mouth Message Appeal and Message Source Credibility on Brand Attitude". *Asia Pacific Journal of Marketing and Logistics, 23*(4), 448-72.

Yellow. (2018). *Yellow Social Media Report 2018: Part One - Consumers*. Melbourne: Yellow.

How Mother-Daughter Purchase Interaction Affects Daughter's Situational Self Construction in Japan

Mototaka Sakashita, Keio University, Japan
Junko Kimura, Hosei University, Japan

INTRODUCTION

During major transitions between life stages, consumers are often required to act properly in a new environment that is totally different from the previous one (Andresen 1984). It is assumed that consumers try to project what they consider the most appropriate self-image in each of these transitions, but face a variety of difficulties in doing so. This is partly because they cannot decide which ideal self-image they should project in the new role in a totally unknown environment.

Faced with this transitional stage, a daughter often determines her ideal situational self through dynamic interactions with her mother. The specific consumer behavior context we focus on is the catalogue shopping in the cultural sphere of Japan, where the mother-daughter relationship is unique. We anticipated that a Japanese daughter is often controlled by her mother who acts as a significant other for her daughter. In these situations we expected that a mother tries to determine her daughter's ideal self-image by exerting control over her daughter, while the daughter is willing to accept her mother's control to a certain degree. This study aims to explore the diversity of a daughter's situational self construction, particularly from the viewpoint of her dynamic interactions with the mother. By stressing the importance of the role of the interfamilial relationship, the concept of situational self can be further refined.

THEORETICAL BACKGROUND

Situational Self

Situational self is defined as "the meaning of self an individual wishes others to have of him/herself (Schenk and Holman 1980, 611)." One's self image — how he/she wishes to be seen by others — differs in different environments (Hollenbeck and Kaikati 2012). Thus, consumers are thought to engage in acts of possession of consumption objects based on the self image that is suitable to the particular environment (Belk 1988).

There are various types of situations that effect consumers (Belk 1975) who are known to select a brand among a variety of choices in accordance with those situations (Bettman, Luce, and Payne 1998). Consequently, consumers' brand selections become diversified according to the situation. This diversification of brand selections is partly attributed to the rise of a corresponding situational self (Schenk and Holman 1980). This differs from the notion of plural self, in which multiple selves are seen to arise across situations (Ahuvia 2005; Bahl and Milne 2010).

The study of the situational self has been concentrated on the explanation of the brand choice. While there have been a number of studies on how situational self affects consumers' behavior (Belk 1974; Bishop and Witt 1979; Lutz and Kakkar 1975), there have been few studies of how situational self itself is constructed. Therefore, this article argues for the importance of anatomizing the situational dependency of choice phenomena in the context of interpersonal relations by examining different situations creating different ideal self images. We refine the concept of situational self by focusing on the process of the situational self construction within the special relations between a daughter and her mother in Japan. Since self-concept is believed to account for behavioral patterns, it is critical to the study of consumer behaviors (Onkvisit and Shaw 1987).

Coercive Nature of Mother-Daughter Relationship in Japan

While others in general are believed to influence the construction of one's self concept, the others that affect self-development are called *significant others* (Mead 1934). For children, their parents are significant others and mothers are particularly important significant others especially for daughters (Surry 1985; Bohannon et al. 1999).

It has been stressed by a number of scholars that parents help their children's process of socialization (Moschis and Churchill 1978; Roedder John 1999; Sullivan 1947; Turner 1962). Socialization refers to the process through which an individual acquires communally influenced values, attitudes, skills, knowledge, and motivation through interactions with others and, thus, form a pattern of thinking. The family unit generally plays the most influential role in preadults' socialization process (Ward 1978), and mothers' roles are believed to be particularly influential in socializing their daughters in terms of attitudes (Acock and Bengston 1978; Gentina, Huarng, and Sakashita 2018). Daughters, in turn, internalize a large portion of their mothers' behavior, values, thinking, and meanings. By internalizing these properties, they can become like their mothers (Boyd 1989; Chodorow 1978), who, in many cases, present a primary consumption model for their daughters (Gavish, Shoham, and Ruvio 2010).

Mother-daughter relations are particularly close in Japan (Doi 1971; Gentina, Hogg, and Sakashita 2017), which is reflected in their consumption behaviors. It is not unusual for grownup daughters to go out shopping with mothers as if they were friends (Gentina et al. 2018), and this attracts much attention of both marketers and mass media in Japan. Doi (1971) uses the concept of *amae* (dependency) to explain the Japanese trait of depending on others. *Amae* is a concept that means *dependence* and, according to Doi (1971), it is typically found in an infant's inclination to seek an intimate contact with its mother. In Japan, *amae* is not confined only among infants and is also found in children and even in grownups (Clammer 1997; Takemoto 1986).

Occasionally, daughters are coerced to be like their mothers (Weitzman 1984), or led to accomplish the failed dreams of mothers for their sake (Sakashita and Kimura 2010). Mother-daughter relations are maintained while daughters internalize mothers' values and, at the same time, pursue their self-development.

Considerate Nature of Mother-Daughter Relationship in Japan

Mother-daughter relations in today's Japan, however, cannot be explained solely in terms of a daughter's simple dependence on her mother. A daughter often appears to be devoid of self-reliance in her interactions with her mother; however, it is not a simple dependence and, on the contrary, it is actually an attempt by the daughter to actively help her mother (Maeda 2008; Takemoto 1986). For instance, Maeda (2008) reports on a case in which what appears to be a daughter's financial dependence on her parents turns out to be the parents' attempt to hold on to their daughter by financially assisting her. This is a case of parents-dependent-on-their-child, the total opposite to the presumably ordinary pattern of children depending on their parents. What is stressed here is the attitude of the daughter who actively tries to help her mother instead of passively depending on her mother.

What is implied by these prior studies is that there is a diversity of mother-daughter relations in contemporary Japan. In general, it is known that mothers try to control their daughters through the process of socialization (Gentina et al. 2018), while daughters generally accept their mothers' control through an internalization process. This phenomenon, however, cannot be explained only as a simple and unilateral dependence of the daughter on the mother. As revealed by Nobuta and Ueno (2008) as well as Maeda (2008), there also are cases in which daughters willingly try to help their mothers hold on to them. Mother-daughter relations in Japan are, indeed, diverse and so are the attitudes of daughters in these interactions.

PROPOSITION

Based on above discussions, we propose the following proposition:

In a daughter's situational self construction process, the mother as a significant other tries to interfere in the process by exerting control over the daughter, while the daughter tends to accept the control by mother. However, this control-acceptance interaction can take two different patterns, either dependency-oriented or consideration-oriented, since mother-daughter relations are highly diverse.

METHOD

The complex interplay of individual, relational, and collective identity practices tends to be neglected by family researchers (Epp and Price 2008), thus the present study employs a unique method to overcome this limitation. Specifically, relying on the interpretive approach, it aims to comprehensively understand mother-daughter relations by combining observation of the video recordings of actual purchasing processes on one hand, and multiple qualitative data collected through subsequent semi-structured depth interviews on the other. In high-context cultures like Japan, people tend not to speak out their thoughts; instead, they often use non-verbal communication, such as nodding, staring, hand gesticulations, and so forth (Hall 1976). Hence, the present study tried to collect and interpret not only the explicit verbal data, but also the implicit non-verbal communications.

In order to grasp the uniqueness of mother-daughter relations, six mother-daughter pairs were recruited and requested to conduct catalogue shopping using fashion magazines. The six mother-daughter pairs were requested to browse a fashion magazine together and talk freely about fashions as they normally do, to choose one outfit to be purchased, which they believed would change the current image of the daughter. We chose the catalogue shopping situation because it would allow us to collect an abundance of qualitative data on mother-daughter interactions in a relatively natural environment.

After the item to be purchased was decided, mother-daughter pairs were interviewed on the catalogue shopping they just enacted, and their usual fashion-related behaviors. In the interview, the mother and the daughter were asked questions together, so they were aware of being heard by the other person. Since the purpose of the present study is to cultivate a better understanding of the puzzling mother-daughter relationship in Japan, this unique data collection method was employed so that the data better reflects the true nature of the relationship, leaving more genuine and realistic interaction data compared to individual data collection in isolation.

All six daughters were junior or senior college students of 22 or 23 years of age, who were in stages of preparation for employment after graduation. Therefore, selection of the outfit to change their images that they were requested to make in the study was in preparation for the major turning point in their life, employment. The six pairs spent between 30 to 40 minutes to choose an item to be purchased

from the magazine, followed by post-choice interviews which lasted for about one hour. Each pair was presented with the honorarium of \10,000 (about US$95) which was the contribution toward the actual purchase of the item they chose. To record the entire process of catalogue shopping and the interview, two video cameras were employed. In order to ensure the credibility of data, four independent coders, separate from participating researchers, were employed to transcribe collected verbal and non-verbal data, which were checked several times by the two researchers.

DESCRIPTION

This section is devoted to interpretation of the qualitative data we collected. Overall, it was confirmed that mothers tried to control their daughters, while the daughters were trying to construct a self image that was suitable to the situation. Anxious about their uncertain futures, daughters were willing to accept the ideal self that their mothers suggested to them, but the control-acceptance pattern was highly variable among informants.

More specifically, the following four patterns were observed. First, *dependency-oriented acceptance*, in which the daughter, who was totally dependent on her mother, accepted mother's control so that she herself could be carefree. In this pattern, the daughter was often a passive being and simply followed her mother's advice; therefore, this was named the *Meek Maid*. On the contrary, daughters sometimes showed greater agency and a more active trait, carefully evaluating her mother's guidance in deciding whether to accept it. This pattern was named the *Discreet Follower*. In addition to these two dependency-oriented patterns a second basic pattern involved *consideration-oriented acceptance*, where the daughter was willing to accept her mother's control, fully aware that her mother was trying to impose her own preferences on her. In this case, sometimes daughters showed passivity, gently letting their mothers take control; therefore, this pattern of acceptance was named the *Thoughtful Sympathizer*. However, in some other cases, they actively chose to depend on their mothers for the mothers' sake, fully aware of the mothers' wish to control them, which was beyond a simple dependence on mothers. This pattern of acceptance was thus named the *Cheerful Altruist*. Table 1 summarizes the four patterns with corresponding verbatim with non-verbal communications.

DISCUSSION

Implications

We believe the present study makes the following three theoretical contributions. First, by calling attention to the importance of interpersonal relations in the situational self concept, the present study has contributed to the refinement of the construct. While situational self concept has been regarded as an explanatory factor for the brand-choice diversity, the present study has succeeded in highlighting its dynamic nature by focusing on the construction process of situational self itself. At the same time, the present study indicates that the process of situational self construction is affected by subjects' relations with a significant other. This is why we focused on collecting data in a pair-wise setting, rather than individual-based interviews. Based on this finding, the present study stresses the importance of exploring the situational dependence of the situational self construction process itself.

A second contribution is related to the finding that even when the mother and the daughter appear to make a similar selection behavior, their perceptions and thinking can be totally different. Intergenerational research generally suggests that many forms of influence are transmitted from parents to their children (Moore, Wilkie

and Alder 2001; Moore, Wilkie and Desrochers 2017; Moore, Wilkie and Lutz 2002), and prior studies (Boyd 1989; Chodorow 1978) point out how parents' behavior, values, thinking, and meanings are passed on to children and this is particularly noticeable in the case of mothers' socialization of their daughters. Findings obtained through interpretations of qualitative data in the present study imply, however, that the phenomenon of child's socialization by parents can no longer be understood in the simple schemes of the past.

Thirdly, the present study makes an important contribution to the understanding of complex relations between mother and daughter in Japan. It has shown that it is possible to describe and interpret subjects' behaviors more accurately by combining an original observation method, which enables data collection in more natural environment, and a post interview. As findings of the present study reveal, the influence of mother-daughter relations during the daughter's situational self construction process can be grasped only through the dynamic interactions between them due to the uniqueness of these

informative, focusing on different life stages such as marriage, child birth, and divorce.

Moreover, it should be recalled that consumers are not only enmeshed in mother-daughter relations, the main subject of the present study, but also in many other relations, including friends, lovers, relatives, and peers. Considering that the situational self construction process itself is affected by interpersonal relations that consumers have, it would be highly valuable to make a similar exploration into other relations than the mother-daughter relations. It is hoped that further studies will be made on the role of interpersonal relations in the situational self construction process.

DATA COLLECTION INFORMATION

The first and second authors jointly collected all the data in the spring of 2008, supervised the data documentation by research assistants at Sophia University, and interpreted the data.

Table 1: Acceptance Patterns and Corresponding Verbatim with Actions (in parenthesis)

	Dependency-Oriented Acceptance	Consideration-Oriented Acceptance
Passive	**Meek Maid** *Nana: (stares at her mother) I almost always go shopping with my mom. (stares at her mother)* *Mother V: Right, she can't make a decision by herself. (stares at her daughter)* *Nana: That's right. I can't make a decision by myself. Ha-ha. (laughter)* *Mother V: (laugher)* *Interviewer: (laughingly) Is that right?* *Nana: Because I can't make up my mind alone, it's the easiest when my mom is with me.*	**Thoughtful Sympathizer** *Eri: Ha-ha. (laughter) How about this one? (asking for Mother W's reaction)* *Mother W: Well, this can go with so many things. I think it's good. You don't think so? (asking for Eri's reaction) (staring at Eri)* *Eri: No, no. I think it's good, too. It's cute (pointing at the outfit).* *Mother W: It goes well with everything.* *Eri: What color? Grey? (asking for Mother W's comment)* *Mother W: I think it should be black.*
Active	**Discreet Follower** *Interviewer: So, you abuse your daughter's choice roundly? (laughter)* *Eri: Yes, she would say stuffs like "You don't look too good in it."* *Mother W: Isn't it better then to go shopping with me and have my approval? (laughingly)* *Eri: I may be too dependent on you.* *Interviewer: (to Eri) You mean you are too dependent on your mother?* *Eri: Yes. (nods) When we go shopping together, I won't buy a thing before asking for my mom's preferences and approval.*	**Cheerful Altruist** *Interviewer: Did you select this item because you thought it fitted your mother's preference?* *Mother X: (stares at her daughter)* *Mai: Yes, you can say that. Our preferences are so different. When putting post-its, we chose totally different items.* *Mother X: I also chose this one. We both chose this one.* *Mai: I thought I had to select an item that we both liked and picked up this one. But mom said, "This one is better." (pointing at an item) Then I said it should be this one [The one her mother preferred]. (laughter)*

relations. Therefore, our study calls not only for collecting an abundance of qualitative data through similar research methods but also pursuing deep interpretations of data collected.

Limitations and Future Research Directions

While the present study succeeded in anatomizing the dynamic nature of the situational self construction process from the unique perspective of mother-daughter relations, it is not free from its own limitations. It should be noted, first of all, that all the informants in the present study were mother-daughter pairs who live together and maintain relatively intimate relations. Although all the daughters in the present study accepted the choice of outfit to be purchased as the one preferred by their mothers, whether a similar phenomenon can be observed between not-so-intimate mother-daughter pairs needs to be investigated. Also, comparisons to other cultures can be highly

REFERENCES

Acock, Alan C. and Vern L. Bengston (1978), "On the Relative Influence of Mothers and Fathers: A Covariance Analysis of Political and Religious Socialization," *Journal of Marriage and the Family,* 40, 519-30.

Ahuvia, Aaron C. (2005), "Beyond the Extended Self: Loved Objects and Consumers' Identity Narratives," *Journal of Consumer Research,* 32 (June), 171-84.

Bahl, Shalini and George R. Milne (2010), "Talking to Ourselves: A Dialogical Exploration of Consumption Experiences," *Journal of Consumer Research,* 37 (June), 176-95.

Belk, Russell W. (1974), "An Exploratory Assessment of Situational Effects in Buyer Behavior," *Journal of Marketing Research,* 11 (May), 156-63.

——— (1975), "Situational Variables and Consumer Behavior," *Journal of Consumer Research,* 2, 157-64.

——— (1988), "Possessions and the Extended Self," *Journal of Consumer Research,* 15 (2), 139–68.

——— (1989), "Extended Self and Extending Paradigmatic Perspective," *Journal of Consumer Research,* 16 (June), 129-32.

Bettman, James R., Mary F. Luce, and John W. Payne (1998), "Constructive Consumer Choice Processes," *Journal of Consumer Research,* 25, 187-217.

Bishop, Doyle W. and Peter A. Witt (1970), "Sources of Behavioral Variance During Leisure Time," *Journal of Personality and Social Psychology,* 16 (October), 352-60.

Bohannon, Judy R. and Priscilla W. Blanton (1999), "Gender Role Attitudes of American Mothers and Daughters Over Time," *Journal of Social Psychology,* 139 (2), 173-79.

Boyd, Carol (1985), "Toward an Understanding of Mother-Daughter Identification Using Concept Analysis," *Advances in Nursing Science,* 7 (3), 78-86.

Clammer, John (1997), *Contemporary Urban Japan: A Sociology of Consumption,* Oxford, Blackwell.

Chodorow, Nancy (1978), *The Reproduction of Mothering*, Berkeley, CA: University of California Press.

Doi, Takeo (2001/1971), *The Anatomy of Dependence,* Tokyo, Kodansha.

Epp, Amber M. and Price, Linda L. (2008), "Family Identity: A Framework of Identity Interplay in Consumption Practices," *Journal of Consumer Research*, 35 (June), 50-70.

Gavish, Yossi S., Aviv Shoham, and Ayalla Ruvio (2010), "A Qualitative Study of Mother-Adolescent," *Journal of Consumer Marketing,* 27 (1), 43-56.

Gentina, Elodie, Margaret K. Hogg, and Mototaka Sakashita (2017), "Identity (Re)construction Through Sharing: A Study of Mother and Teenage Daughter Dyads in France and Japan," *Journal of Retailing and Consumer Services,* 37, 66-77.

Gentina, Elodie, Kun-Huang Huarng, and Mototaka Sakashita (2018), "A Social Comparison Theory Approach to Mothers' and Daughters' Clothing Co-Consumption Behaviors: A Cross-Cultural Study in France and Japan," *Journal of Business Research,* 89, 361-70.

Hall, Edward (1976), *Beyond Culture*, New York, NY: Doubleday.

Hogg, Margaret K. and Maria H. Savolainen (1998), "Symbolic Consumption and the Situational Self," *European Advances in Consumer Research,* 3, 11-6.

Hollenbeck, Candice R. and Andrew M. Kaikati (2012), "Consumers' Use of Brands to Reflect Their Actual and Ideal Selves on Facebook," *International Journal of Research in Marketing*, 29, 395-405.

Lutz, Richard J. and Kakkar K. Pradeep (1975), "The Psychological Situation as a Determinant of Consumer Behavior," *Advances in Consumer Research,* 2, 439-54.

McCracken, Grant (1986), "Culture and Consumption: A Theoretical Account of the Structure and Movement of the Cultural Meaning of Consumer Goods," *Journal of Consumer Research,* 13 (June), 71-84.

Maeda, Eriko (2008), "Relational Identities of Always-Single Japanese Women," *Journal of Social and Personal Relationships,* 25 (6), 967-87.

Mead, George H (1934), *Mind, Self, and Society*, Chicago, IL: University of Chicago Press.

Moore, Elizabeth S., Wilkie, William L. and Lutz, Richard J. (2002), "Passing the Torch: Intergenerational Influences as a Source of Brand Equity," *Journal of Marketing*, 66, 17-37.

Moore, Elizabeth S., Wilkie, William L. and Alder, Julie A. (2001), "Passing The Torch: How Do Intergenerational Influences Develop?," *Advances in Consumer Research*, 28, 287-93.

Moore, Elizabeth S., Wilkie, William L. and Desrochers, Debra M. (2017), "All in the Family? Parental Roles in the Epidemic of Childhood Obesity," *Journal of Consumer Research*, 43 (5), 824-59.

Moschis, George P. and Churchill, Gilbert A. (1978), "Consumer Socialization: A Theoretical and Empirical Analysis," *Journal of Marketing Research*, 15, 599-609.

Nobuta, Sayoko, and Chizuko Ueno (2008), "Slime Haha to Hakamori Musume. (in Japanese)," *Eureka,* December, 73-88.

Onkvisit, Sak, and John Shaw (1987), "Self-Concept and Image Congruence: Some Research and Managerial Implications," *Journal of Consumer Marketing,* 4 (1), 13-23.

Roedder, John Deborah (1999), "Consumer Socialization of Children: A Retrospective Look at Twenty-Five Years of Research," *Journal of Consumer Research,* 26 (December), 183-213.

Sakashita, Mototaka, and Junko Kimura (2010), "Daughter as Mother's Extended Self," *European Advances in Consumer Research,* 9, 283-89.

Saren, Michael (2007), "To Have is To Be? A Critique of Self-Creation Through Consumption," *The Marketing Review,* 7 (4), 343-54.

Schenk, Carolyn T. and Rebecca H. Holman (1980), "A Sociological Approach to Brand Choice: The Concept of Situational Self Image," *Advances in Consumer Research,* 7, 610-14.

Sullivan, Harry S. (1947), *Conceptions of Modern Psychology*, Washington, DC: William A. White Psychiatric Foundation.

Surrey, Janet L. (1985), *Self-in-Relation: A Theory of Women's Development*, Stone Center for Development Services and Studies, Wellesley College.

Takemoto, Yasuhiko (1986). AMAE as Metalanguage: A Critique of Doi's Theory of Amae," *Journal of American Psychoanalysis,* 14, 525-44.

Turner, Ralph H. (1962), "Role-Taking Process Versus Conformity," *Human Behavior and Social Processes: An Interactionist Approach,* Boston, MA: Houghton Mifflin.

Ward, Scott (1978), "Contributions of Socialization Theory to Consumer Behavior Research," *The American Behavioral Scientist*, 21(4), 501-14.

Weitzman, Lenore (1984), "Sex-Role Socialization: A Focus on Women," *Women: A Feminist Perspective* (3rd ed.), Palo Alto, CA: Mayfield Publishing.

Reward Choice in Multi-Level Loyalty Programs

Serdar Sayman, Koc University, Turkey
Ayse Onculer, ESSEC Business School, France

INTRODUCTION

A loyalty program offers a reward to the customer when accumulated purchases (or miles, points, etc.) reach a certain level. Over $1 trillion worth of miles are accrued worldwide in airline miles, credit card points, and other reward programs (Bonnassies, 2018). Many loyalty programs feature multi-level rewards with different purchase requirements. For example, as a part of its reward program, Walgreens offers gift cards of value $10 for 10K points, $20 for 18K points and so on. The current paper focuses on customers' reward choice in such multi-level programs and examines the role of purchase rate in their choice. In the exemplar case of a program with two rewards (small versus large in value), we propose and provide evidence that frequent buyers are more likely to choose the larger reward than light (infrequent) buyers.

If the loyalty program has a limited duration (or if the customer has a short planning horizon), the only viable option for a light buyer may be the smaller reward (S) since the larger reward (L) is unattainable. However if the buyer can fulfill the purchase requirements for both S and L, the case is not trivial. Even though L represents a better deal in terms of reward size per requirement, S can be received multiple times, first of which will be reached earlier than L. By nature, light buyers face longer times to reward redemption, compared to frequent buyers, and L represents a worse time trade-off for a light buyer. Thus, a light buyer prefers to receive S multiple times even though she could redeem L, whereas a frequent buyer prefers to wait for L.

In the current paper we propose that buyers with purchase rates lower than a certain threshold (referred to as *light* buyers hereafter) would choose S, and frequent buyers would choose L. Data from two experiments (hypothetical coffeeshop and supermarket programs) and an actual loyalty program of a restaurant booking system support our main proposition. In all studies, we find that more frequent / heavy buyers tend to wait for the larger reward, providing a rare practical insight into the role of purchase rate in loyalty programs.

CONCEPTUAL FRAMEWORK

Customer loyalty programs has been a growing area of research in the last decades, especially in economics and marketing. Economists model loyalty programs as a means to facilitate collusion among firms by creating artificial switching costs (e.g. Banerjee and Summers 1987; Klemperer 1987, 1995). Marketing researchers study the impact of loyalty programs on purchase behavior and share-of-wallet (Sayman and Hoch 2014; Meyer-Waarden 2007; Liu 2007), and on firm metrics (e.g. Lal and Bell 2003; Kopalle et al. 2012) as well as the attractiveness of different rewards types for firms (Kim, Shi, and Srinivasan 2001) and for customers (Kivetz and Simonson 2002, 2003). Breugelmans et al. (2015) offers a concise review of loyalty programs research, largely in the domain of marketing.

Despite the interest in loyalty programs, insight regarding multi-level programs is sparse. Multi-level programs can be used for motivating repeat purchases. One motivational argument is that introducing a smaller reward makes it easier for the customer to reach that reward, and this can motivate her to make a purchase at the beginning of the program (Nunes and Drèze 2004). As purchases accumulate, the larger reward also becomes attainable. Presumably, some buyers targeting the smaller reward may continue to accumulate purchases towards the larger goal. Nunes and Drèze (2004) point out that firms introduce a variety of reward levels as customers are motivated by different levels. We interpret this argument as the choice among different rewards being driven by situational factors or non-systematic differences in customer needs.

A second motivational argument is related to the convex nature of the reward structure -- reward value per purchase requirement is typically higher for larger rewards. O'Brien and Jones (1995) propose that larger rewards motivate customers to spend more. This implies that the smaller reward promotes the attractiveness of the larger reward. Empirical research shows that loyalty programs may encourage spending (e.g. Lewis 2004; Kivetz, Urminsky, and Zheng 2006), but it is not clear whether a multi-level reward structure would enhance purchase intention. While the two arguments mentioned above may partially explain why multi-level rewards exist, they cannot predict any systematic differences between customers that choose S versus those that choose L. In this paper, our goal is to provide some insight into the reward choice behavior.

In contrast to the motivational arguments, Sayman and Usman (2016) propose that multiple reward levels are for targeting different segments. The menu of rewards acts as a price discrimination mechanism, because the smaller reward is also smaller on a *per* purchase basis.

The current paper focuses mainly on the link between purchase rate and the choice between reward levels. We consider a firm offering rewards of monetary value S and L to customers when they complete n and $2n$ purchases respectively. Customers can exchange accumulated purchases for a corresponding reward, and continue to accumulate purchases afterwards for another reward. We assume that the program duration and customer's planning horizon are long enough to allow the customer make a choice between S and L. As the requirements for S and L are different, the customer should compare the stream of S versus L rewards over the same duration. The choice problem can be specified as *receiving S twice versus L once in the course of 2n purchases*. However, customers differ in their purchase rate. We propose that a light buyer, who has a purchase rate p below a certain threshold, would prefer to receive S twice whereas a frequent buyer with would prefer to wait for L within the same duration of the program. This constitutes our main hypotheses:

Hypothesis 1:   *Frequent buyers choose L with a higher probability than light buyers.*

Hypothesis 2:   *The average spending per period of customers choosing L should be higher than of those choosing S.*

In the next sections, we test the relationship between purchase rate and reward redemption choices using (*i*) survey-based data involving hypothetical programs, and (*ii*) data from an actual marketplace loyalty program.

STUDY 1

In Study 1 the purchase frequency is manipulated, as light buyers and frequent buyers, and the choice between S and L is elicited. 98 students from a European business school participated in the on-

Table 1: %L chosen in Study 1

	Frequent Buyer (n=51)	Light Buyer (n=48)
%L chosen	72.5%	50%

line study in exchange for course credit. The study employed a two group (Light Buyers versus Frequent Buyers) between-subjects design.

Respondents were presented with a hypothetical scenario about a coffeeshop offering a new loyalty program. In the frequent-buyer condition, subjects were told to imagine that they bought a beverage every morning from this coffeeshop. In the light-buyer condition, they were told that they bought a beverage twice a week from this shop. In each condition, subjects were asked to report their preference between S (a €2 store credit when they buy 5 hot beverages) or

compared to those who chooses the S reward. These results support Hypothesis 2.

To conclude, the results from the two experimental studies provide convergent support for our prediction, i.e. frequent users are more inclined to wait for L, compared to light users. However, the extent to which subjects would prefer redeeming S once or multiple times is not evident in the two experiments. The field data from the loyalty program provides a better insight to this problem since the actual reward redemption history of the participants is recorded.

Table 2: Average Monthly Spending in Study 2

	Monthly Spending in Euros (SD)
L chosen (n=35)	85.65 (61.29)
S chosen (n=31)	51.22[a] (37.18)
Not interested (n=8)	29.25[b] (31.25)

a: significant with $p < 0.01$; *b*: $p < 0.10$; both two-tailed tests.

L (a €5 store credit when they buy 10 hot beverages). They were also given an option to choose "not interested in this promotion".

Table 1 summarizes the results for the two conditions. None of the subjects chose the "not interested" option. In the frequent-buyer (light-buyer) condition, 72.5% (50%) of the subjects chose the L reward. Chi-square test reveals that the preference for L was significantly higher among frequent buyers then light buyers ($\chi^2 = 5.26$, $p = 0.02$). This finding is consistent with Hypothesis 1.

STUDY 2

This study differs from Study 1 in two ways. First, it involves a program based on the purchase volume, rather than the number of purchases. Secondly, the purchase rate (i.e. volume per period) is a self-reported measure, unlike the light / frequent buyer manipulation employed in Study 1. An online survey was conducted at a European university with 89 student participants. For a (hypothetical) loyalty program initiated by the campus supermarket, we asked the participant's choice between two rewards, and monthly spending level from the supermarket.

In the scenario, the campus supermarket (M) offers a gift check of €5 when cumulative purchases amount to €50, or a check of €12.5 for €100 purchases. Participants were told that these checks can be used at any M store, and there is no time limit for the promotion. Furthermore, after qualifying for and redeeming a check, they can accumulate purchases again and receive additional checks. After describing the program, we asked whether they would prefer to receive the €5 or €12.5 check after the respective purchases. We also provided a "not interested" option. The subjects also reported the monetary amount they spend at M in a typical month.

The monthly spending levels of subjects preferring S versus L rewards are presented in Table 2. A significance indicated with a superscript refers to a comparison with the cell above; e.g. the difference between 51.22 and 85.65 is significant at $p < 0.01$ ($t = 3.06$). Subjects preferring L report a significantly higher purchase level compared to those preferring S. In addition, participants not interested in the program spend significantly less compared to those who would participate, i.e. choose S or L, ($t = 3.47$, $p < 0.01$), but not

FIELD DATA

We use the loyalty program data provided by a leading restaurant booking service. The company operates in 11 countries (mostly in Europe), offering reservations at more than 30,000 restaurants. Customers make online reservations at participating restaurants and collect loyalty points. The current dataset consists of reservations from 1240 restaurants in three countries that took part in the loyalty program in a six-month time period. The program consists of a simple two-level structure. Customers get 100 points for a booking. Once they reach 1000 points, they qualify for a €10 discount, and when they reach 2000 points, they qualify for a €25 discount, valid at any participating restaurant. Points earned are valid until the end of the next calendar year, i.e. there is sufficient time to collect and redeem points.

Our dataset consists of the activity data of 3551 customers between July 2014 and February 2015. Only the customers that redeem at least one reward are included in the sample. As an indication of purchase rate (i.e. reservation frequency), we calculated the average duration (in days) between bookings for each customer. For choice, we identified the number of small (€10) and large (€25) rewards redeemed by each customer -- without any consideration of the order of rewards.

Table 3: Duration (Days) between Purchases in the Field Data

# S redeemed	# L redeemed			
	0	1	2	3
0	–	9.2 (3.0) n = 798	7.3 (2.8) n = 165	6.4 (2.4) n = 58
1	15.9 (4.7) n = 2021	8.1 (2.1) n = 73		
2	13.0 (4.4) n = 268			
3	9.6 (3.2) n = 52			

Note: Numbers in parentheses are standard deviations.

Table 3 presents the results for subgroups of customers redeeming different combinations of *S* and *L* rewards. We report (*i*) the number of customers, and (*ii*) the average number of days between bookings for respective subgroups. Empty cells in the lower part of the table have small numbers of participants ($0 \leq n \leq 15$); we purposefully omitted those for a cleaner picture (they do not lead to meaningful comparisons). 97% of the customers are reported in Table 3 (3435 out of 3551). Although the majority of customers redeemed only one *S* or one *L*, other choice patterns are also observed.

At the aggregate level, the average duration between purchases was 13.3 days (SD = 5.3). The longest duration (i.e. the lowest purchase rate) is observed for customers who only redeemed *S* once (15.9 days). The average durations were 13.0 days and 9.6 days for customers who redeemed two *S* and three *S* rewards respectively. The same pattern is observed among customers redeeming one, two, and three *L* rewards (9.2, 7.3 and 6.4 days respectively). In general customers redeeming *S* rewards exclusively (first column) are less frequent users than those redeeming *L* rewards exclusively (first row); average duration for customers who only redeem *S* is 15.4 days (SD = 4.8), whereas it is 8.7 days (SD = 3.1) for those who redeem only *L*. ($t = 48.1$, $p < 0.001$)

Another comparison relevant for the purchase rate - reward choice relationship is between customers who choose one *L* in the given time period, i.e. cell (0,1) in Table 3, versus customers who choose two *S*'s, i.e. cell (2,0). Customers in cell (2,0) choose to get *S* twice even though *L* is achievable for them. Their interpurchase duration is significantly longer compared to customers choosing *L* (13.0 vs. 9.2 days; $t = 13.2$, $p < 0.001$). Furthermore, the combined set of customers in the (2, 0) and (3, 0) cells use the booking service less frequently compared to the customers in the (0, 1) cell (12.5 vs. 9.2 days; $t = 12.2$, $p < 0.001$). These empirical findings are consistent with our hypotheses: The frequent buyers choose *L* more often than light buyers do.

DISCUSSION AND CONCLUSION

This paper proposes that the frequent buyers would be more inclined to wait for the larger reward in a reward redemption choice. This is due to different time trade-offs for different buyers, i.e. even though they choose between the same rewards, time distances to reward levels depend on the purchase rate. Interestingly this intuitive and fundamental link has not been studied by prior research. Our experimental findings and the actual data obtained from a marketplace program show that customers redeeming the smaller monetary reward have a lower purchase rate compared to those redeeming the larger reward. In our field data, this difference was significant even for customers that redeem the smaller reward *multiple times*; these light users can actually qualify for the larger reward.

Future research can examine the reward choices in more detail. For instance, eliciting the discount rates at the individual level may reveal that buyers with a higher discount rate would choose the smaller reward (keeping the purchase rate constant). Another avenue for research could be horizontal differentiation, where loyalty rewards differ not only in terms of monetary value but also in terms of content, such as a $10 restaurant discount coupon (*S*) versus a $25 Amazon gift card (*L*). This kind of differentiation is observed frequently in airline loyalty programs. We expect a variation among buyers in terms of their reward type preferences but there should still be a systematic relationship between purchase rates and reward choices. Such potential variations of multi-level reward programs underscore the need for a deeper investigation of loyalty programs and their impact on consumer choice.

REFERENCES

Banerjee, A. and Summers, L.H. (1987), "On Frequent-Flyer Programs and other Loyalty-Inducing Economic Arrangements," *Discussion Paper no. 1337*, Harvard Institute of Economic Research.

Bonnassies, O. (2018, February 26), "Why companies are trading loyalty points into securities electronically," A*irfinance Journal*, 140.

Breugelmans, E. et al. (2015), "Advancing Research on Loyalty Programs: A Future Research Agenda," *Marketing Letters*, Vol. 26 No. 2, pp. 127-139.

Kim, B-D, Shi, M. and Srinivasan, K. (2001), "Reward Programs and Tacit Price Collusion," *Marketing Science*, Vol. 20 No. 2, pp. 99-120.

Kivetz, R. and Simonson, I. (2002), "Earning the Right to Indulge: Effort as a Determinant of Customer Preferences toward Frequency Program Rewards," *Journal of Marketing Research*, Vol. 39 No. 2, pp. 155-170.

Kivetz, R. and Simonson, I. (2003), "The Idiosyncratic Fit Heuristic: Effort Advantage as a Determinant of Consumer Response to Loyalty Programs," *Journal of Marketing Research*, Vol. 40 No. 4, pp. 454-467.

Kivetz, R., Urminsky, O. and Zheng, Y. (2006), "The Goal-Gradient Hypothesis Resurrected: Purchase Acceleration, Illusionary Goal Progress, and Customer Retention," *Journal of Marketing Research*, Vol. 43 No. 1, pp. 39-58.

Klemperer, P. (1987), "The Competitiveness of Markets with Switching Costs," *RAND Journal of Economics*, Vol. 18 No. 1, pp. 138-150.

Klemperer, P. (1995), "Competition When Consumers Have Switching Costs: An Overview with Applications to Industrial Organization, Macroeconomics, and International Trade," *The Review of Economic Studies*, Vol. 62 No. 4, pp. 515-539.

Kopalle, P. K., Sun, Y., Neslin, S. A., Sun, B. and Swaminathan, V. (2012), "The Joint Sales Impact of Frequency Reward and Customer Tier Components of Loyalty Programs," *Marketing Science*, Vol. 31 No. 2, pp. 216-235.

Lal, R. and Bell, D.E. (2003), *"*The Impact of Frequent Shopper Programs in Grocery Retailing," *Quantitative Marketing and Economics*, **Vol.** 1 No. 2, pp. 179-202.

Lewis, M. (2004). "The Influence of Loyalty Programs and Short-Term Promotions on Customer Retention," *Journal of Marketing Research*, Vol. 41 No. 3, pp. 281-292.

Liu, Y. (2007), "The Long-Term Impact of Loyalty Programs on Consumer Purchase Behavior and Loyalty," *Journal of Marketing*, Vol. 71 No. 4, pp. 19-35.

Meyer-Waarden, L. (2007), "The Effects of Loyalty Programs on Customer Lifetime Duration and Share of Wallet," *Journal of Retailing*, Vol. 83 No. 2, pp. 223-236.

Nunes, J.C. and Drèze, X. (2004), "Too Close to Quit: The Effect of Reward Fungibility on Consumer Purchase Intentions," *Working Paper*, University of Southern California.

O'Brien, L. and Jones, C. (1995), "Do Rewards Really Create Loyalty?" *Harvard Business Review*, Vol. 73 No. 3, pp. 75-82.

Sayman, S. and Hoch, S.J. (2014), "Dynamics of Price Premiums in Loyalty Programs," *European Journal of Marketing*, Vol. 48 No. 3/4, pp. 617-640.

Sayman, S. and Usman, M. (2016), "Price Discrimination through Multi-Level Loyalty Programs," *Marketing Letters*, Vol. 27 No. 4, pp. 687–697.

Consuming Commodified Bodies – Performative (Re-)embodiment of Digital Corporeal Consumption

Jonathan D. Schöps, University of Innsbruck, Austria

INTRODUCTION

In a consumer culture obsessed with youth, beauty, fitness, and health, consumers are confronted with visuals of corporeal ideal types, that is, lean, shaped, and muscular, on a daily basis (Borgerson and Schroeder 2018; Carrotte, Prichard, and Lim 2017). Bodies have always mattered (Adelman and Ruggi 2016), but especially in digital environments, such as Instagram, a 'fashionable, fit body' constitutes a commodified object of consumption (Bauman 2005). In numbers, the hashtag #fitness currently accumulates to 238 million posts on Instagram (top-hashtags.com 2020). Thus, visual representations of fitness and fit bodies are central to digital consumer culture on Instagram. Therefore, the question arises – how do consumers re-integrate digital consumption on Instagram into their own corporeal self-understanding?

Prior research investigated visual representations of bodies as other-directed consumption objects, that is, the body as a medium for self-presentation. As such, the body functions as an intermediary communication device conveying desired impressions to others (Jensen Schau and Gilly 2003). Another stream of research focused on self-directed body projects, that is, the body as part of consumers' identity work where consumers form and modify their bodies by various practices, e.g. tattooing (Roux and Belk 2019). However, with ever-increasing digital consumption, these consumption dynamics increasingly become fluid and entangled. Thus, research on digital (disembodied) consumption, and consequential re-integration (re-embodiment) of digitally consumed content into consumers' corporeal self-understanding needs more attention (Adelman and Ruggi 2016).

Correspondingly, this study aims to investigate how digital consumption mediates consumers' corporeality in the context of bodies and fitness on Instagram. Analysis focuses on in-depth narrative interviews supplemented with auto-driven photo elicitation (Heisley and Levy 1991). Findings reveal consumers' embodied, disembodied, and re-embodied consumption dynamics related to the body and fitness. The study closes with discussing findings, and addressing limitations and possible future research.

THEORY

Consuming the body and fitness in postmodern society

In postmodern society, construction of consumers' selves is ephemeral, instantaneous, fluid, and fragmented (Bauman 2005; Schöps 2018). Similarly, the body does not constitute a fixed entity, but one composed of "bits of things" (Cavallaro 1998, 13). As such, the postmodern body poses an object to be continuously worked on through an abundance of new technologies "which are, in turn, produced through […] cultural discourses and people's overt attempts to 'defy' or transform the limitations of embodied reality" (Adelman and Ruggi 2016, 915) – a never-ending compulsive cycle (Bauman 2005).

Digital environments, such as Instagram, become the new playground for the postmodern body. These environments allow consumers to reconcile their corporeality, firstly, by being confronted with images that resemble their desires in a non-physical, disembodied space, and, secondly, by consuming, appropriating, and manipulating digital images (Jensen Schau and Gilly 2003; Schöps, Kogler, and Hemetsberger 2020). Thereby, digital media delimits and breaks

the finitude of embodiment enabling consumers to experience disembodied subjectivity, that is, to leave the embodied self behind (Beetham 2006).

However, digital media also contains uncountable visual representations of fitness regimes. Only those who obey may acquire the "certificate of 'being in', of belonging, of inclusion, of the right of residence" (Bauman 2005, 93). Therefore, individuals not only work their bodies to improve their physical condition, but also their social status in the digital realm. This duality illustrates the paradoxical relationship between fitness and health (Bauman 2005). First, individuals, conditioned that a "lean body and fitness to move […] are the prime cultural tokens of the era of instantaneity" (Bauman 2000, 128), strive for "instant gratification" (Smith Maguire 2002, 455) – harming mental health if absent (Tiidenberg and Gómez Cruz 2015). On the other hand, consumers train fitness to achieve physical and mental health (Glassner 1989). As a consequence, consumers find themselves torn between permanent "self-scrutiny, self-reproach and self-deprecation" (Bauman 2000, 78), and their "daily bustle about health" (Bauman 1992, 141).

Performativity theory

This study draws on performativity theory (Austin 1975; Butler 1990, 1993) to illuminate how consumers consume bodies and fitness on Instagram, and how consumed content affects their own corporeal self-understanding. Performativity theory comprises the notion that "discourse produces the effects that it names" (Butler 1993, 13) by means of reiterative and citational performances. These performances frame the relationship between performer, audience, and actions (Butler 1990). Performative acts encompass practices, language, and visuals that construct reality by exerting intentional (illocutionary) forces that have related intentional or unintentional (perlocutionary) effects (Austin 1975).

In the context of this study, this implies that corporeal performances on Instagram name bodies into being (Butler 1993) – in other words, these performances enact societal discourse that (re-)produces and defines "the materiality of bodies" (Butler 1993, 3). Digital corporeal content then constitutes an intentional (illocutionary) force of its own that, in turn, conveys related types of socially tying consequences – possibly naming and bringing unintended corporealities into being – in this study, consumers' corporeal self-understanding, re-embodiment respectively (Austin 1975; Butler 1993).

METHODOLOGY

This research uses in-depth narrative interviews supplemented with auto-driven photo elicitation (Heisley and Levy 1991) to evoke consumers' meanings attached to the consumption of bodies and fitness. Selection criteria for the applied purposive sample encompassed that interviewees, firstly, were digital natives, secondly, actively trained fitness, and, thirdly, actively engaged with Instagram.

Prior to the interviews, interviewees were asked to provide at least one fitness-related Instagram account of their choice, a visual of themselves working out, and, if existing, a so-called 'body transformation picture.' This projective material was integrated into the interviews eliciting insights into interviewees' embodied meanings of the body and fitness, digital consumption on Instagram, and re-embodiment of digitally consumed content (Figure 1). The sample consisted of 12 German-speaking interviewees (age mean = 24; gender: fe-

male (3), male (9); profession: student (10), clerk (1), self-employed (1); training days per week mean = 5). Interviews lasted from 47 to 101 minutes resulting in 206 pages of verbatim transcripts. Analysis entailed a process of inductive categorization, constant comparison, and abstraction (Kreiner, Hollensbe, and Sheep 2006; Spiggle 1994) to extract central themes from interviewees' narratives.

FINDINGS

Narrative interviews elicited deep insights into the myriad of meanings consumers attach to and derive from (digital) corporeal consumption. The following section offers a detailed account of insights into consumers' embodied, disembodied, and re-embodied consumption dynamics related to the body and fitness (Figure 1).

1989). Interviewees consider fitness as an enabler for persistence in everyday life in general. Lessons drawn from fitness training translate into interviewees' mentality on life per se – helping them to set and pursue life goals, to stay motivated throughout the journey, and to continually grow as a person, as Thomas illustrates:

"Fitness influences many other aspects of my life. For instance, my motivation and my goals, that is, that you stay committed to a goal, and never give up. I studied way more consequently, because I knew if I stay committed, and try to develop myself further, I'll achieve success. So, fitness helps me to balance my life, to have a positive attitude towards life in general, but also to mentally recharge myself." (Thomas, male, 27)
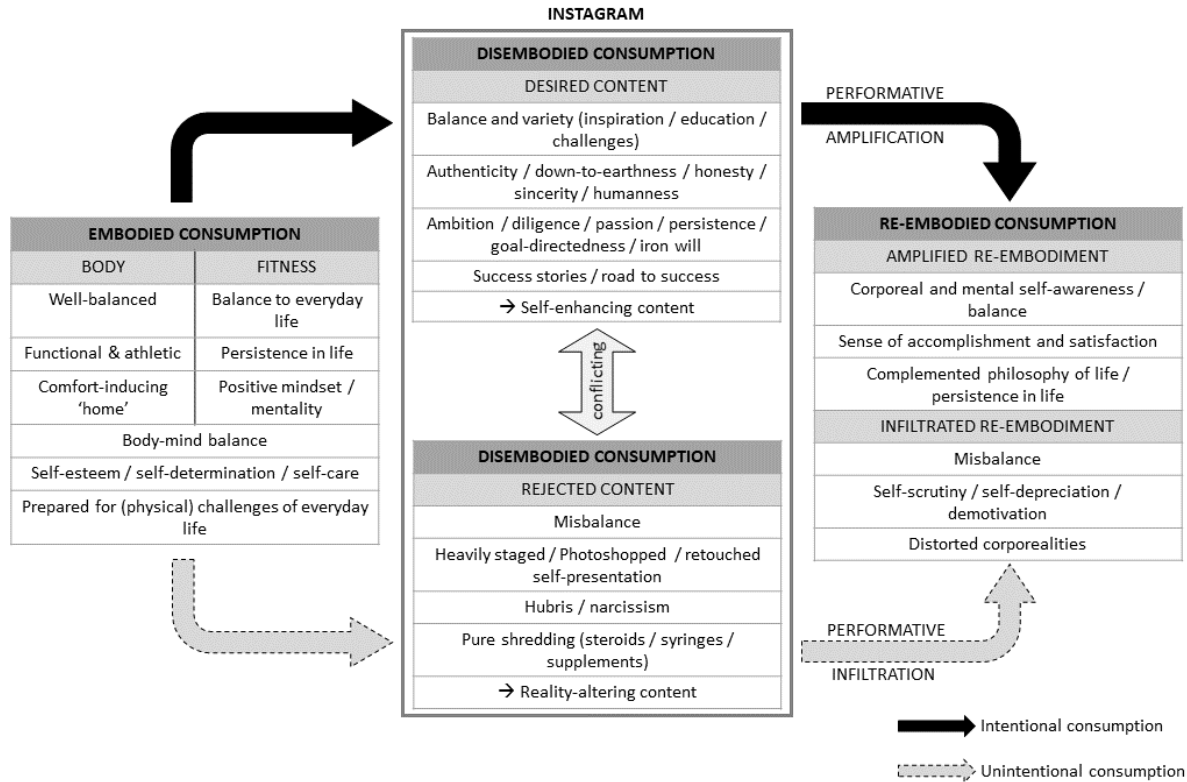
FIGURE 1 - DIGITAL CORPOREAL CONSUMPTION DYNAMICS

Embodied consumption

Interviewees first and foremost accentuate the importance of balance with respect to both, body and fitness ideals. The 'perfect body' is not solely a physical, but moreover a mental matter – the body as comfort-inducing 'home' for the mind evoking a sentiment of well-being. Aesthetics still do matter, but a well-balanced – athletic and functional – body, that does not exceed the limits of nature and allows for versatility, is what prevails upon interviewees, as Max elucidates:

"My ideal isn't a bodybuilder in the sense of developed muscles [...]. To me, it's important to look aesthetic. By aesthetic I mean that the muscles are clearly evident but at the same time to be athletic enough, let's say, when I play football to be able to act quickly." (Max, male, 24)

In similar vein, interviewees predominantly train fitness to achieve a balance between physical and mental well-being (Glassner

This balance between physical and mental well-being converts into increased self-esteem and a sense of self-determination, that is, feeling prepared for the (physical) challenges of everyday life (Thompson and Isisag 2018). Moreover, self-determination reflects a self-care mentality linked to the future body, that is, fitness as a means to prevent diseases, e.g. diabetes (Table 1). However, interviewees partially admit their unquenchable thirst for more (Bauman 2005), as *"one can never do enough, there's always more one can do" (Daniel, male, 22)*.

Disembodied consumption

Interviewees' digital corporeal consumption illustrates an immersive, disembodied consumption experience that interviewees delve into – momentarily fading out and altering reality (Schöps 2018). Disembodied consumption dynamics are twofold. Firstly, interviewees experience a sense of detachment from their own corporeality as their digital consumption is other-directed – consuming corporealities of others. Secondly, interviewees rather seek content

Table 1 - Findings

		Additional examples of interview data
Embodied consumption	Body	*"The right balance and mix between an athletic body, but at the same time not too ripped [...] that's the perfect body to me." (Daniel, male, 22)* *"The perfect body is a matter of balance to me. I find it strange if you appear to be a machine par excellence, but almost collapse when you have to climb up like ten stairs. Moreover, this balance is so important to me, because I want to achieve it by myself. And that is why I practice a variety of sports, not only training fitness in the gym." (Ivan, male, 24)* *"When it comes to the body, corporeal well-being is most important to me, because if you don't love yourself then you can't expect others to love you. If you haven't got things straightened out with yourself, the same also applies to your personal surroundings. I remember when I had an injury, I wasn't happy with myself. You interact with your personal surroundings differently when you are happy with yourself; you appreciate your fellows way more." (Sara, female, 25)*
Embodied consumption	Fitness	*"Fitness has not only to do with sports, but with everyday life as well. When you, for example, want to move objects from A to B [...]. You have to find a balance and it may be important to have a certain degree of fitness in order to accomplish it so that you have an advantage in different situations of everyday life." (Alex, male, 24)* *"It [fitness] is extremely important to me concerning various aspects. [...] naturally, the health aspect; to increase life expectancy, and prevent future diseases. But also for balance in general, and well-being. It's very important, because you produce feel-good hormones, you spend active time outdoors, you feel better both, physically and mentally, and you learn lots of things that are important in life in general by doing sports." (Nina, female, 22)* *"Well, to me, fitness is a form of well-being. You don't have to be able to run up the mountain like a marathon runner, but you should just feel well doing it. That you are able to do it without having to lay in bed for the next two days; that you can do what you enjoy without completely exceeding your physical limits." (Sara, female, 25)*
Disembodied consumption	Desired content	*"Tamara [owner of an account] tells us a story. On her account, she tells us how she became the person she's today… from her beginnings until today. She's a young, cheeky, strong, mature and also proud woman. You see where she started and where she came from. She used to be that young, unexperienced girl. I think she has doted on her development… the training. You could accompany her body transformation, and you can also see that she is happy about what she is doing. Those are no 'hardcore' posed photos, but you see a natural human being who went through a process of self-development." (Patrick, male, 28)* *"I feel good following his content, because it eases the burden on me… This restrictiveness that you have to align everything at fitness to achieve your goals. That you can still be a normal human being who can have a [alcoholic] drink or eat a burger sometimes… that you don't have to completely restrict yourself to achieve a fit body, but that you can also skip your regime for one or two days." (Hannes, male, 24)* *"In the caption, he always writes lengthy instruction how you can improve, for instance, when deadlifting… a detailed description of common mistakes, the correct execution even supported by the use of metaphors. He shows lay people how to do it., that's why I consider his account an asset. He provides knowledge to his followers who, in turn, can then reflect on his or her own execution." (David, male, 23)*
Disembodied consumption	Rejected content	*"My personal boundary is everything that has to do with extreme fitness. Everything that exceeds the limits of what is physically doable. Having breast and neck implants, pumping pure poison into your body… full of supplements. No thanks!" (Patrick, male, 28)* *"For instance, these people who have a complete misbalance in their training. When there is a complete mismatch between arms and the rest of the body. You notice that those people don't train for an aesthetic body, but are like 'dude, phat arm. Nice one! Haha.'" [ironic] (Christoph, male, 24)* *"Instagram can also be an illusory world. Some of these people do everything to gain publicity and popularity. Their photos are super staged, retouched, and Photoshopped. That isn't reality. Those people look completely different in real life." (David, male, 23)*

Re-embodied consumption	**Amplified re-embodiment**	*"It [consumed content] always impresses me… it impresses me, and reinforces my own will to go to the gym, to work on myself, to pursue my aesthetic goals, to go my own way. Every human being can achieve his / her goals and objectives if he / she sees his / her goals in his / her mind's eye. If you work hard for a goal, you will get there." (Max, male, 24)* *"I came to the point where I was bored by all this pure fitness drill content. These people follow the same regime over and over… every day… every morning in the gym for three hours. This was the moment for me… a moment of realization. I thought to myself: 'This monotony, these bodies. My versatility, my body.' I made myself aware that it isn't aspirational for me to run to the gym every single day, just to look like them, or to earn a little money with, in my opinion, a short-lived medium as Instagram. Instead, I decided to really enjoy life, stay fit, feel comfortable, even though not having the 'abs of the century.'" (Nina, female, 22)* *"Well, it's interesting in the sense that you may bear in mind that 'if you grin and bear it, and go through with nutrition and fitness and who the hell knows what else, you will maybe achieve such body.' […] But then I remind myself of what lies behind all this, and remember the pressure that I used to feel back in the days. This makes me appreciate and be satisfied with who I am and what I've accomplished. I then think to myself 'yes, it's fine.'" (Sara, female, 25)*
	Infiltrated re-embodiment	*"You are confronted with these 'perfect bodies,' as many people would call it, on a daily basis. I'm sure it affects me subconsciously… my self-perception. Maybe sometimes it motivates me, but at the same time it can be very demotivating. I can well imagine that it's injected into my subconscious, and, thereby, triggers something. By subconsciously I mean that I don't really notice it actively. I don't look at these pictures and say to myself 'hm, now I'm feeling bad' afterwards. But it certainly has an influence." (David, male, 23)* *"I sometimes feel inferior. I think that this is a problem of contemporary society. On the one side, by all of this use of Photoshop, and on the other, by all of these fitness accounts and so on and so forth. People who maybe do not put fitness into the center of their life… All this content reflects on them, and of course on me, too, and leads them to have low self-esteem." (Daniel, male, 22)* *"All this pressure to be fit, to be muscular that you experience all the time… this constant feeling that you are not happy with yourself, not satisfied with your body… Your self-esteem, your self-confidence plummet. This, in turn, makes it hard to look in the mirror afterwards [after digital corporeal consumption], and say to yourself: 'I'm feeling fine.'" (Ivan, male, 24)*

that represents desirable character traits for life in general than fit bodies per se. That is, content of honest, down-to-earth characters who at the same time embody goal-directedness, diligence, ambition, passion, persistence, and iron will (Figure 1). In other words, visual narratives of a balanced life, as Daniel elaborates on his idol Dwayne 'The Rock' Johnson:

"All this hard work… it represents his life in general, because he translates the hard work he puts into his training into all areas of his life […]. Always pushing to the limit, being diligent, respecting one's own body, always continuing, vanquishing the inner temptation, but also maintaining a balance between normal and fitness life. This is exactly what enables you to grow in life in general, in your job, in your leisure time, in your relationship, in your family. It's about the effort you put into things. That's exactly what this account symbolizes to me." (Daniel, male, 22)

Interviewees further seek a balance between inspirational, educational and challenging fitness content, and authentic, genuine and honest content, that is, content displaying, for instance, 'cheat day' feastings (Table 1). Such content aids interviewees to balance their own life as this conveys the message of *"[…] fitness or not – we are still human after all"* (Patrick, male, 28).

However, interviewees also emphasize the often delusional nature of corporeal content on Instagram transmitting distorted corporealities. Interviewees heavily reject staged and Photoshopped content that exhibits hubris and narcissism on the one hand, and content showing misbalanced bodies, that is, recognizably steroid- and supplement-infused bodies, exceeding the limits of the human body on the other, as Max illustrates:

"I see all those pumped up bodies where I'm not sure what kind of supplements they are taking. It's disgusting. That's not aesthetic any more… it's way too much. I can't even tell if it's Photoshopped or if it's injected, because these bodies appear so artificially rendered. All those popped out veins… it couldn't get more disgusting. Utterly disgusting." (Max, male, 24)

Even though interviewees reject the illusory world of Instagram, they are inevitably exposed to the social imagery of Instagram as a whole which, in turn, may affect their own self-understanding (Figure 1).

Re-embodied consumption

Digital corporeal consumption performatively amplifies interviewees' embodied consumption (Figure 1). In other words, interviewees re-negotiate between their embodied self-understanding and digitally consumed content, that is, a performative re-embodiment of embodied and disembodied consumption. As such, interviewees intentionally seek self-enhancing content that functions as a daily reminder and a reflexive mirror (Rocamora 2011) for corporeal and mental self-awareness, reinforces a sense of accomplishment and satisfaction, and complements interviewees' philosophy of life, and persistence in life, as Hannes illustrates:

"It [fitness consumption on Instagram] definitely broadened my horizon with respect to exercises, nutrition, but also life in general. I really noticed that my approach to motivation, and goals and objectives changed, because now I really see those things in my mind's eye... it's something I track on a daily basis by using Instagram. In the past, I didn't have this daily reminder and now I see my goals and objectives in my mind's eye, and I get input how I can achieve those, and how I can improve and grow as a person every day." (Hannes, male, 24)

While fitness-related content on Instagram intents to motivate, educate, and inspire consumers, emphasized by hashtags such as #fitspiration (Carrotte et al. 2017), the consumption of fitness content may also have unintentional (perlocutionary), unconscious effects on interviewees' re-embodied self-understanding (Austin 1975; Prichard et al. 2017). That is, the often distorted reality of Instagram may performatively infiltrate interviewees' corporeality (Table 1). Although rejecting misbalanced forms of bodies and fitness, interviewees are still exposed to such content, e.g. in the explore feed, and may thereby find themselves re-embodying distorted corporealities – yet, unconsciously, and only noticed when being confronted by others, as stated by Anna:

"I worked out so hard... but I developed more into a masculine female instead of shedding weight, and my perception of an athletic body and a good figure became distorted up to the point when my mum said to me: 'Well, now you look like a man. Do you like yourself better now?' This statement made me reflect, and stop all this strength training. I then really tried to consider fitness as means to achieve balance, not bodily perfection." (Anna, female, 24)

Accordingly, re-embodied consumption dynamics are of dual nature (Bauman 2005). On the one hand, fitness-related content offers advice, inspiration, guidance, and aid to re-negotiate the relationship to one's body, fitness, goals and objectives, and life. On the other, it may bring distorted corporealities into being (Butler 1993) by leading consumers to believe that the often 'digitally-botoxed' bodies on Instagram reflect reality (Schöps et al. 2020). Consequently, consumers may find themselves torn between two conflicting, paradoxical 'realities' needing constant reflection and re-negotiation of (re-)embodiment to fulfill their quest for balance.

DISCUSSION

The empirical investigation illustrates how consumers re-negotiate their own corporeality between embodied and disembodied consumption, and how this re-negotiation performatively translates into consumers' (re-)embodied self-understanding. Digital corporeal consumption may have intentional (illocutionary) forces by performatively amplifying consumers' embodied self-understanding, but also unintentional (perlocutionary) effects by performatively infiltrating and distorting consumers' corporeal self-understanding (Austin 1975; Butler 1993). Thereby, this study contributes to an increased understanding of digital corporeal consumption dynamics, and the increasingly entangled and intermingled relationship between on- and offline realities in postmodern society (Adelman and Ruggi 2016).

Consumers in this study find themselves in-between different social realities where the boundaries may be blurred. Consequently, consumers may experience different bodies brought into being (Butler 1993); not only through their embodied self-understanding, but also through finding and (re-)integrating meaning by means of other-directed consumption – in this case digital corporeal consumption on Instagram. Thus, Instagram becomes a performative framework exerting forces and effects of oftentimes conflicting nature (Austin 1975) on consumers moving through its social and cultural imagery. Consumers trying to navigate through this paradoxical realm may only hold their postmodern body together "through finely balancing the tensions that tear it apart" (Bauman 1995, 121). As a consequence, the postmodern body is just as "'socially regulated' as before," but finds a new agency that is "presiding over regulation" (Bauman 2005, 100) in Instagram.

This study has one main limitation. Interviews were conducted at one point in time. Future research drawing on longitudinal interview and visual data could therefore provide deeper insights into consumers' (re-)embodiment of digital corporeal consumption.

REFERENCES

Adelman, Miriam and Lennita Ruggi (2016), "The sociology of the body," *Current Sociology*, 64 (6), 907–30.

Austin, John L. (1975), *How to Do Things with Words (2nd edition)*, Cambridge, MA: Harvard University Press.

Bauman, Zygmunt (1992), *Mortality, immortality, and other life strategies,* Cambridge, UK: Polity Press.

_____ (1995), *Life in fragments: Essays in postmodern morality,* Oxford, UK: Blackwell.

_____ (2000), *Liquid Modernity (1st edition)*, Cambridge, UK: Polity Press.

_____ (2005), *Liquid Life*, Cambridge, UK: Polity Press.

Beetham, Margaret (2006), "Periodicals and the new media: Women and imagined communities," *Women's Studies International Forum*, 29, 231–40.

Borgerson, Janet and Jonathan E. Schroeder (2018), "Making Skin Visible: How Consumer Culture Imagery Commodifies Identity," *Body & Society*, 24 (1-2). 103–36.

Butler, Judith (1990), *Gender Trouble: Feminism and the Subversion of Identity*, New York, USA: Routledge.

_____ (1993), *Bodies That Matter: On the Discursive Limits of "Sex,"* London, UK: Routledge.

Carrotte, Elise R., Ivanka Prichard, and Megan Su Cheng Lim (2017), "'Fitspiration' on Social Media: A Content Analysis of Gendered Images," *Journal of Medical Internet Research*, 19 (3), 1–9.

Cavallaro, Dani (1998), *The body for beginners*, New York, USA: Writers and Readers Publishing Inc.

Glassner, Barry (1989), "Fitness and the Postmodern Self," *Journal of Health and Social Behavior*, 30 (2), 180–91.

Heisley, Deborah D. and Sidney J. Levy (1991), "Autodriving: A Photoelicitation Technique," *Journal of Consumer Research*, 18 (3), 257–72.

Jensen Schau, Hope and Mary C. Gilly (2003), "We Are What We Post? Self-Presentation in Personal Web Space," *Journal of Consumer Research*, 30 (3), 385–404.

Kreiner, Glen E., Elaine C. Hollensbe, and Mathew L. Sheep (2006), "Where is the "Me" Among the "We"? Identity Work and the Search For Optimal Balance," *Academy of Management Journal*, 49 (5), 1031–57.

Prichard, Ivanka, Annabel C. McLachlan, Tiffany Lavis, and Marika Tiggemann (2017), "The Impact of Different Forms of #fitspiration Imagery on Body Image, Mood, and Self-Objectification among Young Women," *Sex Roles*, 78, 789–98.

Rocamora, Agnès (2011), "Personal Fashion Blogs: Screens and Mirrors in Digital Self-portraits," *Fashion Theory*, 15 (4), 407–24.

Roux, Dominique and Russell Belk (2019), "The Body as (Another) Place: Producing Embodied Heterotopias Through Tattooing," *Journal of Consumer Research*, 46 (3), 483–507.

Schöps, Jonathan D. (2018), "Consuming Commodified Selves - Accelerated Identity Co-Construction Dynamics Through Fashion Performances on Instagram," *NA - Advances in Consumer Research,* 46, 434–39.

Schöps, Jonathan D., Stephanie Kogler, and Andrea Hemetsberger (2020), "(De-)stabilizing the digitized fashion market on Instagram–dynamics of visual performative assemblages," *Consumption Markets & Culture*, 23 (2), 195–213.

Smith Maguire, Jennifer (2002), "Body Lessons: Fitness Publishing and the Cultural Production of the Fitness Consumer," *International Review for the Sociology of Sport*, 37 (3–4), 449–64.

Spiggle, Susan (1994), "Analysis and Interpretation of Qualitative Data in Consumer Research," *Journal of Consumer Research*, 21 (3), 491–503.

Thompson, Craig and Anil Isisag (2018), ""For the Unknown and the Unknowable": The Rise and Reconfiguration of the CrossFit Brand as a Post-9/11 Mythos," *NA - Advances in Consumer Research*, 46, 334–35.

Tiidenberg, Katrin and Edgar Gómez Cruz (2015), "Selfies, image and the re-making of the body," *Body and Society*, 21 (4), 77–102.

Top-Hashtags (2020), https://top-hashtags.com/instagram/.

A Luxury Moment to Go, Please: Paradoxes of Luxuriousness Among Cosmopolite Consumers

Sarah Schwarz, University of Innsbruck, Austria
Andrea Hemetsberger, University of Innsbruck, Austria

INTRODUCTION

"Just remember, the sweet is never as sweet without the sour."
– Jason Lee as Brian Shelby (2001), Vanilla Sky, film

Technological ubiquity and socio-cultural upheavals have contributed to the advent of nomadic-like consumption orientations that also manifest in nuanced conceptions of luxury. The fluid lifestyle of cosmopolites, who call traditional conceptions of living into question, casts unprecedented light on the paradoxical dynamics of consumption styles—the creative synthesis of heterogeneous oppositions—that are salient in today's fast-moving and multiplex environments. Resonating with what Reckwitz (2017) introduces as singularized society that adheres to a logic of the particular, the neo-community of nomads relates differently to possessions and locations, and values detachment and flexibility (Bardhi, Eckhardt, and Arnould 2012).

Contemporary societies' liquid (Bauman 2000) and singularized (Reckwitz 2017) culture also bears an ephemeral, immaterial, flexible, and self-centering nature of luxuriousness (von Wallpach et al. 2020). This understanding is anchored in recent research on luxurious moments that are pregnant with feelings of elation, imbued with intimate meanings (Hemetsberger, von Wallpach, and Bauer 2012; Holmqvist, Diaz Ruiz, and Peñaloza 2020), and thus evocative of what Csikszentmihalyi (2008) dubbed the mental state of "flow." The liquid relationship between the cosmopolitan consumer and the material world opens a fertile ground for delving deeper into the intricacies of perceptions of luxuriousness in the life of a neo-nomad.

We recognize the need for in-depth reflections on the nascent lifestyle culture of cosmopolites to take the first step toward elucidating the paradoxical character of luxuriousness in singularized and liquid societies. Using a paradox lens, this study develops a grounded theory account of the momentousness of present-day luxury experiences. Consumer narratives of 38 moments exhibit three negotiated, seemingly antithetical dynamics that are caught in a net of mutuality and underlie postmodern luxury perceptions.

THEORY

Luxuriousness in a Postmodern Era

To fathom the present social life, Reckwitz (2017) introduces the logic of singularization as mirrored by the celebration of trueness and otherness within societies. Studies unveiling that consumer cultures seek distinction (Eckhardt and Bardhi 2019), "Anders sein" to counteract communitarian notions of normality (Hemetsberger and Weinberger 2012), or individualism (Tumbat and Belk 2011) hint at the potential of the postmodern marketplace to invigorate singularization. Bauman (2000) points out the epochal shift from the hardware-oriented modernity to the software-oriented postmodernity and introduces the concept of liquidity to epitomize the latter. This transition runs in parallel with processes of cultural, societal, economic, and political change (Inglehart 1997), blurring the boundaries of once-taken-for-granted frames of reference (Bauman 2007). Research unpacks the idea of liquefaction in the realm of consumer behavior, heightening the nomadic logic of consumption that is marked by instrumentality, dematerialization, situation-dependency (Bardhi et al. 2012), and deceleration (Husemann and Eckhardt 2019).

A growing body of research has, in this vein, opened up a debate about the waning power of materials in settings of neo-nomadism (Bardhi et al. 2012; Bardhi and Eckhardt 2017). Eckhardt and Bardhi (2019) highlight that flexibility (adaptability) and attention (visibility) replace possessions as the postmodern status markers, arguing that fluid consumers value authenticity, and accumulate experiences as they fulfill purposes of personal development and differentiation from the outsider. Similarly, recent research ultimately introduces a new notion of luxury that goes beyond the material object (Bardhi, Eckhardt, and Samsioe 2020). Instead of emphasizing possessions that signal prosperity due to their enduring nature (Veblen 1902) or combine a prestige positioning with price premiums to address the mass market (Silverstein and Fiske 2003), luxury is regarded as encapsulated in moments reminding of the logics of liquidity and singularization (von Wallpach et al. 2020).

The Paradox

"Paradoxes stare us in the face" (Schad et al. 2016, 4)—this observation accentuates the ethos of consumption in postmodernity (Firat and Venkatesh 1995) which is symbolized by the figure of the nomad (Bauman 2000). Just as there could be no shadow without light and no light without shadow, paradoxes denote the persistent co-existence of polarities within a unified whole, hence illuminating "two sides of the same coin" (Lewis 2000, 761; O'Driscoll 2008). Cameron and Quinn (1988) herald the opportunity of transcending dichotomous divides by presenting the paradox as a framework to disentangle postmodern complexities (Lewis 2000). We acknowledge this proposition and carve out the potential of the paradox to identify "novel coordinates in a constantly evolving world" (O'Driscoll 2008, 101), assuming that tension fields are the driving source of luxury moments encountered by a neo-nomadic consumer culture. Evidence stemming from a research body in psychology substantiates this paradox view by attesting to the possibility that the synergy between polarities promotes well-being (Tversky and Griffin 1991). This study adopts a paradox lens and, in doing so, attempts not to portray a paradoxical dynamic as the "degraded opposite of logicality" (O'Driscoll 2008, 96) but rather to tap "its enlightening potential" (Lewis 2000, 763).

METHODOLOGY

Based on an interpretive approach, this study employs an interview method inspired by the Zaltman Metaphor Elicitation Technique (Zaltman and Coulter 1995) to surface detailed aspects of paradoxical dynamics hiding behind cosmopolites' perceptions of luxuriousness. Respondents' own visual stimuli (two per interview) reflecting their individual conceptions of luxury navigated the conversations. The neo-nomadic elite offered a fruitful context as it has acquired the reputation of being the vanguard of an era embedded in paradoxes. Respondents were approached face-to-face or online, using purposive sampling to achieve maximum variation. To be eligible for the study, respondents had to combine work and travel, and rely on technologies to sustain this lifestyle (Mancinelli 2020). Matching this cosmopolitan profile, 19 interviewees were included in the sample which varied in terms of gender (12 female and seven male), age (between 24 and 51 years), cultural background (Europe, North and South America, Asia, and Australia), and upbringing (mobile childhood e.g., multiple relocations, immigration experiences within

the family, and non-mobile childhood). Depending on the physical distances, interviews were conducted either virtually or in person. Inspired by the tenets of grounded theory (Glaser and Strauss 1967), we built theory by performing the iterative steps of data collection and interpretation, and using constant comparison method (Charmaz 2006).

FINDINGS

Drawing upon rich interview data on cosmopolites' luxury perceptions, we detail paradoxes that generate *complementing, relating*, and *delineating* dynamics. Our study advocates the idea that the yin-and-yang unity between dichotomous elements fuels the evolvement of luxury moments which are grouped together under the umbrella terms *revelation, reward*, and *reinforcement*, respectively. Findings evince that cosmopolites' negotiation of tensions—the conscious assimilation of the paradoxical elements encountered—is imperative for the unfolding of luxuriousness. We further ascertain that cosmopolites find themselves entangled in a web of paradoxical lifestyle conditions which discursively represent the respective luxury moments (table 1).

Cosmopolitan consumers' negotiation of a balance between paradoxical elements allows for the creation of authenticity, thereby corroborating prior findings (Gabl, Stoeckl, and Hemetsberger 2013; Rose and Wood 2005; Tumbat and Belk 2011). The navigation between these tensions is connected to eye-opening and enlightening experiences that we associate with *revealing* luxury moments. This dynamic is evocative of Belk, Ger, and Askegaard's (2003, 337) finding that consumer desire is antithetical to "socially valued qualities of reason, rationality, and self-control," and potentially nurtured by the encounter of immortality or danger. It is hence grounded in narratives about the tempting power of, for instance, the reprehensible and forbidden, which renders a mundane experience purely true. In antithesis to scholars circumscribing luxuriousness as escapes from mundanity (Hemetsberger et al. 2012; Holmqvist et al. 2020), we find that interventions of the extraordinary within the ordinary derive luxury moments that still "constitute the spice of everyday life" (von Wallpach et al. 2020, 495). Cosmopolites engage in experiences that blend paradoxical versions of reality—*"to witness [both worlds]"* (Alethea-female-31).

Table 1: Paradoxes of Postmodern Luxury Moments and Discursive Themes

Paradoxes of Postmodern Luxury Moments			
Luxury moments of…	Negotiation mechanisms	Dynamics and related characteristics	Discursive themes of a liquid/ singularized existence
…Revelation	**Authentication**	**Complementing** Juxtaposition of concurrently encountered paradoxical elements that relate to the nomad	Quest for trueness
…Reward	**Compensation**	**Relating** Juxtaposition of chronically ordered paradoxical elements that relate to the nomad	Liberation from attachment
…Reinforcement	**Differentiation**	**Delineating** Juxtaposition of concurrently encountered paradoxical elements that relate to the nomad and the outsider	Construction of otherness

Revelation

A recurring dynamic that crystallized from our analysis covers the play with concurrently encountered paradoxical elements that transform into an interwoven entity provoking luxury moments. We opt for the word *complementing* to reaffirm the potential of dichotomies that coexist and blend into a harmonious unit. The juxtaposition of seemingly contradicting elements hence enables cosmopolites to immerse themselves in paradoxical contexts. Enunciating this dynamic, one of our respondents remembers how she experienced her visit to a metropole known for its extremes. This vignette refers to the amalgamation of disjoint scenes into a holistic representation of the city's unembellished character:

"[We have] seen everything ... about what makes this New York magnificent. ... We went down on the Broadway. And there was this/ this big array of trash. ... The real New York: the trash, the smell, the glamorous, and non-glamorous. ... There was this harmony between the fantastic, the glorious, and the mundane and the dirty. ... [A] revealing moment." (Alethea-female-31)

Reward

Another prevailing dynamic from our data surrounds the idea that the juxtaposition of chronologically ordered paradoxical elements provokes luxuriousness. Pointing to what Woermann and Rokka (2015, 1490) termed "timeflow", this dynamic elucidates "the temporal interrelation (or hanging together) of meaningful," and, in our context, paradoxically opposed, "events." We draw upon the notion of relating to reinforce the finding that cosmopolites anchor their evaluation of an experience to preceding incidents as they integrate insights gained from the past into current perceptions. This resonates with Tversky and Griffin's (1991) conception of a contrasting effect where memories of a negative experience contribute to well-being. The reconciliation of paradoxical tensions is linked to consumers' negotiation of *compensation*, allowing cosmopolites to perceive luxury moments summarized under the heading *reward*. Respondents link these luxuries to dream-fulfilling or self-celebrating experiences, reminiscent of what Hemetsberger et al. (2012) associate with the luxury of becoming. We can recognize in such accounts the appeal of the "desire for a fundamental otherness" which resides in

the promise of transformation and alterity (Belk et al. 2003, 336). Since cosmopolites curate a lifestyle primarily aiming at (re-)gaining autonomy and spiritual elevation (Reichenberger 2018), findings evincing that neo-nomadic narratives of luxuriousness revolve around the subjects of freedom and inner balance (Hemetsberger et al. 2012) are intuitive. Luxury moments mark the end of a healing journey, representing the liberation from encountered limitations that arise from incisive life events or persistent imbalances, and are often illustrated by emotionally laden expressions such as enslavement (Hemetsberger, Kreuzer, and Klien 2019). The following excerpt deals with a "decelerated journey" (Husemann and Eckhardt 2019) one of our respondents made to compensate for the burden of grief which resulted in a rewarding luxury moment:

"My brother and I decided, right after [mother] passed, that we would go to the Annapurna Circuit together. ... In her honor. ... It was therapeutic for us. ... Being a digital nomad gave me the/the time to go to Nepal. ... To heal from the grief. ... It was a difficult journey, but it was very rewarding." (Zhang-female-35)

Reinforcement

Our findings further illuminate luxuriousness as derived from a nomad-related and a paradoxical outsider-related element. When juxtaposed, these elements draw a line between the me and the other, allowing cosmopolites to *delineate* themselves. Reminiscent of Tumbat and Belk's (2011) study on marketplace tensions in the context of Mount-Everest expeditions, we find that cosmopolites embrace boundaries of inclusion and exclusion. However, whereas Tumbat and Belk (2011) recognize the accentuation of differences within the mountaineering community, our data lends support to the idea that cosmopolites pursue the separation from outsiders through what Reckwitz (2017) introduces as the sub-culture's singularization. This echoes the case of pilgrimage in which individuals learn to channel their competitive spirit toward fellow wanderers (Husemann and Eckhardt 2019) and develop a communitarian sense of we (Turner 1973). As the quest for differentiation from mainstream society is a prevailing motive coining the decision to become neo-nomadic, this dynamic supports the proposition that cosmopolitan consumers incorporate the societal pursuit of constructing otherness:

THE NOMAD

RELATING = REWARD (1)

COMPENSATION

MIRROR LOGIC OF POSTMODERN LIQUEFACTION

LEGEND:

○ = Element that is Juxtaposed with the Paradoxically Opposed Element (e.g., the Glamorous versus the Dirty in New York City)

— = "Flow" of Time between the Paradoxically Opposed Elements

OUTSIDERISM

COMPLEMENTING = REVELATION (2)   DELINEATING = REINFORCEMENT (3)

AUTHENTICATION   DIFFERENTIATION

MIRROR LOGIC OF POSTMODERN SINGULARIZATION

DESCRIPTIVE INFORMATION:

moment of reward (1) =
negotiation of compensation; juxtaposition of chronically ordered paradoxical elements that relate to the nomad
moment of revelation (2) =
negotiation of authentication; juxtaposition of concurrently encountered paradoxical elements that relate to the nomad
moment of reinforcement (3) =
negotiation of differentiation; juxtaposition of concurrently encountered paradoxical elements that relate to the nomad and the outsider

Figure 1: Threefold Paradoxical Dynamics of Postmodern Luxury Moments

"We got media passes for the [Balloon Fiesta]. ... And we ended up [being treated as] VIP['s]. ... I [was] sitting next to like Discovery Channel, CNN, Huffington Post. ...Me being actually [in a balloon] like made me realize that I'm actually doing something right. ... Luxury ... was being chosen, I guess, just feeling special. ... Not a lot of people can [experience that]." (Juana-female-28)

This verbatim account illustrates how one of our respondents indulged in a luxury moment of what we associate with *reinforcement* as she negotiated a feeling of *differentiation* after having assimilated the tension between self-related and outsider-related experiences. Our analysis uncovers that encountering something that "*ninety-nine percent of people cannot do*" (Bohuslav-male-25) imbues moments with luxurious meaning. In extension to prior studies finding that luxuries convey a mystical sense of scarcity (Hemetsberger et al. 2012; von Wallpach et al. 2020), this dynamic suggests that luxuriousness draws its value from being unavailable to the outsider.

DISCUSSION

This article unravels the complexities of luxury perceptions in postmodern times (Bauman 2000; Reckwitz 2017), enquiring into how paradoxical dynamics spur experiences of self-relevant, enlightening moments that exhibit a sparse and ephemeral character. Our study replicates research on luxury as a liquid concept that crystallizes in multifaceted moments (Hemetsberger et al. 2012; Holmqvist et al. 2020; von Wallpach et al. 2020). However, in addition to earlier work in this field, we direct closer attention to the antithetical essence of luxuries by making an informed contribution to the bricolage of underlying contradictory yet mutually reinforcing elements. Culminating from our investigation are *complementing, relating*, and *delineating* paradoxical dynamics that are the luxurious moments' sources. We ultimately add to research on neo-nomadic consumption styles (Bardhi et al. 2012; Bardhi and Eckhardt 2017) by illuminating that, in a context of mobility where materials become problematic, luxuriousness reflects the postmodern consumers' quest for authenticity, personal development, and differentiation from the outsider (Eckhardt and Bardhi 2019).

In a nutshell, this study visualizes how the juxtaposition of paradoxes forms the cornerstones of luxury experiences in a context symbolizing the global appetite for a liquid and singularized existence (figure 1). Picking up the debate on liquidity (Bauman 2000), our study reveals that cosmopolites negotiate the opposing elements of the paradox in a pursuit of compensation. This melts together two consecutive contexts (liquefaction) and ultimately entails rewarding luxury moments. We further contribute to the logic of singularization (Reckwitz 2017) by advocating that cosmopolites hunt for the authentic (inner-directed singularization) and the different (outer-directed singularization). They negotiate both sides of the paradox-coin, which gives rise to *revealing* and *reinforcing* luxury moments, respectively.

This study is inherent with limitations, being interpretive in nature and confined to consumers who have already transitioned into the globetrotting lifeworld. As an avenue for future research, we encourage the adoption of a longitudinal study to assess developments over an extended time frame and see promise in conducting a visual-based analysis to capture the breadth of the subject matter. We hope to stimulate dialogue on the hitherto underexplored topic of luxury moments in neo-nomadic times and therefore point out the importance of scrutinizing the tensions forming the foundation of their constitution. Because, indeed, the bumps in the road of a postmodern journey appear smoothed out when considering the multiplicity of luxuries that potentially arise therefrom—right?

REFERENCES

Bardhi, Fleura and Giana M. Eckhardt (2017), "Liquid Consumption," *Journal of Consumer Research*, 44 (3), 582–97.

Bardhi, Fleura, Giana M. Eckhardt, and Eric J. Arnould (2012), "Liquid Relationship to Possessions," *Journal of Consumer Research*, 39 (3), 510–29.

Bardhi, Fleura, Giana M. Eckhardt, and Emma Samsioe (2020), "Liquid Luxury," in *Research Handbook of Luxury Branding*, ed. Felicitas Morhart, Keith Wilcox, and Sandor Czellar, London: Edward Elgar, 22-43.

Bauman, Zygmunt (2000), *Liquid Modernity*, Cambridge, UK: Polity.

_____ (2007), *Liquid Times: Living in an Age of Uncertainty*, Cambridge, UK: Polity.

Belk, Russell W., Güliz Ger, and Søren Askegaard (2003), "The Fire of Desire: A Multisited Inquiry into Consumer Passion," *Journal of Consumer Research*, 30 (3), 326–51.

Cameron, Kim S. and Robert E. Quinn (1988), "Organizational Paradox and Transformation," in *Paradox and Transformation: Toward a Theory of Change in Organization and Management*, ed. Kim S. Cameron and Robert E. Quinn, Cambridge, MA: Ballinger, 1–18.

Charmaz, Kathy (2006), *Constructing Grounded Theory: A Practical Guide Through Qualitative Analysis*, London: Sage.

Csikszentmihalyi, Mihály (2008), *Flow: The Psychology of Optimal Experience*, New York: Harper & Row.

Eckhardt, Giana M. and Fleura Bardhi (2019), "New Dynamics of Social Status and Distinction," *Marketing Theory*, 20 (1), 85–102.

Firat, A. Fuat and Alladi Venkatesh (1995), "Liberatory Postmodernism and the Reenchantment of Consumption," *Journal of Consumer Research*, 22 (3), 239–67.

Gabl, Sabrina, Verena E. Stoeckl, and Andrea Hemetsberger (2013), "The Two Sides of the Gold Medal: Paradoxes of the Olympic Experience," *NA - Advances in Consumer Research*, 41, 367–72.

Glaser, Barney G. and Anselm L. Strauss (1967), *The Discovery of Grounded Theory: Strategies for Qualitative Research*, New York: Aldine.

Hemetsberger, Andrea, Maria Kreuzer, and Melanie Klien (2019), "From Caterpillar to Butterfly: Experiencing Spirituality via Body Transformation," *Journal of Marketing Management*, 35 (5–6), 540–64.

Hemetsberger, Andrea, Sylvia von Wallpach, and Martina Bauer (2012), "Because I'm Worth It - Luxury and the Construction of Consumers' Selves," *NA - Advances in Consumer Research*, 40, 483–9.

Hemetsberger, Andrea and Ralf Weinberger (2012), "In Pursuit of Being Different," *NA - Advances in Consumer Research*, 40, 502–9.

Holmqvist, Jonas, Carlos Diaz Ruiz, and Lisa Peñaloza (2020), "Moments of Luxury: Hedonic Escapism as a Luxury Experience," *Journal of Business Research*, 116 (C), 503–13.

Husemann, Katharina C. and Giana M. Eckhardt (2019), "Consumer Deceleration," *Journal of Consumer Research*, 45 (6), 1142–63.

Inglehart, Ronald (1997), *Modernization and Postmodernization: Cultural, Economic, and Political Change in 43 Societies*, Princeton, NJ: Princeton University Press.

Lewis, Marianne W. (2000), "Exploring Paradox: Toward a More Comprehensive Guide," *Academy of Management Review*, 25 (4), 760–76.

Mancinelli, Fabiola (2020), "Digital Nomads: Freedom, Responsibility and the Neoliberal Order," *Information Technology and Tourism*, Advance online publication. https://doi.org/10.1007/s40558-020-00174-2

O'Driscoll, Aidan (2008), "Exploring Paradox in Marketing: Managing Ambiguity towards Synthesis," *Journal of Business & Industrial Marketing*, 23 (2), 95–104.

Reckwitz, Andreas (2017), *Die Gesellschaft der Singularitäten: Zum Strukturwandel der Moderne*, Berlin: Suhrkamp.

Reichenberger, Ina (2018), "Digital Nomads – a Quest for Holistic Freedom in Work and Leisure," *Annals of Leisure Research*, 21 (3), 364–80.

Rose, Randall L. and Stacy L. Wood (2005), "Paradox and the Consumption of Authenticity through Reality Television," *Journal of Consumer Research*, 32 (2), 284–96.

Schad, Jonathan, Marianne W. Lewis, Sebastian Raisch, and Wendy K. Smith (2016), "Paradox Research in Management Science: Looking Back to Move Forward," *The Academy of Management Annals*, 10 (1), 5–64.

Silverstein, Michael J. and Neil Fiske (2003), "Luxury for the Masses," *Harvard Business Review*, 81 (4), 48–57.

Tumbat, Gülnur and Russell W. Belk (2011), "Marketplace Tensions in Extraordinary Experiences," *Journal of Consumer Research*, 38 (1), 42–61.

Turner, Victor (1973), "The Center Out There: Pilgrim's Goal," *History of Religions*, 12 (1), 191–230.

Tversky, Amos and Dale Griffin (1991), "Endowment and Contrast in Judgments of Well-Being," in *Subjective Well-Being: An Interdisciplinary Perspective*, ed. Fritz Strack, Michael Argyle, and Norbert Schwarz, Elmsford, NY: Pergamon Press, 101–18.

Vanilla Sky (2001), directed by Cameron Crowe, Hollywood, CA: Paramount Pictures.

Veblen, Thorstein (1902), *The Theory of the Leisure Class: An Economic Study of Institutions*, New York: MacMillan.

von Wallpach, Sylvia, Andrea Hemetsberger, Thyra Uth Thomsen, Russel W. Belk (2020), "Moments of Luxury – A Qualitative Account of the Experiential Essence of Luxury," *Journal of Business Research*, 116 (C), 491–502.

Woermann, Niklas and Joonas Rokka (2015), "Timeflow: How Consumption Practices Shape Consumers' Temporal Experiences," *Journal of Consumer Research*, 41 (6), 1486–508.

Zaltman, Gerald and Robin Higie Coulter (1995), "Seeing the Voice of the Customer: Metaphor-Based Advertising Research," *Journal of Advertising Research*, 35 (4), 35–51.

Signs of Sustainable Challenges in Intimate Habits

Lívia Lessa de A. Silva, Federal University of Rio de Janeiro, Brazil
Leticia M. Casotti, Federal University of Rio de Janeiro, Brazil
Catia Silva da C. Moreira, Federal University of Rio de Janeiro, Brazil

INTRODUCTION

This study aims to understand meanings and practices associated with intimate habits that can represent challenges for more sustainable consumption. Our context is showering routines and we observed issues related to water consumption and consumption of hygiene products. Our daily routines, such as taking a shower, are still obscured (Wals, 2019). It is a long way to uncovering what makes our unsustainable routines practices and how to engage in new responsible and sustainable ones. Showering is our context, a strong habit because of its frequency and repetition, its private and intimate character, its objects, meanings and doings embodied in its practice (Wilhite, 2012; Magaudda, 2011).

We locate different political views on sustainable initiatives. One of them believes that behavior change depends fundamentally on the will and capability of individual action, another view advocates a structural change in society. Public policies have shown the protagonism of individual choice, i.e., they seek to inform in order to enable people to rationally choose better options (Fung, Graham & Weil, 2007). Nevertheless, recent studies show that structure and socio-material context overlap with cognitive aspects (Hargreaves, 2011; Shove 2010, 2013). When people consume resources like water, electricity or gas, they are actually consuming services and experiences in a cultural context provided by these resources. We follow the belief that for more effective sustainability initiatives it is important and necessary to understand meanings and practices that build habits (Shove, 2003; Shove & White, 2011; Wilhite, 2012).

Tadajewski (2019) attributes to marketing the creation and destabilization of habits and advocates the importance of the discipline to focus on the formation, maintenance, and change of consumer habits. White, Habib and Hardisty (2019) made an academic literature review from marketing and behavioral sciences focus on how consumer behaviors can be more sustainable. They propose a guiding framework based on psychological factors and they discuss shift factors to sustainable consumer behavior. However, they underestimated the cultural perspective contribution that guided our research. We highlight the inspirational work of Elizabeth Shove and colleagues using the lens of Practice Theory (Shove & Wilhite, 1999; Shove, 2003; Shove, 2007; Shove, Trentmann & Wilk, 2009; Shove, 2012; Shove, Pantzar & Watson, 2012).

We contribute to consumption studies bringing data from intimate practices of material, sensory, hedonic interactions of a ritualistic and daily experience. Different from the predominantly cognitive approach, this exploratory work brings an intimate and holistic view of the mundane showering ritual. Researchers should engage with lived experience to make the individualized experience more real and connected with the historical, material, social, and cultural forces. As our interviewees narrate, taking a shower is a daily, intimate journey rather than a functional hygiene practice. The showering experience reveals multiple social and material interactions that involve time and space.

We found similarities with Shove's (2003) description of practices that go "behind the bathroom door". Shove's work brings a historical perspective to show how cultural practices evolved to unsustainable consumption patterns. We go further connecting showering intimacy with sustainable challenges and possibilities of material-social-political interventions, such as the use of transformative learning theory (James, 2019; Pisters, Vihinen & Figueiredo, 2020), a pedagogical proposal that considers mundane experiences as part of social and cultural life, rather than as individual and autonomous practices.

METHOD

This qualitative study followed an interpretive approach (Arnould & Thompson, 2005; Strauss & Corbin, 2008) using two types of data collection: bathroom observations that gave rise to field notes and photographs (Cresswell, 2013) and in-depth narrative interviews, seeking a deeper understanding of the topic (Belk, Fischer & Kozinets, 2013).

We conducted ten narrative interviews to understand signs of sustainable challenges in intimate habits. We investigated the experience of showering with the elements that are part of this daily habit and the meanings associated with this experience. The interviews followed a semi-structured script and were recorded and transcribed with the prior authorization of the interviewees, totaling about 11 hours of recording and 132 pages of transcription. We decided to interview, in the first part of the research project, urban women, educated, young (up to 30 years old), residents of the state of Rio de Janeiro from the upper-middle class.

We asked the interviewed women to visit the bathrooms where they used to take a shower. Once inside these places, other questions were asked regarding the space, the products present there, the practices related to their use, the moment of showering, etc. In the end, we asked for permission to take some photos of the environment in order to illustrate the conversation and to be later analyzed.

The analysis of the interviews was done through the open coding method, which consists in identifying phenomena and building concepts and categories through a thorough examination of the data (Strauss & Corbin, 2008). After the process of separation into distinct parts, we made comparisons, searched for similarities and differences between the data collected, as proposed by Strauss and Corbin (2008), and only then emerged the categories of analysis.

MAIN FINDINGS

Conflicts and sustainability in showering experience

The open questioning about the meanings of water has brought some concerns about sustainability and water's future as a natural resource. However, when interviewees reported the experience of showering, sustainable issues dissolve amidst scenarios, emotions, materialities, and possibilities of living the showering experience.

The testimonies show some discomfort with the excessive consumption of water in the shower, with chemical components of the products or with difficulties in access to sustainable products. Marcela (25) signals that she wants to start a movement of change in consumption: "I would like to", "I have been looking", but refers to the "environmental issue" as "hypocrisy". She reveals that the first motivation to consume more ecological products is "the health of body, hair, skin" and that the "health of the planet and the environment" is only a consequence.

Some interviewees revealed conflicts regarding the waste of water when in long and relaxing experiences of showering. To balance this conflict, they justify themselves by making comparisons

with industry and compensatory mental calculations. Monica (25) and Amanda (21) recall that the amount of water wasted by industries is much greater and that it would not be consistent to consider showering water as a villain. Amanda (21), who is a vegetarian, explains her considerations:

"I've studied and I know that most of the waste of water is in industry. If I take a shower for 15 or 20 minutes, it won't make any difference. If I stop eating a pound of meat it will make a lot more difference than two months of showering."

Talita (24) recounts her recent "attempt" to spend less water and already presents her doubts about the continuity of the new practice.

"Usually, I shaved inside the shower and yesterday, for the first time, I said 'I'm not going to do that inside the shower, I'm going to do it outside so as not to stay in the shower too long'. I don't know if it's something I'll keep doing, but it's an attempt to spend less water."

Showering is a daily, ritualistic and intimate experience. The movement of change is not easy because it also requires understanding external forces that participate in the construction of the experience and present factors that can be confronted and modified (Wacquant, 2007; Sahakian & Wilhite, 2014). As one interviewee reported, "showering is a journey". We found curious motivations, descriptions, and interpretations about this trip that will be synthesized below and that were separated into three types of showering: routine, beauty care and hedonic.

Taking a routine shower

Consumption studies analyze several automated and routine daily practices such as bathing (Phipps & Ozanne, 2017; Wilhite, 2012; Shove, 2012). Some meanings of these practices are assumed, while others are in a "bubble of inattention" (Phipps & Ozanne, 2017), what explains why the first functionality of taking a shower, body hygiene, appears discreetly in the reports. Cleaning is such a basic function that it doesn't even need to be remembered.

The stages of this daily shower are described by Natália (26) as an "automatic" "process", "without thinking", something that compares to putting the cell phone in "airplane mode". This "process" is described as embedded security by Phipps and Ozanne (2017), because it is a routine and we do not think about it. Daily incorporated activities bring security, predictability, and serenity. Talita (24), on the other hand, speaks of the daily showering as faster, a "cycle" to be accomplished, an "obligation", a "need" before formal commitments. She differentiates the morning shower from the night shower, which is more relaxing and longer-lasting and will be explored further on.

Taking a beauty shower

This type of showering involves several aesthetic practices, is deliberate, and therefore has a longer duration, occurring on specific days. It includes practices aimed at self-care, cares for "the other" or cares for special occasions where they meet "others". In this type of showering, beauty products proliferate for rituals of aesthetic transformation that seek a "right appearance" suited to social expectations (Rook, 2007).

Taking a beauty showering differs from the habit since it is not characterized by the automatism of realization (Wilhite, 2012). Laís describes its product planning, time, periodicity and spaces involved, for example, inside or outside the bathroom or shower, with or without the use of the sink. The spaces, products and time are related to the different aesthetic care inserted in the showering experience that can involve the use of masks on hair and face, exfoliating, hair removal, and hair discoloration.

"I plan what I'm going to use, if I'm going to stay until the end (in the shower) or if I'm going to wash my head in the laundry sink because I'm too lazy to wait for the hair mask to take effect [...] I plan what I'm going to use in the day if it's going to be faster or not. [...] This one is like the monthly shower, but it usually occurs on Thursdays, which is the day of discoloring hair, exfoliating, using everything I have in my bathroom."(Laís, 25)

Showering as an aesthetic care can be seen as a beauty ritual and includes processes and products that are not common to routine. Beauty showering involves "more attention" than routine showering. As Bruna (25) explains: "When I meet someone [...] the motivation to take a shower is to feel better with my body and my image".

Shove (2003) describes bathing in Europe as an experience that remains private and without technological advances, what differs from the diversity of products photographed that are part of the action described as an experience also "for the other".

Taking a hedonic shower

For some interviewees, the most striking feature of the showering experience is pleasure. The bathroom is highlighted as the space where they can "relax", "slow down", "do nothing" or take a break from their daily routine. As Amanda (21) explains: "When showering you can't do two things at the same time, so it's the moment to stop and just take a shower, a time for me, to slow down".

Showering is a source of relaxation and energizing and joy. For Talita (24), the night shower is a "relaxing ritual", while for Beatriz (26) the pleasure is "the sensation of water in the body" when she is upset, what gives her "energy". Showering is also reported as a turning point related to depressive states. When Yasmin (25) feels sad and does not want to leave home, she does not take showers. The denial of showering seems to be a metonymy: denying the shower is like denying life. She says that in these moments she doesn't want to look at or feel herself. She explains how taking a shower represents getting out of the "depressive feeling":

"The turning point is taking a shower, the turning moment to go to life and say to myself 'wake up, you have to get out of the house and do what you have to do, you're alive'. It never happens that I take a shower and keep the same depressing feeling."

FINAL COMMENTS

In the small space of the bathroom, we found intimate and insightful experiences that delineate sustainable challenges more broadly, going beyond those focused on individual decision making. The observations and narratives show the political-social-material possibilities of interventions to promote sustainable consumption practices. The main findings are summarized in table 1.

In the routine showering, speed and a "bubble of inattention" (Phips & Ozzane, 2017) predominate. The main specific challenge in this type of shower is to break the automatism of behavior (or taking advantage of it). Our research indicates that public policies could pursue the reconfiguration of socio-material environment, e.g., regulating the dimensioning of water flows, encouraging morning showers, stimulating new market technologies to become possible. These policies may include measuring water consumption during the shower and/or per room, having devices alerting about time spent in the shower, and developing products which are easy to rinse. Other

Table 1: Showering experiences: sustainability and possibilities

	Main Findings	*Sustainable challenges*	*Political-Social-Material Possibilities*
Taking a routine shower	• Daily habit • Automatization • Short duration • Focus on functional aspects • Basic hygiene products	• Change the automatism • Show individual impacts • Connect individual impacts with collective issues and future consequences • Encourage morning routine of this showering type	• New technologies to indicate showering water consumption (time warnings and water bill divided by rooms or taps consumption) • Public policies to encourage morning showers • Regulations on water flow sizing • Encourage products innovation that are easy to apply and rinse • Transformative learning to increase consumer awareness about its own practices' impacts • Transformative learning to connect the notion of self to the collective and the planet
Taking a beauty shower	• Planned/deliberated ritual • Less frequent • Rituals of appearance care • Plenty of products • Plenty of processes • Hair care influences other types of care • Long duration • Search for aesthetic results • Aesthetic self-care for others	• Shorten the duration • Use sustainable products • Shorten the necessity of water in beauty processes • Question imposed beauty standards • Connect individual impacts with collective issues and future consequences	• Create beauty processes that prevent water waste or do not require water • More innovation offers of sustainable products • Hair products deserve special attention because they influence the consumption of other items • Transformative learning to question and raise consumers awareness of cultural standards of beauty • Transformative learning to increase consumers awareness of their own practices' impacts • Transformative learning to connect the notion of self to collective and planet
Taking a hedonic shower	• Ritual of pleasure and reenergization • Sensorial and affective • Long duration • Plenty of products • Self care • Represents a break in the everyday rush	• Encourage other ways of reenergization • Shorten the duration • Question justifications and compensatory calculations used • Strengthen identity of concern for the environment • Connect individual impacts with collective issues and future consequences	• Taxes on excessive water consumption • Encourage other reenergization practices • Public communication initiatives on social networks to raise awareness of sustainable issues • Transformative learning to increase consumers awareness of their own practices' impacts • Transformative learning to connect the notion of self to collective and planet

market offerings could help to simplify the showering process, like products that accumulate several purposes in common, such as those proper to wash both hair and body.

The beauty shower ritual is planned, full of products and processes, long but less frequent. This private ritual is searching for results to please a social audience. The hair seems to have a special meaning dominating the planning processes and influencing the use of other beauty products. Hair care seems to be more connected with sensualization aesthetics. How to shorten the showering duration to avoid waste of water and break imposed beauty standards? New technologies, public policy incentive and regulation can support the transformation of these ritual characteristics into more sustainable ones.

Hedonic showering rituals are also deliberated and have a long duration, but this type is less planned than the beauty shower. It seems to be related to more sensorial and affective aspects, in the search of pleasure and reenergizing. Our findings can be connected with some aspects of Bargh and Shalev's (2012) study which highlighted that showering can be part of emotion regulation and can also compensate the lack of social intimacy. Those characteristics can be the greatest challenge to transform this experience. We can point strategies to reach more sustainable practices: to incentive other ways of pleasure and reenergization, to create justifications and compensations to stimulate shorter duration baths and to promote connections with collective causes and the future scenario of planet unsustainability. Interventions should be creative in the use of social media to promote other forms of routine pleasures and pauses. The encouragement of meditation, with practice in schools and companies, could bring benefits in this regard.

We found that, despite the type of intimate habit, to evolve towards more sustainable practices it is necessary a symbolic reframing because it is hard to change behavior with only information interventions. Besides this symbolic reframing being part of public and private discourses, we believe that transformative education (Pisters, Vihinen & Figueiredo, 2019; James, 2020) can play a role in this. Transformative education seeks to bring to consumers the awareness of the automated aspects influenced by sociocultural structures. Broadening awareness of the interrelationship of self, society, and planet can make consumers reflect on the impacts of their day-to-day practices. The main points to be addressed through transformative education are: turning individual impacts more tangible, showing the implications of the individual practice on the collective sphere, breaking rationales and compensatory calculations of unsustainable practices and stimulating public commitments to change.

REFERENCES

Arnould, E. J., & Thompson, C. J. (2005). Consumer Culture Theory (CCT): Twenty Years of Research. *Journal of Consumer Research*, Volume 31, Issue 4, March, Pages 868–882.

Bargh, J.A. & Shalev I. (2012). The substitutability of physical and social warmth in daily life. *Emotion*. 12(1):154–162.

Belk, R. W., Fischer, E., & Kozinets, R. V. (2013). Qualitative consumer and Marketing research, London: Sage.

Cresswell, J. (2013). Designing a Qualitative Study. In J. W. Cresswell, *Qualitative Inquiry and Research Design: Choosing among five approaches* (3rd ed., pp. 42-67). Lincoln.

Fung, A., Graham, M., & Weil, D. (2007). *Full Disclosure: The Perils and Promise of Transparency*. Cambridge: Cambridge University Press.

James, Anna. (2019). Making (Non)Sense of Urban Water Flows: Qualities and Processes for Transformative and Transgressive Learning Moments. Sustainability.

Magaudda, P. (2011). When materiality 'bites back': Digital music consumption practices in the age of dematerialization. *Journal of Consumer Culture, 11*(1), 15-36.

Phipps, M., & Ozanne, J. (2017). Routines Disrupted: Reestablishing Security through Practice Alignment. In *Journal of Consumer Research*.

Pisters, S.R., Vihinen, H. & Figueiredo, E. (2020). Inner change and sustainability initiatives: exploring the narratives from eco-villagers through a place-based transformative learning approach. *Sustain Sci* 15, 395–409.

Rook, D. (2007). Dimensão ritual do comportamento de consumo. *Revista de Administração de Empresas*, 47 (1), 81-98.

Sahakian, M., & Wilhite, H. (2014). Making practice theory practicable: Towards more sustainable forms of consumption. In *Journal of Consumer Culture* (14th ed., pp. 25-44).

Shove, E. (2003). *Comfort, Cleanliness and Conveniene: The Social Organization of Normality*. Oxford.

Shove, E. (2012). Habits and Their Creatures. In A. Warde & D. Southerton, *Habits of Consumption* (pp. 100-112). Helsinki: COLLeGIUM.

Shove, E., & Wilhite, H. (1999). *Energy policy: what it forgot and what it might yet recognise*. Presentation.

Shove, E., Watson, M., Hand, M., & Ingram, J. (2007), The Design of Everyday Life, Oxford: Berg.

Shove, E, Trentmann, F & Wilk, R (2009), *Time, consumption and everyday life: practice, materiality and culture*. Cultures of consumption series, Berg.

Shove, E., Panzar, M., & Watson, M. (2012). *The Dynamics of Social Practices*, London, SAGE.

Tadajewski, M. (2019). Habit as a central concept in marketing. Marketing Theory, 19(4), 447–466.

Wacquant, L. (2007). Esclarecer o habitus. In *Educação & Linguagem* (10th ed., pp. 63-71).

Wals, A. E. J. (2019). Sustainability-Oriented Ecologies of Learning: A response to systemic global dysfunction. In R. Barnett, & N. Jackson (Eds.), *Ecologies for Learning and Practice: Emerging Ideas, Sightings, and Possibilities* London: Routledge.

White, K., Habib, R., & Hardisty, D. (2019). How to SHIFT Consumer Behaviors to be More Sustainable: A Literature Review and Guiding Framework. Journal of Marketing. 83.

Wilhite, H. (2012). Towards a Better Accounting of the Roles of Body, Things and Habits in Consumption. In A. Warde & D. Southerton, *The Habits of Consumption* (pp. 87-99). Helsinki: COLLeGIUM.

Fix, make, burn or blow things up! How Makerspaces Foster Consumer Empowerment

Caitlin Elizabeth Simard, Federal University of Rio de Janeiro, Brazil
Maribel Carvalho Suarez, Federal University of Rio de Janeiro, Brazil

INTRODUCTION

Makerspaces are collaborative places for tinkering, creating, experimenting, and sharing knowledge and experiences using various tools and technologies (Halbinger, 2018). They provide access to a range of equipment and machines for personal making (Smith et al. 2016), that allow people to make things, from the beginning idea to final production (Fleischmann et al. 2016). Makerspaces blur the lines between crafts and technology (Posch 2017) and are seen by some as an iteration of the DIY culture (Papavlasopoulou, et al. 2016).

Makerspaces have been studied for potentializing entrepreneurship, innovation, diffusion, and local economic development that can contribute to the public good (van Holm 2015). They provide access to and lower the costs of those factors known to support innovation (Halbinger 2018) and diffusion (de Jong et al. 2015). Despite this relevance, however, little is known about repercussions to and influences on consumers practices.

Prosumption is an emerging practice in which consumers become producers and make some of their own products (Ritzer et al. 2012). The present research investigates how participation in Makerspaces has the potential to transform consumers' relationships with products and consumption. More specifically, this research aims to understand how Makerspaces foster consumer empowerment.

PROSUMPTION AND EMPOWERMENT

Wolf and McQuitty (2011) refer to the empowering potential of prosumption at an individual level via DIY activities. Hunter and Garnefeld (2008) view consumer empowerment as a positive subjective state which results from a mental comparison of a consumer's abilities relative to existing or previous abilitie. In a diferent direction, Cova and Cova (2012) discuss prosumption empowerment as a marketing discourse engendring governmentality (Foucault 1978) of consumers. Presenting prosumers as autonomous and competent co-producers, this discourse contributes to moulding consumers to the neo-liberal project, inflating the role of consumption instead of using the more prevalent non-consumption related competencies.

Holt (2002) suggests a alternative approach, presenting consumer empowerment as seeking out social spaces that make it possible to produce a culture that is different from that forced upon consumers by the market. In turn, these spaces allow consumers to constantly reconfigure their identities, as opposed to letting the market dictate identity for them (Holt 2002). Denegri-Knott et al. (2006) view consumers as empowered when they can manipulate and even produce special spaces within the existing market in which they can construct their cultural (consumer) identity. The authors (2006, p.964) argue that "a *truly powerful consumer would be a **maker**, and not adapter of spaces and goods"*.

This is a key insight into how Makerspaces could contribute to empowering consumers by enabling and infact encouraging them to engage in physically making goods. Another differentiating element of Makerspaces is the person to person interaction between consumers. Denegri-Knott, et al. (2006) have found that consumer power becomes amplified when consumers combine their resources and skills with those of other sovereign agents. In this sense, Makerspaces can potentialize consumer empowerment through collective prosumption and resource sharing.

The present research on Makerspaces contributes to what has been studied in terms of consumer empowerment via prosumption in two primary ways. The first way is studying prosumption in a collective space as contrasted to the preponderance of prosumption research which has been studied on an individual level through DIY activities (Wolf and McQuitty 2011) and craft consumption (Campbell 2005). The second contribution is by studying prosumption in a physical environment, rather than the commonly research of prosumption research which has been studied in digital communities (Tian et al. 2017).

METHOD

This research investigates two case studies: HacDC and Arlington Central Library. These studies were chosen using theoretical sampling (Eisenhardt 1989) and convenience criteria. The two cases were selected because they represent polar types, which can be helpful to make the process of interest "transparently observable" (Eisenhardt 1989). Both the HacDC and Arlington Central Library research studies fall under the maker umbrella, and have many commonalities, but they also have many distinctions.

HacDC is classified as a Hackerspace (van Holm, 2015), which means that participants make some physical artifacts as in other Makerspaces, but the focus of the projects is more on technology and software, rather than hardware. HacDC was founded in 2008 by a diverse group of engineers, artists, and hobbyists. It is the second oldest hackerspace in the United States. There is a $60 monthly membership fee with approximately 50 members. There are monthly meetings in which members decide upon programming and other issues pertinent to the Hackerspace. HacDC is a nonprofit organization and has a board of directors that is run by volunteer members, thus presenting an anarchistic, countercultural environment and ethos.

Arlington Central Library is classified as a makerspace in the general sense of the term, or a space where people gather to make things with tools and materials (Smith et al. 2016). This Maker program run by paid government workers, employs low to mid-level tech, and has a very open, collaborative, calm environment, with no explicit political undertones. It started in 2015, when librarians identified that Makerspaces were trending at other libraries and they decided to ask the Library board for funding for Maker events. The Library is located in the Arlington neighborhood of Virginia, which is relatively affluent and well developed.

The data for this study were collected using two primary research methods both field observation (Emerson 1995) and interviews (Spradley 1979). Field observations took place from June 2018 – September 2018. The first author attended a variety of events and programming at the two sites over this period, observed the physical space, governance, structure, participants, and culture. Six participants were interviewed, providing a mixture of both organizers and participants, to gain more diverse perspectives. Informants profile is presented on Table 1.

Analytical procedures followed the part-whole process of hermeneutic analysis (Thompson, 1997), including open coding and analytical memos (Saldaña 2015). The idea behind these procedures is to compare and contrast interviews, observations and cases, developing categories and concepts. Rather than being linear, this process evolved in several rounds of coding and frequent references to the literature as specific themes emerged.

Table 1: Profile of Interviewees

Pseudonym	Case	Age	Years at Markespace	Affiliation
Stacy	Arlington Central Library	30	1.5	Adult Maker Librarian
Dawn	Arlington Central Library	56	3.5	Teen Maker Librarian
Maria	Arlington Central Library	29	3	Library Associate
Frederick	HacDC	58	10	Member
Dave	HacDC	38	3	Member
Mike	Arlington Central Library	39	4	Volunteer

RESULTS

HacDC and Arlington Central Library gather consumers in the same place and give them the tools including physical, social, cognitive, experiential and emotional ones, to make their own things. Observation and interviews suggest that the Makerspaces foster environments ripe for stimulating consumer empowerment. The stimulation of consumer empowerment ultimately happens through consumers being exposed to new contexts with materials, through human-thing interaction and learning how to prosume in a collaborative environment. Both HacDC and Arlington are places where consumers can combine their efforts and resources to make and fix their own products, and in this way their consumption interests can counter traditional capitalistic models. This idea is similar to that of Denegri-Knott et al. (2006), who suggested that consumers often combine resources to feel empowered in the face of mainstream producers.

Building upon the concept of prosumption in physical settings, we extend Hunter and Garnefeld's definition of consumer empowerment as it occurs in Makerspaces to "prosumer empowerment". This extension is well situated, as the father of the Maker Movement, Dale Dougherty, believes the Movement has come about at least in part due to people's desire to engage with artifacts in ways that make them more than consumers (2012). In the case of Makerspaces, it is in a way that makes them prosumers. This definition is extended, as our exploration goes beyond the subjective, individual, psychological aspect of consumer empowerment to explore empowerment as a collective experience in collaborative environment where consumers are empowered to become prosumers, through the interaction among human and non-humans actors.

Our research evidences that not only humans but tools are central to Makerspaces and the prosumer empowerment process. First, because consumers have access to tools they would not have oterhwise have had access to in their own homes. For example, very few consumers have 3D printers, laser cutters, or soldering irons to make their own goods, but these are available for use at Makerspaces.

Second, we suggest that empowerment emerges in the iterative process occurring between humans and things intentions. Participating on Makerspaces consumers present different intentions related to each specific prosumption practices, such as:(1) Fix/repair; (2) Create/invent new things; 3) Hack/modify a finished product to adapt to an unintended function. Non-human objects, in the same way, carry their own intentions. Based on Bulow (1986), we highlight two intentions that pose a challenge to the consumers on Makerspaces: 1) Built-in obsolescence which relates to the conception, design, and production of a commodity with an intent of it being useful, functional or popular for a certain period of time, after which it becomes unfashionable or no longer functional and 2) non-repairable, which occurs when a product is designed with an intent to only be repairable by the manufacturer or not at all.

Our analysis suggests that as consumers interact with objects and their own intentions, either by having them fulfilled or seeing them disrupted by the design intention of things, they can become empowered to prosume. An example of this occurs when a consumer with a certain action intention effectively carries out this action. This empowerment happens through a sense of self-fulfillment and accomplishment, and ultimately the human fulfilling the action intention. The consumer breaks the design intention of the object and ultimately grants a new application to the object or returns the object to its original application or function.

However, we also observed consumers who came into the Makerspaces intending to fix or repair an object but who were ultimately unable to do so. In this sense, their action intention was disrupted, and their sense of agency was stimulated. The resulting frustration and realization that not everything is repairable reveals the commercial forces that shape consumption to some extent and serves to empower consumers by giving them the opportunity to rethink their consumption of and relationship with things. In this sense, we suggest that this activation can also lead the consumer to think critically and evaluate their current consumption.

This concept of disrupting or 'breaking' the action intention of the consumer is illustrated by Mike, a volunteer in Arlington. He considers himself a professional Maker, meaning he is a handyman, an artist, a designer, among other skills or talents. He explains that in the case of technology, the intention of the thing is not to be repairable by consumers. Contact with this reality can transform consumers:

I think it's good for people to engage in, especially when you think in terms of what you're doing when you buy a new thing that's like that, maybe the next time you buy a new thing, you say hey 'is this going to last, is this really worth buying? Do we want to turn the resources of the planet into this thing that's ultimately gonna be a piece of trash?

In this case, the action intention of the consumer, which is to fix a technological artifact, resulted in a disruption to fulfilling the desired outcome of being able to fix it. Following Haggard & Tsakiris' (2009) concept, this could result in the consumer having a greater sense of control over the consequences of his choices and therefore, over this or her own consumption. Latour (2008) frames this discussion in terms of 'reopening' artifacts, suggesting that people are increasingly recognizing the "designed" rather than "discovered" quality of artefacts, a realization that reopens them. In this sense, the interaction between humans and things in an intentional manner allows consumers to see materials in a different light, demonstrating to them the "poor" design of some products and giving them the tools to restore the original affordances. The actual act of using the materials to restore affordances can empower consumers to build the world they want to see. Consumers in Makerspaces have the poten-

Table 2: Summarizing the results

Makerspace Collective Practice	Consumers Intentions x Design Intentions	Empowerment Process
Fixing/Repairing	Restoring the original affordances of objects, originaly built to obsolescence and to be non-repairable	**Favourable outcome** - consumers would break the design intention of the object and ultimately grant a new affordance to the object or return the object to it original affordance, engendering confidence. **Unfavourable outcome** – consumers frustration reveals the commercial forces that shape consumption, engendering reflexivity.
Inventing/Creating	Producing something brand new from raw materials	Creat new offers and new ways to fullfill existing needs, engendering criativity.
Hacking/Modifying	Changing the affordance of objects	Subverting existing logics, consumers can create cheaper, long lasting and more efficient products, engendering transformative and sustainable utopias.

tial for seeing matters of fact as matters of concern. This consumer empowerment can happen individually, when a consumer realizes that an object can not be fix/repaired, as well as in a group, when a consumer witnesses this situation happening with another consumer. This latter situation constitutes collective consumer empowerment.

Inventing and creating practices have a similar outcome intention which is to produce something completely new from raw materials. This is distinct from repairing, which is returning things to original purposes (Jarzabkowski et al. 2013). Inventing has a scientific, commercial connotation, while creating has an artistic, exploratory connotation. One interesting example was presented by members of HacDC who invented a circuit board system to showcase at the DC Maker Faire in June 2018. This was a collective effort that involved a creative process and many materials. The product which was for desoldering circuit boards, potentially could have been brought to the market for $3,000, but instead the hackers pooled their knowledge and energy and created one for $60. The functionality of this invention was to desolder circuit boards into their respective parts once the circuit board was no longer functional or if some of the parts were needed or useful for another project. This is another example of collective consumer empowerment through pooling resources and knowledge.

Finally, hacking or modifying is distinct from the other two action intentions explored, specifically, fixing and inventing, as it seeks to explicitly change the function and reason for various objects creation and intended use. Hacking is also a creative process, embedded in the hacker ethic of problem-solving (Erickson 2008) as well as producing novel artifacts (Söderberg 2007). At HacDC, Frederick feels particularly excited with the experiences in which they blow things up, experimenting to learn how the product works:

I found this amazing book on analog electronics that says, 'Burn things out, blow things up' and that's how you learn, by experimenting. Let's slice this open with a box cutter and see if we can keep it working while its being cut open.

This is a prime example of improving purposes and applications and "disrupting" the design intentions embedded in objects. It also speaks to how hackers view the interaction with materials, which is "we can take it apart and make it work even better than now". This prevalent attitude on Makerspaces leads to consumer empowerment and agency because members are in a space where it is expected that you not only fix things, but also improve them. In this sense, members literally "fix" a problem, something that isn't working or something that could work better. In this sense, they can see beyond the implicit intentions for the objects. This innovative ethos also af-

fects other practices, for instance, the way consumers perceive and manage their trash. Dawn, a Maker Librarian at Arlington, explains how she started to see treasures in trash once she began the Maker program:

"Once you get your mind that way, it's hard to walk by a so-called pile of "trash" and not like look at it again and think 'Can I do something with this?' and that's what I do all the time".

Our analysis of Makerspaces relates sociomateriality to consumer empowerment, by studying consumers' activated sense of agency when they interact with materials. Depicting the iterative process connecting and challenging humans and things intentions, the research explains how the prosumer empowerment process can lead not only to users more readily recognizing the affordances of different objects, but also how to effectively gain the practical skills to act upon this knowledge by making some of their own goods and learning how to fix others, thereby defying design intentions and the mainstream marketplace.

REFERENCES

Bulow, Jeremy (1986). "An Economic Theory of Planned Obsolescence". *The Quarterly Journal of Economics*. 101(4), 729–749.

Campbell, C., 2005. "The craft consumer: culture, craft and consumption in a postmodern society". *Journal of Consumer Culture* 5, 23–42.

Cova, B., & Cova, V. (2012). On the road to prosumption: marketing discourse and the development of consumer competencies. Consumption Markets & Culture, 15(2), 149-168.)

Dougherty, Dale (2012), "The Maker Movement," *Innovations: Technology, Governance, Globalization*, 7(3), 11–4.

de Jong, Jeroen P.J., Eric von Hippel, Fred Gault, Jari Kuusisto, Christina Raasch (2015), "Market failure in the diffusion of consumer-developed innovations: patterns in Finland," *Research Policy*, 44(10),1856–65.

Denegri-Knott, Janice (2006), "Consumers behaving badly: deviation or innovation? Power struggles on the web," *Journal of Consumer Behaviour*, 5(1), 82-94.

Denegri-Knott, J., Zwick, D. and Schroeder, J.E. (2006) 'Mapping Consumer Power: An Integrative Framework for Marketing and Consumer Research', *European Journal of Marketing*, 40(9–10): 950–71.

Eisenhardt, Kathleen (1989), "Building Theories from Case Study Research," *The Academy of Management Review*, 14(4), 532-50.

Emerson, R. (1995), *Writing Ethnographic Field Notes*, Chicago: University of Chicago Press.

Fleischmann, Katja, Sabine Hielscher and Timothy Merritt (2016), "Making things in Fab Labs: a case study on sustainability and co-creation," *Digital Creativity*, 27(2), 113-21.

Foucault, Michel (1978). La gouvernementalite´, cours du 1/2/1978. In Dits et e´crits, Tome III. ed. Michel Foucault, 635–57. Paris: Gallimard.

Haggard, Patrick and Manos Tsakiris (2009), "The Experience of Agency: Feelings, Judgments, and Responsibility," *Current Directions in Psychological Science*, 18(4), 242-6.

Halbinger, Maria A. (2018), "The role of makerspaces in supporting consumer innovation and diffusion: An empirical analysis," *Research Policy*, 47(10), 2028-2036.

Holt, Douglas B. (2002), "Why Do Brands Cause Trouble? A Dialetical Theory of Consumer Culture and Branding," *Journal of Consumer Research*, 29(1), 70-90.

Hunter, Gary L. and Ina Garnefeld (2008), "When does Consumer Empowerment Lead to Satisfied Customers? Some Mediating and Moderating Effects of the Empowerment-Satisfaction Link," *Journal of Research for Consumers*, 15, 1-14.

Jarzabkowski, Paula and Trevor Pinch (2013), "Sociomateriality is 'the New Black': Accomplishing repurposing, reinscripting and repairing in context," Management (France), 16(5), 579-92.

Latour, Bruno (2008), "A cautious Prometheus? A few steps toward a philosophy of design," Keynote lecture for the Networks of Design meeting of the Design History Society, Falmouth, Cornwall.

Papavlasopoulou, Sofia, Michail N. Giannakos and Letizia Jaccheri (2016), "Empirical studies on the Maker Movement, a promising approach to learning: A literature review," *Entertainment Computing*, 18, 57-78.

Posch, Irene (2017), "E-textile tooling: new tools—new culture?" *Journal of Innovation and Entrepreneurship*, 6(10).

Ritzer, George, Paul Dean and Nathan Jurgenson (2012), "The Coming Age of the Prosumer," *American Behavioral Scientist*, 56(4), 379–98.

Saldaña, Johnny (2015), *The coding manual for qualitative researchers*, Thousand Oaks: Sage.

Smith, Adrian, Sabine Hielscher and Mariano Fressoli, (2015) Transformative social innovation narrative: Hackerspaces. http://www.transitsocialinnovation.eu/content/original/Book%20covers/Local%20PDFs/149%20TSI%20Narrative_Hackerspaces_Upload.pdf

Söderberg, Johan (2007), *Hacking Capitalism: The Free and Open Source Software Movement*, New York, NY: Routledge.

Spradley, James (1979), *The ethnographic interview*, New York: Holt, Rinehart and Winston.

Thompson, Craig J. (1997), "Interpreting consumers: a hermeneutical framework for deriving marketing insights fromthe textsof consumers' consumption stories," *Journal of Marketing Research*, 34(4), 438-55.

Tian, Jiamian, Lein Shen and Ye Chen (2017), A Study on Customer Prosumption Concept and Its Impact on Enterprise Value Co-Creation. *Theoretical Economics Letters*, 7, 2040-53.

van Holm, Eric Joseph (2015), "Makerspaces and Contributions to Entrepreneurship," *Social and Behavioral Sciences*, 19, 24-31.

Wolf, Marco and Shaun McQuitty (2011), "Understanding the do-it-yourself consumer: DIY motivations and outcomes," *Academy of Marketin Science Review*, 1(3/4), 154-170.

Consumer Waste Meaning(s): A Semiotic Perspective

Cristiano Smaniotto, Aarhus University, Denmark
Jean-Paul Peronard, Aarhus University, Denmark
Anne Gammelgaard Ballantyne, Aarhus University, Denmark

INTRODUCTION

Environmental changes have raised concern about the deteriorating effects that current consumption modes have on the wellbeing of the entire planet (World Economic Forum 2009a, 2009b, 2010). Consequently, there is a growing research concern for sustainable consumer behavior (e.g. Gabriel and Lang 2008; Giesler and Veresiu 2014; Mick et al. 2012). Whereas existing consumer research has primarily been occupied with issues of (sustainable) acquisition and consumption (Antonides 2017), there has been less interest in issues of disposal behavior (Benton 2015; de Coverly et al. 2008). This is unfortunate, as consumer disposal plays a major role in establishing a sustainable future (Brosius, Fernandez, and Cherrier 2013). Therefore, the aim of this study is to enhance our understanding of consumer disposal by analyzing the symbolic relation between consumers and their discards.

Existing research focuses on disposal through two main perspectives: a decision-making perspective, investigating consumer choices leading up to waste production (e.g. Kidwell, Farmer, and Hardesty 2013; Roper and Parker 2008; Trudel, Argo, and Meng 2016); and an exchange perspective, investigating the practices through which consumers try to avoid waste by circulating valuable items (e.g. Brosius et al. 2013; Eden 2017; Lastovicka and Fernandez 2005). While both these lines of inquiry advance existing knowledge of consumer disposal, they unwillingly dichotomize consumer discards as either valueless (the decision-making perspective) or still-valuable (the exchange perspective). This dichotomization is dangerous because it implies a simplification for which discarded objects fit the either/or categories of valueless and valuable. However, studies show that consumers' categorization of the value of unused objects is not so straightforward (Cherrier and Ponnor 2010; Hirschman, Ruvio, and Belk 2012). To solve this issue, this paper offers a framework capturing the ambiguity of the relation between value and consumer waste, that is, between value and the objects that consumers discard. As value is a specific type of meaning (Miller 2008), our question is: what meanings do consumers attribute to waste? Put differently: how do consumers interpret waste?

To answer this question we draw upon semiotics, a theoretical approach especially suited when studying consumer interpretations of contrasting meanings (Floch 1988; Mick and Oswald 2006). The main contribution of our study is a semiotic square (Greimas 1983) that synthetizes consumers' multiple and often contrasting interpretations of their discards. We apply the semiotic square to focus groups interview data which allow us to contextualize, adjust and refine our model. In the discussion, we highlight the contribution of the proposed framework for existing research in consumer disposal. Overall, our model captures the dynamicity of consumer waste interpretations and offers a tool for future research to elaborate on changes in these interpretations.

CONCEPTUAL FRAMEWORK: WASTE IN CONSUMER RESEARCH

In this section we analyze how previous consumer research has investigated the relation between consumers and their discards. We identify two predominant approaches: the decision-making and the exchange approach. The basic distinction between these two approaches is the relation between waste and value they put forth. By comparing them, the aim is to identify what (does not) constitute waste in consumer research.

The decision-making approach predominantly analyzed consumer waste as garbage, i.e. discarded products which are considered valueless because at the end of their lifecycle. Here, waste becomes a problem of deciding where and how to dispose of a product. Studies of this kind produced indeed valuable insights on how attitudes (Roper and Parker 2008), motivations (Fernandez, Brittain, and Bennett 2011; Green, Mandhachitara, and Smith 2001; Trudel et al. 2016), lifestyle values (Aschemann-Witzel et al. 2018), political ideology (Kidwell et al. 2013) and product perception (Trudel and Argo 2013) influence consumer choices about product disposal. What is important to notice here is the opposition between waste and value put forth by these studies. Put differently, consumer waste is that which is not valuable (for consumers).

The second approach expands the analysis of disposal to the circulation of value happening through discard exchanges. These studies focus on a range of exchange practices, such as reselling (Lastovicka and Fernandez 2005; Philip, Ozanne, and Ballantine 2015; Ritch 2019), freecycling (Eden 2017), gifting (Roster 2014), passing on (Curasi, Price, and Arnould 2004; Price, Arnould, and Curasi 2000) and curbside dumping (Brosius et al. 2013; Guillard and Roux 2014; Roux, Guillard, and Blanchet 2018), through which consumers attempt to control the transfer of discarded objects that are still perceived as valuable (see also Türe 2014). Few studies also looked at how alternative practices of food waste recovery and distribution are normalized and, thus, the value of food waste reassessed (Gollnhofer 2017a; Gollnhofer 2017b; Gollnhofer, Weijo, and Schouten 2019). Therefore, this approach challenges the linear opposition of waste versus value discussed above, since from an exchange perspective discards may well be valuable.

Drawing on both approaches, we suggest that waste is both valueless and valuable. In other words, waste for consumers is not a fixed category of what is ultimately rejected because valueless, nor consumer always consider their discards for the potential value they may unleash trough exchange and circulation. More accurately, consumers attribute multiple and even contrasting meanings to waste, which reflect the different ways in which they interpret and engage with their discards.

METHODOLOGY

This study draws upon semiotics as a methodological entry point, because of the aim of exploring consumer interpretations of contrasting meanings (Floch 1988; Mick and Oswald 2006). To this end, we apply the theoretical notions developed by Greimas (1983) to develop a typology for conceptualizing consumers' meanings associated with waste. The developed typology is based on a review of extant literature in consumer waste and a deep reading of conceptualizations of waste in the social sciences. Key points from the literature are coupled with Greimas' (1983) semiotic square. The outcome is a typology of consumer waste meanings that is further contextualized by the empirical data of the study, which is based on the focus group methodology.

Focus group interviews is a recognized method to explore how meanings evolve in a social setting (Krueger 1998; Morgan 2010). We conducted 6 focus group interviews with university students.
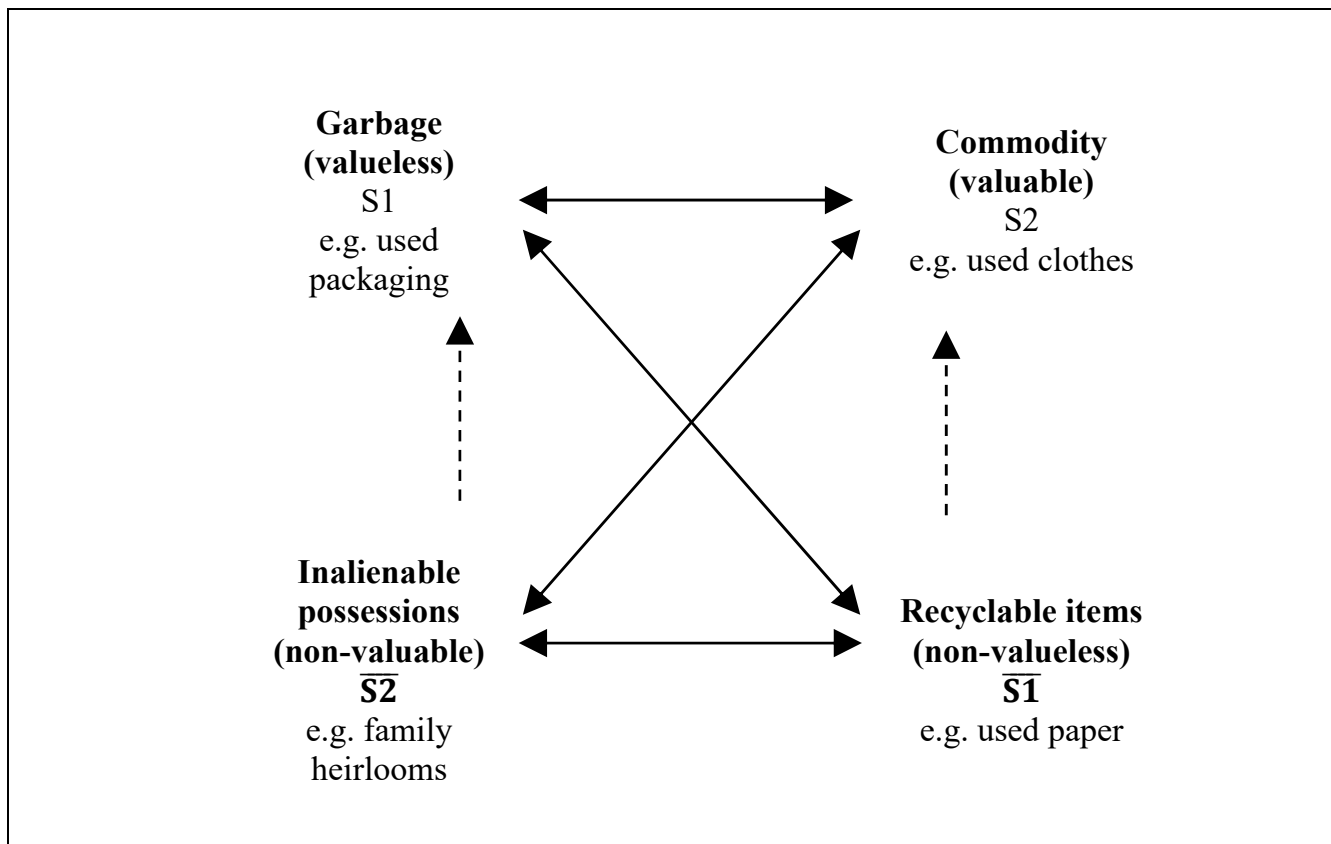
Figure 1 - A semiotic square of consumer waste meaning(s)

Each focus group interview consisted of 6-10 participants, with a total of 48 participants. We aimed for a heterogenous composition of groups to ensure a broader variation of opinions, experiences and meanings. Thus, each group consisted of a mix of men and women with different cultural backgrounds. The interviews were semi-structured and the participants were asked to debate their experiences with various types of disposal options. The main interview themes were (1) what is waste, (2) attitudes towards waste, and (3) rationales for disposal. The focus group discussions were audio recorded and transcribed verbatim with informed consent from the participants.

We analyzed the transcripts through a thematic analysis. According to Braun and Clarke (2006) the "thematic analysis is a method for identifying, analyzing, and reporting patterns (themes) within data" (6). A theme should capture important aspects of the research topic in the data. Hence, a thematic analysis may be done taking the point of departure in a theoretical interest in a given topic (Braun and Clarke 2006) In this study, the interview transcripts were thematically coded focusing on waste by utilizing Greimas' (1983) semiotic approach. More specifically, we applied the four units of meaning of the semiotic square as the theoretical backdrop for generating themes from the data (summarized in Table 1).

FINDINGS: A SEMIOTIC APPROACH TO CONSUMER WASTE

Based on structural semantics, Greimas (1983) created a method to analyze the meaning of concepts. A basic premise of this method is that meaning is created through differences (i.e. binary oppositions) among signs as they are used and interpreted by individuals. Greimas incorporated these oppositions into the semiotic square. There are two types of oppositions (S1, S2) at work in the semiotic square: the first is contrariety, which are semantic units of meaning

that are equally informative for the category in focus as well as opposite systems of meaning. The second is contradiction, which are relations formed on negation in terms of absence of some information or quality.

The relation of contrariety (S1, S2) is based on the characterization of waste as valueless versus valuable made by existing consumer research. Thus, on one hand, waste can be conceptualized as valueless, if consumers fail to integrate it within their pragmatic encounter with the world (Kennedy 2012). Valueless waste is commonly referred to as garbage, representing all those uncanny objects which in the consumer's eyes are doomed to be trashed. On the other hand (S2), consumers experience a range of objects as valuable, despite their intention to discard them (e.g. clothes, furniture). Paradoxically, while these objects may be waste(d) for individual consumers, they are nonetheless attributed value and are often exchanged. Thus, we refer to these discards as commodities.

Each bottom unit of the semiotic square (,) is a contradiction to either garbage or commodity according to the absence of some quality. *Valueless* (the absence of value) is the dominant quality of garbage. The absence of this quality is *non-valueless*. Intuitively, *non-valueless* is something which holds some kind of value. Yet differently from commodities, the value of the *non-valueless* is only potential, as it cannot be directly accessed by consumers under current conditions. Usually, this means that the object must undergo a process of transformation, before consumers can access its value. Nonetheless, consumers are able to imagine its potential future value. For example, discarded paper presently fails to integrate with consumers' pragmatic encounter with the world; yet consumers envisage that these discarded objects can generate value again whether they undergo a recycling process. Therefore, we refer to as recyclable items to identify all the objects which, following consumers' inter-

pretations, have value potential whether new conditions of usage are established (e.g. the object is recycled).

Finally, the non-valueless is related by contrariety to the non-valuable (). This complements the valueless (S1) as the non-valuable is the immanent possibility of valuelessness. However, the non-valuable is not not-valuable, but rather invaluable. Invaluable objects are objects that consumers would rather not discard, such as inalienable family heirlooms (Curasi et al. 2004). Hence, we refer to as inalienable possessions.

To sum-up, our semiotic square represents the complex system of contradictory meanings which consumers attribute to their (potential) discards. Instead of contributing to dichotomizing the view on waste as the opposite of value, our starting point was that waste is both valueless and valuable. Based on this insight, our model identifies four different categorization waste to which consumers relate differently. In the following section we illustrate these assertions through an analysis of empirical data.

Empirical contextualization

Table 1 (see Appendix) synthetizes the units of meaning identified by our semiotic square and relate them to illustrative references from our data. These references show how consumers interpret different objects as belonging to one category of waste or another. It must be noted that the same type of object can belong to different categories. As different types of objects are subject to different value

APPENDIX
Table 1 - Consumer emic interpretations of waste

Unit of meaning	Illustrative references
Garbage (valueless): objects perceived as having no value (as they fail to integrate with consumers pragmatic encounter with the world).	"Yes. I feel like… maybe I made some food on Monday, but first remember that on Friday. Then I smell it and think "It smells nice" and I heat it up anyway. Then the germs are gone, so I wouldn't think of throwing it out. But if I open it on, say, Tuesday and it smells bad, then I would never eat it" (Focus group 1, reference 1). "Yeah, also sport stuff like shoes, or in my case tennis rackets, which I use a lot. The material is broken, so I have to throw it away." (Focus group 2, reference 1)
Commodity (valuable): objects still perceived as fully or partly valuable, despite being discarded.	"Moderator: Does that apply to you too? You said a bag, a Gucci bag, it lasts for many years. Participant 5: Yes, you can try to sell it again. Participant 8: Yeah, there's a lot to gain with those Yeezys that Kanye West produces… Participant 7: Yeah, and then you really don't care if seven people have owned them before you. Participant 8: Yes, so there are many things that are exchanged and traded if they have some kind of value. But I think it's a lot about value." (Focus group 1, reference 2) "It can also be a matter of principle if you have paid 8-900 DKK for a pair of trousers or shoes and then you put it up for sale and there is someone saying; I think it's worth 60 DKK. Then I throw it out rather than give it to you - I think you're a fool." (Focus group 2, reference 2)
Recyclable items (non-valueless): objects with potential value, which cannot be accessed by consumers under present conditions.	"Participant 4: Well, broken clothes, I try to repair with the sewing machine. Or if it's too broken to be repaired, I sometimes keep that piece and try use with something else – like sometimes you just need a piece of cotton, or whatever. Or if I really don't like this T-shirt – or whatever it is – anymore, like… Once a year I go to my wardrobe and say 'OK that I haven't worn the whole year. It can go to second hand'. So, I never just throw things out right away. Sometimes I use that old T-shirt for cleaning my shoes or something." (Focus group 5, reference 1)
Inalienable possessions (non-valuable): objects whose value cannot be assessed (invaluable).	"With clothing, it is very different. If it's a sweater in a color that I don't use, it goes. But if it's an old favorite shirt, I can keep it, even if it's filled with holes and too small. Now, I threw out a jersey that was three years old and it was really ugly, but it was just a jersey - I don't know how - but it meant something to me. So, it took me a long time, though it should have been thrown out a year and a half ago" (Focus group 3, reference 1) "Participant 8: My mother is giving me such gifts for advent. Actually, they can only be used around Christmas and other times it is so ugly you don't want to have it standing - but you do not throw it out - it is from one's mother. Participant 7: No, exactly. Participant 8: And if one day she asks about it ... Participant 7: It's right here! Participant 8: The third mug... [*everyone laughs*] I don't use it! " (Focus group 6, reference 1)

regimes (i.e. arrangements of valuation) (Appadurai 1988) and our study focuses on consumers' general interpretation of waste, we cannot give an exhaustive explanation of the specific dynamics affecting the movement of objects within the units of the proposed framework. Nonetheless, our analysis reveals three general dynamics explaining this movement: 1) the material status of the discarded object; 2) its cultural biography (i.e. the network of meanings historically attributed to the object) (Kopytoff 1988); 3) its potentiality (the value that the discarded object may release whether associated with future practices). While existing research is familiar with the first two dynamics, it seldomly considers waste for its potentiality. In the next section, we invite future research to elaborate on the dynamics affecting consumers' categorization of their discards.

DISCUSSION AND CONCLUSION

Waste is a complex phenomenon, which has increasingly been the object of study in consumer research. This paper offers a framework that synthetizes consumers' multiple interpretations of their discards, relating the valueless and the valuable under the notion of waste. Our model specifies four predominant consumer interpretations of waste: garbage, commodity, recyclable items and inalienable possessions. This conceptualization offers a more nuanced explanation of consumer understanding of their discards, which in previous research are often dichotomized as either worthless trash or valuable objects. We show that relation between valueless and valuable discards is highly dynamic and more unstable than previous research intended it to be.

The strength of our model lies in the purported dynamism of waste. Indeed, the four connotations of waste identified by our semiotic square are not static categories. Their boundaries are porous and the same object may shift from one category to another depending on the specific interpretation (see Türe, 2014 for a similar argument). As seen in the case of food or clothes, consumers perceive these objects sometimes as garbage, and sometimes as items to be repurposed. We suggest that the object's materiality, biography and potentiality may explain differences in classification as more or less valuable waste. While previous studies have examined the material and biographical dimensions of discards, examinations of the potentiality of waste are virtually absent. Therefore, we invite future research to employ our model in order to specify how different types of objects moves around the units of meaning of the proposed framework.

For example, decision-making approaches could look at what factors impact consumers' identification of objects with the different units of meaning. Under which conditions do consumers categorize food as garbage? And when do they see it as having potential value? What motivates consumers to shift their interpretive category? How do lifestyles (Aschemann-Witzel et al. 2018), political ideology (Kidwell et al. 2013), or product perception (Trudel and Argo 2013) impact consumers' categorization of discard objects as garbage, commodity, etc.? These questions are of the utmost importance if we want to understand how to better include consumers' decisions in the design of sustainable market systems, such as those based on circulatory model of resource regeneration.

Furthermore, our model offers a starting point for exchange perspectives investigating the institutional dynamics organizing discard exchanges. In Germany, for example, the practice of recollecting edible food from dumpsters prompted a reconsideration of supermarkets food discards from valueless to valuable waste, and a consequent reorganization of market arrangements for collection and redistribution of supermarket food waste (Gollnhofer 2017a). In France, the practice of urban gleaning is characterized by a discursive negotiation between sustainability concerns and issues of public hygiene (Guillard and Roux 2014) which alternatively frame curbside discards as garbage or commodities. These examples suggest how future research can build on our model to understand which actors, practices and discourses affect the movement of objects from one waste category to another. Such knowledge can generate practical implications on how to change consumer waste perceptions and (detrimental) habits; as well as the market arrangements and social norms sustaining those. Therefore, our research represents an important step towards a better understanding of sustainable consumption systems that ideally do not know valueless waste.

REFERENCES

Antonides, Gerrit (2017), "Sustainable Consumer Behaviour: A Collection of Empirical Studies," Multidisciplinary Digital Publishing Institute.

Appadurai, Arjun (1988), *The Social Life of Things: Commodities in Cultural Perspective*: Cambridge University Press.

Aschemann-Witzel, J., I. E. de Hooge, V. L. Almli, and M. Oostindjer (2018), "Fine-Tuning the Fight against Food Waste," *Journal of Macromarketing*, 38 (2), 168-84.

Benton, Raymond, Jr. (2015), "Reduce, Reuse, Recycle . . . And Refuse," *Journal of Macromarketing*, 35 (1), 111-22.

Brosius, N., K. V. Fernandez, and H. Cherrier (2013), "Reacquiring Consumer Waste: Treasure in Our Trash?," *Journal of Public Policy and Marketing*, 32 (2), 286-301.

Cherrier, Hélène and Tresa Ponnor (2010), "A Study of Hoarding Behavior and Attachment to Material Possessions," *Qualitative Market Research: An International Journal*, 13 (1), 8-23.

Curasi, Carolyn Folkman, Linda L Price, and Eric J Arnould (2004), "How Individuals' Cherished Possessions Become Families' Inalienable Wealth," *Journal of Consumer Research*, 31 (3), 609-22.

de Coverly, Edd, Pierre McDonagh, Lisa O'Malley, and Maurice Patterson (2008), "Hidden Mountain the Social Avoidance of Waste," *Journal of Macromarketing*, 28 (3), 289-303.

Eden, Sally (2017), "Blurring the Boundaries: Prosumption, Circularity and Online Sustainable Consumption through Freecycle," *Journal of Consumer Culture*, 17 (2), 265-85.

Fernandez, K. V., A. J. Brittain, and S. D. Bennett (2011), ""Doing the Duck": Negotiating the Resistant-Consumer Identity," *European Journal of Marketing*, 45 (11), 1779-88.

Floch, Jean-Marie (1988), "The Contribution of Structural Semiotics to the Design of a Hypermarket," *International Journal of Research in Marketing*, 4 (3), 233-52.

Gabriel, Yiannis and Tim Lang (2008), "New Faces and New Masks of Today's Consumer," *Journal of Consumer Culture*, 8 (3), 321-40.

Giesler, Markus and Ela Veresiu (2014), "Creating the Responsible Consumer: Moralistic Governance Regimes and Consumer Subjectivity," *Journal of Consumer Research*, 41 (3), 840-57.

Gollnhofer, J. F. (2017a), "The Legitimation of a Sustainable Practice through Dialectical Adaptation in the Marketplace," *Journal of Public Policy and Marketing*, 36 (1), 156-68.

Gollnhofer, Johanna F. (2017b), "Normalising Alternative Practices: The Recovery, Distribution and Consumption of Food Waste," *Journal of Marketing Management*, 33 (7-8), 624-43.

Gollnhofer, Johanna F., Henri A. Weijo, and John W. Schouten (2019), "Consumer Movements and Value Regimes: Fighting Food Waste in Germany by Building Alternative Object Pathways," *Journal of Consumer Research*.

Green, R. T., R. Mandhachitara, and T. Smith (2001), "Macroeconomic Shock and Product Disposition in an Emerging Market," *Journal of Macromarketing*, 21 (1), 47-60.

Greimas, Algirdas Julien (1983), *Structural Semantics: An Attempt at a Method*: University of Nebraska Press.

Guillard, V. and D. Roux (2014), "Macromarketing Issues on the Sidewalk: How "Gleaners" and "Disposers" (Re)Create a Sustainable Economy," *Journal of Macromarketing*, 34 (3), 291-312.

Hirschman, Elizabeth C., Ayalla Ruvio, and Russell W. Belk (2012), "Exploring Space and Place in Marketing Research: Excavating the Garage," *Marketing Theory*, 12 (4), 369-89.

Kennedy, Greg (2012), *An Ontology of Trash: The Disposable and Its Problematic Nature*: Suny Press.

Kidwell, B., A. Farmer, and D. M. Hardesty (2013), "Getting Liberals and Conservatives to Go Green: Political Ideology and Congruent Appeals," *Journal of Consumer Research*, 40 (2), 350-67.

Kopytoff, Igor (1988), "The Cultural Biography of Things: Commoditization as Process," in *The Social Life of Things: Commodities in Cultural Perspective*, ed. Arjun Appadurai: Cambridge University Press, 70-73.

Lastovicka, J. L. and K. V. Fernandez (2005), "Three Paths to Disposition: The Movement of Meaningful Possessions to Strangers," *Journal of Consumer Research*, 31 (4), 813-23.

Mick, David Glen and Laura R Oswald (2006), "The Semiotic Paradigm on Meaning in the Marketplace," *Handbook of qualitative research methods in marketing*, 31, 45.

Mick, David Glen, Simone Pettigrew, Cornelia Connie Pechmann, and Julie L Ozanne (2012), *Transformative Consumer Research for Personal and Collective Well-Being*: Routledge.

Miller, Daniel (2008), "The Uses of Value," *Geoforum*, 39 (3), 1122-32.

Philip, H. E., L. K. Ozanne, and P. W. Ballantine (2015), "Examining Temporary Disposition and Acquisition in Peer-to-Peer Renting," *Journal of Marketing Management*, 31 (11-12), 1310-32.

Price, L. L., E. J. Arnould, and C. F. Curasi (2000), "Older Consumers' Disposition of Special Possessions," *Journal of Consumer Research*, 27 (2), 179-201.

Ritch, E. L. (2019), "'From a Mother to Another': Creative Experiences of Sharing Used Children's Clothing," *Journal of Marketing Management*, 35 (7-8), 770-94.

Roper, S. and C. Parker (2008), "The Rubbish of Marketing," *Journal of Marketing Management*, 24 (9-10), 881-92.

Roster, C. A. (2014), "The Art of Letting Go: Creating Dispossession Paths toward an Unextended Self," *Consumption Markets and Culture*, 17 (4), 321-45.

Roux, D., V. Guillard, and V. Blanchet (2018), "Of Counter Spaces of Provisioning: Reframing the Sidewalk as a Parasite Heterotopia," *Marketing Theory*, 18 (2), 218-33.

Trudel, R. and J. J. Argo (2013), "The Effect of Product Size and Form Distortion on Consumer Recycling Behavior," *Journal of Consumer Research*, 40 (4), 632-43.

Trudel, R., J. J. Argo, and M. D. Meng (2016), "The Recycled Self: Consumers' Disposal Decisions of Identity-Linked Products," *Journal of Consumer Research*, 43 (2), 246-64.

World Economic Forum (2009a). *Driving Sustainable Consumption: Consumer Engagement*. World Economic Forum, Geneva.

World Economic Forum (2009b). *Sustainability for Tomorrow's Consumer: The Business Case for Sustainability.* World Economic Forum, Geneva.

World Economic Forum (2010). *Redesigning Business Value: A Roadmap for Sustainable Consumption*. World Economic Forum, Geneva.

One-Armed Bandit? An Intersectional Analysis of
Kelly Knox and Disabled Bodies in Influencer Marketing

Jonatan Södergren, Stockholm Business School, Sweden
Niklas Vallström, Canterbury Christ Church University, UK

INTRODUCTION

Recently marketing scholars have called for more intersectional perspectives to be employed in the research field (e.g., Ginder and Byun, 2015; Hearn and Hein, 2015; Kearney, Brittain and Kipnis, 2019). As indicated by the different sociopolitical identities that were once excluded but are now increasingly represented on the cultural scene, more voices are allowed to be heard in current mediascapes (Tsai, 2010), yet multiple inequities seem to remain. For instance, Gopaldas and DeRoy (2015) highlight the acute lack of intersectional diversity on the cover of lifestyle magazines such as GQ, Cosmopolitan, and Vanity Fair. Meanwhile, 230 out of 240 intersections of sexuality, class, age, and race remain invisible in mainstream advertising (Nölke, 2018). The aim of this study is therefore to analyze the complexities of a particular disadvantaged identity position, namely that of physical disability—which according to Kearney et al. (2019) constitutes one of the largest minority groups—in the empirical context of influencer marketing, a field that has grown exponentially in popularity over the last few years (Lou and Yuan, 2019; Ahmad, 2018). As such, we take into consideration the rendezvous of intersectional diversity and influencer marketing discourse.

Why intersectional diversity? As noted by Gopaldas and DeRoy (2015), conventional notions of diversity stress the inclusion of e.g., ethnic minorities or people with disabilities. However, the emerging notion of intersectional diversity stresses the inclusion of not only different categories, but also various intersections of those categories (Collins, 2010). Thereby, rather than studying diversity from the vantage point of either ethnic minorities or people with disabilities, an intersectional approach would recognize the sociopolitical identity position of being an ethnic minority with disabilities. More specifically, Gopaldas and DeRoy (2015) argue that intersectional diversity is necessary "because conventional notions of diversity tend to inadvertently neglect intersections of multiple historically oppressed identities (p. 334)." They further note that such identities seldom are made visible in marketing and media imagery. At those occasions when these intersections momentarily are made visible, they are often represented in unfavorable ways. This was, for instance, the case when the Swedish Public Employment Service was criticized for cropping out the faces of disable-bodied people in a recent campaign, exchanging them with the faces of celebrities instead (Rågsjö-Thorell, 2019).

Why influencer marketing? Influencer marketing is a marketing strategy that uses the influence of key individuals or opinion leaders, often on social media, to drive consumers' brand awareness and/or their purchasing decisions (e.g., Brown and Hayes, 2008; Scott, 2015). More precisely, Lou and Yuan (2019, p. 59) define a social media influencer as:

> First and foremost a content generator: one who has a status of expertise in a specific area, who has cultivated a sizable number of captive followers—who are of marketing value to brands—by regularly producing valuable content via social media.

Gopaldas and DeRoy (2015, p. 359) call for future research on intersectionality to "go beyond lifestyle magazines and print media to investigate intersectional patterns of invisibility and travesty in other contexts such as social media." As noted by Lou and Yuan (2019), present-day social media and social networking sites such as YouTube, Instagram, and Snapchat have dramatically affected how young people receive information and news. Social media influencers, following Lou and Yuan (2019), could thus be seen as online personalities with large numbers of followers across one or more social media platforms, who also exert an influence on their followers. In contrast to celebrities and public figures, however, they point out that social media influencers are generally ordinary people who have become online celebrities by posting on social media. Because social media influencers often are perceived as trustworthy by their followers (Swant, 2016), brands and marketing practitioners have come to invest in selected influencers to create and/or promote their branded content to both the influencer's own followers and to the brand's target consumers (Weinberg, 2017). For instance, as noted by Talavera (2015), influencer-produced branded content is considered to have more organic, authentic, and direct contact with potential consumers than brand-generated advertisements.

On the one hand, we argue that increased visibility of disable-bodied intersections of identity in advertising imagery and influencer-produced content can contribute to cultural progress; on the other hand, disable-bodied influencers run the risk of being exploited by the hegemonic powers that seek to make a profit by their social identity, e.g., through face-ism, idealization, exoticization, or exclusion (see Schroeder and Borgerson, 2005), which puts issues of authenticity into question. Therefore, we formulate the following research question:

Q: How can brands produce content in collaboration with disable-bodied models and/or influencers without misrepresenting them?

The paper is organized as follows. We first review extant literature specifying the theoretical gap that we address. Then, we present the qualitative methods employed for critical visual analysis. This is followed by a discussion of the findings and contributions.

PERSPECTIVES ON DISABILITY IN CONSUMER RESEARCH

This year marks the thirtieth anniversary of the Americans with Disabilities Act, an additional decade has lapsed since consumer product advertisers first began to include portrayals of people with disabilities in their product advertising (e.g., Wong, 2020). Despite growing presence in the literature as manifested in a series of innovative articles by Stacey Baker and Carol Kaufman-Scarborough, however, consumer research on people with disabilities still seems to be in its infancy. In a landmark study, Baker (2006) shows how consumers with visual impairments participate in the marketplace to achieve consumer normalcy. More specifically, consumer normalcy "reflects how identity is constructed and maintained in part through shopping and is defined as a desire to live like other consumers, be accepted as other consumers are, and be acceptable to one's self in consumption contexts (p. 41)." She also notes that a crucial dimension of consumer normalcy is the desire to be perceived as equal in the marketplace, which is consistent with a basic need for all people to feel like they belong (Goffman, 1963). In a similar vein, Childers and Kaufman-Scarborough (2009) studied the enabling opportunities offered by the Internet for disabled consumers who are shopping online, whereas Baker and colleagues (2007) studied cues that dis-

able-bodied consumers use to make judgements as to whether they belong or feel welcome when shopping. Their findings reveal that it is critical for service personnel to consider them as consumers first, and as possessing a disability only under those conditions where the interaction of a servicescape element and the disability warrant special attention, as it otherwise might lead to feelings of discrimination. This argument is further developed by Kaufman-Scarborough (2015) who suggests that biases based on e.g., disability, gender, ethnicity, etc. can erect barriers to consumer participation and form a foundation for marketplace exclusion; as a result, some consumers are regularly excluded from the marketplaces they seek to experience. While disability studies has examined issues such as access to commercial venues, improvements in public transportation, and public attitudes toward the disabled (e.g., Kaufman-Scarborough and Baker, 2006; Saatcioglu and Ozanne, 2013), the focus of this study is on media portrayals and inclusion of disabled people in advertising. An estimated 13.9 million disabled people are currently living in the UK with a spending capacity worth around £249 billion per year, meaning that disabled people now make up 22% of the UK population (UK Government, 2018). Yet, to the best of our knowledge, no research has studied disable-bodied representation in a marketplace context. In effect, researchers have institutionalized an ableist approach to consumer behavior (Campbell, 2008) with the underlying assumption that disability is viewed in overtly negative light (Kaufman-Scarborough, 2015; Garland-Thomson, 2004).

METHOD

We choose to focus our qualitatively oriented analysis on Kelly Knox, a British fashion model and social media influencer born without a left forearm but, from the age of seven, refused to wear a prosthetic arm and since then has never used a prosthesis. In 2008, she was the winner of the BBC Three Reality TV show, *Britain's Missing Top Model*. Since then she has collaborated with brands such as Primark, Samsung and Dove. In another career highlight, she was cast alongside Jack Eyers whose leg was amputated when he was sixteen, for the British design duo Teatum Jones in their politically charged opening show of London Fashion Week, which offered an original soundtrack that e.g., included an extract from Meryl Streep's speech at the Golden Globes where she denounced President Trump for his alleged mocking of a disabled journalist (Finnigan, 2017).

The data set primarily consists of 295 archive images from the *itskellyknox* Instagram profile. We also take into consideration the criticized *Gör plats!* campaign by the Swedish Public Employment Service as well as *Rust and Bone*, a 2012 French-Belgian romantic drama starring Marion Cotillard as a woman who trains killer whales in a marine park, suffers a horrible accident, and loses both her legs above the knee. The underlying motivations for this seemingly diverse selection of material is that we wanted to be able to analyze and compare different modes of disable-bodied representations and narratives. In total, we ended up with 323 pieces of visual material.

With the aim of deconstructing misrepresentational mythologies (e.g., by unpacking some of the complexities of how body normalcy conceptions are constructed in advertising imagery), a critical visual analysis was conducted (Schroeder, 2006; see also Molander, Kleppe and Östberg, 2019). Employing this method, Schroeder (2006) argues that "researchers gain a more thorough (yet never complete) understanding of how images embody and express cultural values and contradictions" (p. 303) and that "[t]he relationship between description and interpretation is intricate, but, ideally, interpretations emerge from descriptive details" (p. 304). Within the realm of this study, the analysis focused on (i) *thematic analysis*, i.e., describing emergent themes in the visual material; (ii) *aesthetic analysis*, i.e.,

focusing on how form signifies dominance; and finally (iii) *affective analysis*, i.e., reflecting on emotions that were evoked during the analytical process. Additionally, the analysis was guided by the four representational tensions identified by Schroeder and Borgerson (2005). First, *face-ism* describes how the media systematically depicts the dominant group with more prominent faces and how disadvantaged intersections are negatively affected by this representational convention. Second, *idealization* concerns how marketing communications routinely depict ideal types, such as unrealistic scenarios or unattainable goals, and the negative effects these often have. Third, *exoticization* refers to the process of making 'Othered' intersections of identity seem exotic and/or fetishized in ways that call attention to the specific identity characteristics. Finally, *exclusion* indicates how certain sociopolitical identities traditionally have been left out of the pantheon of marketing communication altogether. By employing these techniques, we also take into consideration methodological issues such as (i) what social media means for visual consumption; (ii) how social media images circulate in consumer culture and relate to brand meaning; and (iii) what are the social and ethical implications of relying on such imagery in marketing communication?

DISCUSSION

Due to the word limit, our findings are briefly presented around three key themes. First, we make a case of Kelly Knox and her social media presence to develop the concept of epistemic disclosure. Second, we draw on the criticized *Gör plats!* campaign by the Swedish Public Employment Service to illustrate how incorporation inadvertently could serve as a source of marketplace exclusion. Finally, the film *Rust and Bone* is taken into consideration to frame authenticity in regard to portrayal of disable-bodiness as recognizing the complex personhood of the subject.

In elaborating the relation between identity and representation, Schroeder and Borgerson (2005, p. 583) define epistemic closure as "an ethical concept calling attention to the danger of typified representations of identity that increases the probability of human subjects interpreting what they experience or have represented to them as (stereo) typical." However, present findings based on Kelly Knox and her social media presence suggest that influencer-produced content, in fact, could disseminate what we refer to as epistemic disclosure, i.e., representations that de-naturalize damaging images and stereotypes about sociopolitical identity. For instance, addressing some of the questions she is most frequently asked in an Instagram post (see figure 1), she attracted dozens of supportive comments in line with "*I look forward to your posts everyday at the moment, feel like I'm always learning something new when I read them*" and "*Society can always use a wake up call every now and again and if we all looked the same life would be pretty boring. I think you are stunning.*" Others praised her for helping to change society's perception of beauty.

Meanwhile, despite their best intentions to create awareness and job opportunities for people with disabilities, the Swedish Public Employment Service's campaign inadvertently ended up neglecting this historically oppressed group. For instance, in one of the criticized advertisements, they cropped out the face of Natalie Chanise Eriksson, an influencer who suffers from cerebral palsy, exchanging it with the face of Therese Lindgren, a non-disabled celebrity influencer instead (Rågsjö-Thorell, 2019). In the advertising image, they clumsily raise the question, "Would she have become a powerful influencer?" However, the discrimination did not end here; they also changed Erikson's dark skin to match Lindgren's whiter hue, which from an intersectionality perspective indicates a double exclusion.

Finally, Gordon (2008) begins her book on social exclusion and invisibility by stating that life is complicated. Yet in regard to ad-

itskellyknox My strong East End roots go back generations. My Soul goes back millions of light-years across thousands of dimensions, galaxies, planets + existences. ✨👽🐆🤍✨
People may ask "how do you manage with one hand?", "What is it like missing a forearm?" Etc etc
Firstly, I am not "missing" anything.
I am a whole and complete person.
Do not define my existence by my body.
I am more than a body.
In previous liftimes, in a galaxy far away - I didn't even have a body.
My body is not who I am.
See my Soul.
I have memories of being pure light, connected directly to Source.
This is why I never felt "disabled"
From ever since I was a little girl, I innately knew my soul holds all the power, magic, beauty, wisdom and force.
🎬 @jakub_koz
@milkmodelmanagement .

Figure 1. Example of epistemic disclosure from Kelly Knox's Instagram feed.

vertising and media portrayal of people with disabilities, questions remain as to whose life is recognized as complex. For Gordon (2008, p. 5) complex personhood is about many things, including "conferring the respect on others that comes from presuming that life and people's lives are simultaneously straightforward and full of enormously subtle meaning." In that sense, we propose that branding and marketing practitioners who want to produce content by collaborating with disable-bodied models and/or influencers can learn from Marion Cotillard's graceful performance in *Rust and Bone* where the dynamics and consciousness of her disability is portrayed as more dense and delicate than often is implied.

CONCLUSIONS

Inclusion of people with disabilities in brand-generated advertising and influencer-produced content can contribute to social change, e.g., through epistemic disclosure as we argue is the case with Kelly Knox. However, as noted by Kearney et al. (2019, p. 562), "not all means of representation are viable means of inclusion [as it] in some instances, can result in opposite (even if unintended) outcomes." This was the case when the Swedish Public Employment Service was criticized for cropping out the faces of disable-bodied people in a recent campaign, exchanging them with the faces of ce-

lebrities instead. Counterintuitively, it would thus seem that incorporation could serve as a source of marketplace exclusion. Finally, we conclude that branding and marketing practitioners who want to produce authentic content by collaborating with disable-bodied models and/or influencers also need to recognize their complex personhood, e.g., through accurate and realistic representations that acknowledge the variability of their experiences.

REFERENCES

Ahmad, Irfan (2018), "The Influencer Marketing Revolution," Social Media Today, February 16, https://www.socialmediatoday.com/news/the-influencer-marketing-revolutioninfographic/517146/.

Askegaard, Søren and Jeppe T. Linnet (2011), "Towards an epistemology of consumer culture theory: Phenomenology and the context of context," *Marketing Theory*, 11(4), 381-404.

Baker, Stacey M. (2006), "Consumer normalcy: Understanding the value of shopping through narratives of consumers with visual impairments," *Journal of Retailing*, 82(1), 37-50.

Table of contributions

Unit of analysis	Contribution
@itskellyknox on Instagram	*Epistemic disclosure*
The Swedish Public Employment Service's campaign "Gör plats!"	*Incorporation as a source of marketplace exclusion*
Rust and Bone (i.e., a 2012 French-Belgian romantic drama starring Marion Cotillard)	*Recognition of complex personhood*

Baker, Stacey M., Jonna Holland, and Carol Kaufman-Scarborough (2007), "How consumers with disabilities perceive 'welcome' in retail servicescapes: A critical incident study," *Journal of Services Marketing*, 21(3), 160-173.

Beverland, Michael (2009), *Building Brand Authenticity: 7 Habits of Iconic Brands*. New York: Palgrave Macmillan.

Brown, Duncan and Nick Hayes (2008), *Influencer Marketing: Who Really Influences Your Customers?*, New York: Taylor & Francis.

Campbell, Fiona (2008), "Exploring internalized ableism using critical race theory," *Disability & Society*, 23 (2): 151–162.

Childers, Terry L. and Carol Kaufman-Scarborough (2009), "Expanding opportunities for online shoppers with disabilities," *Journal of Business Research*, 62(5): 572–578.

Collins, Patricia H. (2010), "The New Politics of Community," *American Sociological Review,* 75(1): 7–30.

Garland-Thomson, Rosemarie (2004) "Seeing the disabled," in *The New Disability History: American Perspectives*, eds. Paul K. Longmore and Lauri Umansky, New York: New York University Press, 335–374.

Ginder, Whitney and Sang-Eun Byun (2015), "Past, present, and future of gay and lesbian consumer research: Critical review of the quest for the queer dollar," *Psychology & Marketing*, 32(8), 821- 84.

Goffman, Erving (1963), *Behavior in Public Place*. New York: Glencoe The Free Press.

Gordon, Avery (2008), *Ghostly Matters: Haunting and the Sociological Imagination*. Minneapolis: University of Minnesota Press.

Gopaldas, Ahir and Glenna DeRoy (2015), "An intersectional approach to diversity research," *Consumption Markets & Culture*, 18(4): 333–364.

Finnigan, Kate (2017). "Teatum Jones cast disabled models in the opening show of London Fashion Week," The Telegraph, February 17, https://www.telegraph.co.uk/fashion/london-fashion-week/teatum-jones-cast-disabled-models-opening-show-london-fashion/.

Hearn, Jeff and Wendy Hein (2015), "Reframing gender and feminist knowledge construction in marketing and consumer research: missing feminisms and the case of men and masculinities," *Journal of Marketing Management*, 31(15-16), 1626-1651.

Holt, Douglas (2004), *How Brands Become Icons: The Principles of Cultural Branding*, Cambridge, MA: Harvard Business School Press.

Kaufman-Scarborough, Carol (2015). "Social Exclusion: A Perspective on Consumers with Disabilities," in *Consumer Vulnerability: Conditions, Contexts and Characteristic*, eds. Kathy Hamilton, Susan Dunnett and Maria Piacentini, Abingdon: Routledge, 157-169.

Kaufman-Scarborough, Carol and Stacey M. Baker (2005), "Do people with disabilities believe the ADA has served their consumer interests?," *Journal of Consumer Affairs*, 39(1): 1–26.

Kearney, Shauna, Ian Brittain, and Eva Kipnis (2019). "'Superdisabilities' vs 'disabilities'? Theorizing the role of ableism in (mis) representational mythology of disability in the marketplace," *Consumption Markets & Culture*, 22(5-6), 545-567.

Lou, Chen and Shupei Yuan (2019), "Influencer marketing: How message value and credibility affect consumer trust of branded content on social media," *Journal of Interactive Advertising*, 19(1), 58-73.

Molander, Susanna, Ingeborg Astrid Kleppe, and Jacob Östberg (2019), "Hero shots: involved fathers conquering new discursive territory in consumer culture," *Consumption Markets & Culture*, 22(4), 430-453.

Nölke, Ana-Isabel (2018). Making diversity conform? An intersectional, longitudinal analysis of LGBTspecific mainstream media advertisements, *Journal of Homosexuality*, 65(2), 224-255.

Rågsjö-Thorell, Andreas (2019), "Efter kritiken mot 'Gör plats' – influencern får skadestånd av Arbetsförmedlingen," Resumé, November 1, https://www.resume.se/marknadsforing/kampanj/efter-kritiken-mot-gor-plats-influencern-far-skadestand-av-arbetsformedlingen/.

Saatcioglu, Bige and Julie L. Ozanne (2013), "A critical spatial approach to marketplace exclusion and inclusion," *Journal of Public Policy & Marketing*, 32(1), 32–37.

Schroeder, Jonathan (2006), "Critical Visual Analysis," in *Handbook of Qualitative Methods in Marketing*, ed. Russell W. Belk, Aldershot: Edward Elgar, 303-321.

Schroeder, Jonathan and Janet Borgerson (2005), "An ethics of representation for international marketing communication," *International Marketing Review*, 22(5): 578–600.

Scott, David M. (2015), *The New Rules of Marketing and PR: How to Use Social Media, Online Video, Mobile Applications, Blogs, News Releases, and Viral Marketing to Reach Buyers Directly*, Hoboken, NJ: John Wiley.

Swant, Marty (2016), "Twitter Says Users Now Trust Influencers Nearly As Much As Their Friends," Adweek, May 10, https://www.adweek.com/digital/twitter-says-users-now-trust-influencers-nearly-much-their-friends-171367/.

Talavera, Misha (2015), "10 Reasons Why Influencer Marketing Is the Next Big Thing," Adweek, July 14, http://www.adweek.com/digital/10-reasons-why-influencer-marketing-is-the-next-bigthing/.

Tsai, Wan-Hsiu S. (2010), "Assimilating the queers: Representations of lesbians, gay men, bisexual, and transgender people in mainstream advertising," *Advertising & Society Review*, 11(1).

UK Government (2018), "Family Resources Survey 2016/17," https://assets.publishing.service.gov.uk/government/uploads/system/uploads/attachment_data/file/692771/family-resources-survey-2016-17.pdf.

Weinberg, Jesse (2017), "What Is Influencer Marketing?," Huffington Post, July 6, http://www.huffingtonpost.com/global-yodel/what-is-influcner-marketing_b_10778128.html.

Wong, Alice (2020), Disability Visibility: First-Person Stories from the Twenty-First Century, New York: Penguin Random House.

The Identity Construction Of The Inbetweener, Through
Food Consumption: "You Are What You Eat"

Amandeep Takhar, De Montfort University, Leicester, UK
Hatice Kizgin, University of Bradford, UK
Thomas Magede, De Montfort University, UK

INTRODUCTION

With increasing migration, there is a need to explore how immigrants construct identity. This study analyses how two ethnic communities, in the U.K construct identity, in relation to food consumption practices. Findings suggest that food is an acculturative and reacculturative agent, to adapt to social situations, which reflects their identity.

"During the last five decades, considerable waves of human migration have changed the sociocultural fabric of many Western societies. The influx of migrants has not only brought about countless new forms of constructive collaboration and creolization among immigrants and indigenes but also contributed to considerable discrimination, exploitation, and ethnic group conflict" (Luedicke, 2015, p.109)

Within today's global consumer culture, consumer researchers have become increasingly aware of the significance of the relationship between consumption and the consequential identity politics (Calhoun, 1994). Scholars (Phinney, 1996; Breakwell, 2014) have increasingly focused on how individuals from ethnic minorities consistently struggle with what they have described as the "riddles of recognition" (Pieterse, 2008), in answer to the question of self-identity (Okamura, 2010; Stayman and Deshpande, 1989). Appiah (2018) recently highlighted that people have multiple identities that are relationally constructed and contradictory. Moreover "our sense of self is shaped by countless affiliations, such as nationality, culture, class, races and religion" (Appiah, 2018, p.41), however contradictions exist within collective identities. Arnould and Thompson (2005) suggested that there was a need for more contextual research, and whilst scholars have attempted to address this gap over the years (Ustuner and Holt, 2007; Luedicke, 2015). This research study addresses this call by investigating two specific ethnic communities within the U.K. This study investigates the identity construction processes and the experiences of young Indians and Zimbabweans as they engage in food consumption practices. The population under study is defined as the "inbetweeners"; young Indians and young Zimbabweans who have spent part of their early childhood in their country of origin India or Zimbabwe and the latter part of their childhood or teenage years in the U.K.

Consumer Acculturation Theories and Identity

Consumer researchers have previously suggested that ethnic minorities who have migrated may construct their identities around consumer acculturation levels and may adopt acculturative identity positions (Askegaard et al., 2005; Holt, 2007; Oswald, 1999; Peñaloza, 1994) that are static. Research has extensively highlighted, that the acculturation process is not only between host and heritage cultures, but ethnic minorities interact and learn from other ethnic minority communities (Askegaard et al., 2005). Berry et al. (1989) and Peñaloza (1994) have widely contributed to acculturation research. However, despite highlighting the potential for navigating in-between two cultures, literature exploring the acculturation attitudes/behaviors linking to consumption choices remains limited (Kizgin, Jamal and Richard, 2018). Dey et al., (2019) recently proposed that

"consumer interactions in multicultural environments demands that the scholarly debate on acculturation strategies be revisited" (p.773). Previous studies suggest that consumers navigate between the host and home country cultures (Oswald, 1999; Peñaloza, 1994). However, more recently it has been proposed that consumers are likely to be influenced by other "ethnic minority cultures, global consumer culture and more multinational cultures" (Dey et al., 2019, p.773). Hall (2014) argued that identities are not static, rather a process "always constituted within and outside, representation" (Hall, 2014, p. 35). Research supports the notion of bi-directional acculturation strategies, largely based on the extent that ethnic consumers can retain elements of their ancestral culture and adopt the host country's culture simultaneously (Dey et al., 2017; Kizgin et al., 2018). Ustuner and Holt (2007) did of course engage in an acculturation study, described as "post-modern consumer acculturation" (p.41). While prior consumer acculturation research has contributed to theory, it is important to recognise that consumer acculturation is not only a process of consumers "adjusting their consumer identities and practices to unfamiliar sociocultural environments" (Luedicke, 2015, p.111). Nonetheless, the literature generally remains silent in explaining how identity construction or "identity projects" (Ustuner and Holt, 2007) are a never-ending fluid construct.

Consumer Reacculturation

In fact, with the increasing levels of migration and the diminishing borders, consumer researchers have investigated the notion of reacculturation (Takhar, 2011; Takhar, 2012a; Wamwara-Mbgua, 2006), whereby ethnic immigrants focus on adopting the customs and traditions of their heritage culture, through consumption and ritualistic behavior, within an environment that is not their ancestral homeland. Moreover, the notion of reterritorialization (Askegaard et al., 2005; Ustuner and Holt, 2007), whereby immigrants "recraft a sense of community and cultural identity in new socio-geographic contexts" (Punathambekar, 2005, p.152) has also been acknowledged. However, explaining consumer "reacculturation" and its impact on identity construction processes and behaviours remains an understudied area. Takhar and Chitakunye (2012a) investigated mealtime rituals and food consumption practices amongst 3rd generation Sikhs. They suggested that consumers consistently negotiate their identities based on their levels of acculturation and reacculturation, through their food consumption practices (Ahmad, 1998). Recently, Rauf and Prasad (2017) suggested that food consumption can be a "social bridging activity" (p.833) whereby the sharing of food can solve what they describe as "cardinal social problems" (p.834). We address this shortcoming and investigate how the food consumption practices of Indian and Zimbabwean individuals ("inbetweeners") impact their ongoing identity construction processes and use the experiential, symbolic, ideological and socio-cultural elements of food consumption. In doing so, this study assesses how these factors impact identity structure.

Methodology

We engaged in two comparative studies, looking at two ethnic communities in the U.K. We adopted an interpretive research strategy and used a multiple methods approach. Study 1 focused on re-

cruiting Indian informants between 18-30, and they were encouraged to generate their own visual diaries (n=23), which in total produced over 300 photographs. The visual diaries involved informants taking pictures of their food consumption practices and they were then asked to make some comments on these diaries. Due to time limitations, eleven informants participated in online in-depth interviews, whereas twelve engaged in face to face in-depth interviews. Where we received permission, we conducted family observations of mealtimes i.e. in the family home or a restaurant. Consistent with prior research, we adopted multiple methods (Denzin (1997; Takhar and Chitakunye, 2012b) to determine multiple voices. The small sample size enabled a more focused attention related to food and consumption rituals on a day to day basis and develop a richer understanding of the meanings surrounding the consumption of food at mealtimes.

Study 2 adopted multiple methods (Morse, 2009), and recruited a sample of Zimbabwean informants. Two types of qualitative data were collected for two reasons. Firstly, to understand the experiences of the individual inbetweeners. Secondly, to understand how the marketplace for Southern African food products and environments could be used by the inbetweeners to negotiate and construct their identity. Snowball sampling was adopted and a sample of 16 inbetweeners aged between 23-30 was recruited. The procedure of snowball sampling was selected as Zimbabweans are a small population within the U.K. and difficult to reach (Bloch, 2007). Semi-structured interviews were conducted at different venues across the U.K.

Within both studies we focused on adopting an iterative and incremental process in the analysis of the different data sets (Cresswell, 2012). We focused on moving back and forth between the data of both studies to identify potential emergent themes. We also moved between the theory and the multiple emerging data sets, to be able to obtain a deeper meaning with regards to how food consumption practices impact the identity construction of these young "inbetweeners".

Findings

The data demonstrates that the experiential, symbolic, sociocultural and ideological aspects of food consumption significantly impact the ethnic identity construction processes of the inbetweeners for both groups. The findings indicate that participants did not simply consume food to fulfil a primitive (physiological) need, but moreover they were consuming the associated meanings, ideologies, symbols and experiential aspects of the food itself. We found that these "inbetweeners" used food consumption in three key ways with regards to identity construction: 1) food as a representation of roots and ancestral identity, (2), food consumption as a tool of identity negotiation and (3) food as a representation of the (inbetweener) identity. The interview data is illustrated in Table 1.

Food as a representation of roots and ancestral identity

The experiential consumption of food that represented their ethnic roots, was clearly an experience, highly associated with emotions. It encouraged informants to reflect on their own identities and in turn impacted identity construction. Interestingly, the "home" was a place where the Indian and Zimbabwean "inbetweeners" consumed ethnic food the most. This finding clearly resonates with that of Ustuner and Holt (2007), as they described how individuals recreated village life in the city. These young inbetweeners are clearly reminiscent of ethnic food consumption as a way of identifying with their ethnic roots. Yet at the same time they referred to food consumption within the workplace as "Western foods", conveying a preference for their ethnic food at home, because this is where they were able to recreate aspects of their ethnic roots. Informants from both the Indian and Zimbabwean community attach cultural, communal and multi-

sensory meaning to food consumption. Informants described the different meanings that they took from food consumption as being part of their identity. It was evident that participants-controlled food consumption experiences, because of the ideologies they had associated to that particular food. Informants described specific interpretations that they had of food and the messages that were transmitted through the consumption of it i.e. if they were consuming ethnic Indian or Zimbabwean food, it was interpreted as being better for their health, as they had been told this by previous generations. Informants' preference for ethnic food relates to the conviction that they were not "white" like their U.K. peers. It was apparent that the "inbetweeners" were in fact "inbetweeners", as they were trying to deal with a whole host of issues relating to identity. They were influenced by the older generations and their teachings, their peers and the beliefs that were formed by their experiences of their homeland and their host culture.

Food consumption as an identity negotiation tool

The "inbetweeners" clearly engaged in a process of identity negotiation as they reflected on the food that they consume or should consume. It was apparent that between the experiences of home, where ethnic food was predominantly consumed, there was a process of identity negotiation. Where young informants were highly aware of the importance of consuming food and creating food rituals that helped them to conform with their peers. This perhaps could be described as "felt food ethnicity" (Stayman and Deshpande, (1983). Where they developed a taste for Western food, yet they held the ingrained belief that their ancestral food was better for their health, as affirmed by older generations. Nonetheless, they wanted to be seen to be adapting to their peers and their environment. Therefore, informants described this process of trying to balance how and what they consumed. For example, they knew it was acceptable to eat ethnic food at home or in a specific restaurant, but they were also aware that within the work environment they would take a "sandwich or pasta salad". In fact, Christmas was a key season where informants referred to eating turkey and following the norms of Christmas, as anything else would be considered out of the ordinary. On the other hand, one informant was very aware that she had to pack a specific "westernised" packed lunch for her young daughter, though she was told by her mother-in-law that she should not be eating too much English food. In this way it can be seen that the "shape of one identity can be contoured by another" (Appiah, 2018, p.41).

Food as a representation of "the inbetweener" identity

These young informants who had migrated to the U.K. demonstrated a preference for food that represented their "inbetweener" identity. In fact, informants conveyed a preference for what we have described as hybrid "inbetweener" foods. Where they described their ethnic food as being highly flavoursome, they described the English food as being highly bland and having to adapt foods i.e. adding lots of chilli to sandwiches or pasta. Both the Zimbabweans and Indians conveyed a preference for Nando's food, as it was seen as a hybrid representation of their identity i.e. it was what they described as "food with a kick". They therefore felt it represents a mix of English and ethnic (Indian or Zimbabwean) because it was spicy. Food consumption was a "social bridging" tool for these young "inbetweeners". In fact, it was evident that in a way these young "inbetweeners" had created a sub-cultural "inbetweener" community of their own, around food consumption, as they were able to relate more effectively to this group of people as they consumed food, whilst simultaneously addressing "cardinal social problems" (Prasad, 2017) that they were experiencing.

Table 1: Interview Data

	Food As a Representation of Roots and Ancestral Identity
You are what you eat (Study 1)	"when I eat Indian food, I don't know why but I feel more Indian and content and I know it makes my grandmother and mum happy because she thinks I'm being more Indian and its weird I somehow feel proud of myself eating Indian food"
You are what you eat (Study 2)	''I am Zimbabwean … out of … 7 days, 5 days we eat sadza in the house. So, you know I am Zimbabwean. And definitely, sadza defines me …. Because in Zimbabwe you eat sadza all the time and we barely ate rice and that's the same thing we are still doing here''.
Constructing and interpreting identity (Study 1)	"this sounds funny, but I look at the Indian culture and the food is so tantalising and tasty and vibrant and its kind of like the culture isn't it? But with English food like fish and chips, its like okay yeah it tastes okay once a week with friends, but not everyday, it gets bland and maybe that's how I see the culture"
Constructing and interpreting identity (Study 2)	''Zimbabwean food is still in my house, but I have to mix with other foods. You see experience and exposure in school and when I am with my friends is good because you do not want to miss out on their good food. Mixing my Zimbabwean food with other foods is ok with me''
	Food As An Identity Negotiation Tool
Food Consumption an adaptation agent Study 1	"I know which food that I eat where and somedays I get fed up of eating cheese sandwiches for lunch, but I know I can't take roti (chappati) cause it doesn't seem normal to me. "
Food consumption as an adaptation agent Study 2	"I am a typical Zimbabwean and U.K person. I am aware I do consume Zimbabwean food, but I am also aware in some situations I cannot be eating Zimbabwean food; I have to adapt and eat UK food and other foods. I used to have just the Zimbabwean culture. That's just the way I used to see things. But coming here you have UK culture, you have got the Asian culture, you have got other different cultures from Africa as well that I have sort of integrated with... Yah, so definitely I have integrated with the UK culture and food"
Situational Food Ethnicity Study 1	"growing up here we have routines, at school we had packed lunch sandwich or school dinner like mash, sausages. But on Saturdays and Sundays we always knew it was parotay, not rice krispies"
Situational Food Ethnicity Study 2	''although most of the times I have Zimbabwean food there are times I'm craving UK food, then I don't know if it's really UK food because it's sort of that food which is just pasta, spicy food and chicken curries''
	Food As a Representation of "The Inbetweener" Identity
Transformation of food to reflect the inbetweener Study 1	"when you add mirch (chilli) and masala (spice blend) to food, it always tastes better. When we make pasta that's what we do, we add it too the food, even my grandmother will eat it then lol"
Transformation of food to reflect the inbetweener Study 2	''British food was very tasteless. When I got here and even up to now, I have to put a lot of spices for me to enjoy their bland and tasteless food''
Collectively consuming the inbetweener identity Study 1	"for me food is very social, it's about eating with people who have my food tastes and that I can understand. So, most of my friends are Asian and we like Nando's, cause it tastes a bit Indian but I like chips too and the have that spicy taste"
Collectively consuming the inbetweener identity Study 2	''I have friends that come from different places. Jamaicans like their Jamaican food quite a lot. Obviously, they like that and they have introduced me to their food while visiting their house when they have cooked some food. I will try that and say, "oh that's nice". I also have friends from Ghana and Nigeria …. They are like "oh I am cooking Jolof rice today would you like some?" and I will be like "yes I would like some". They will bring me a tub at home and we share''

Conclusion

This research study contributes to existing consumer research, by investigating and comparing two very unique immigrant communities in the U.K. This study also looks specifically at the role of food consumption and the associated practices and how this encourages these "inbetweeners" to reflect on their identity and behaviors, as they engage in food consumption. It is evident that food is used as a catalyst to socially identify with aspects of their identity, at any given point in time. It is the food consumption rituals, that help them to feel comfortable with their roots, but at the same time gives them a sense of comfort in conforming to their peers.

It is evident from the findings that food consumption plays a pivotal role in trying to build relationships and maintain social systems. Food is an acculturative (Penaloza, 1994; Luedicke, 2015) and reacculturative (Wamwara-Mbgua, 2006; Takhar, 2012a) agent that enabled these young "inbetweeners" to socially adapt and adjust to their peers in various social situations, as they attempted to understand their own identity projects (Ustuner and Holt, 2007). In fact, it is interesting from the third finding that they clearly tried to adapt Western foods, with their own ethnic spices and created "inbetweener" foods that were symbolic of themselves and their own tastes as "inbetweeners". It seems that they adapted and created their own foods, contributing to a "fusion" of different cultures, while attributes of these cultures contribute to their identity, thus resulting in the fluid "inbetweener" identity.

Food is also seen as a way of socially categorising themselves and used as a means to try to break down social barriers. It was evident that the creation of the socially representative "inbetweener" dishes that are described or the preference for food like Nandos, is symbolic of the identity that they hold at any one time. They are neither wholly, Indian nor Zimbabwean, nor British, nor do they belong to a specific sub-culture at any one time. However, it is evident that food helps them to own elements of all these cultures at any one time, yet they mix and match the proportions on their own terms at any given point in time.

As immigration increases this is an opportunity for businesses and marketers to take note of the growth of this group of 'inbetweeners'. The adaptations of foods by the inbetweeners to create foods that represent their identity, is an important finding that can assist marketers to understand the need for adapting their foods to meet the demands from this group. There is opportunity for businesses to improve their offerings for this increasing segment of consumers that have experienced the 'best of both' countries. Businesses adapting their products to reflect these changes among their ethnic consumers are poised to experience positive perceptions from these communities.

REFERENCES

Appiah, Kwame A. (2018). The lies that bind: Rethinking identity. Profile Books; London

Arnould, Eric J., and Craig J. Thompson (2005), "Consumer culture theory (CCT): Twenty years of research," *Journal of Consumer Research*, 31 (4), 868-882.

Askegaard, Søren, Eric J. Arnould, and Dannie Kjeldgaard (2005), "Postassimilationist Ethnic Consumer Research: Qualifications and Extensions," *Journal of Consumer Research*, 32 (1), 160-170.

Berry, John W., Uichol Kim, Steven Power, Marta Young, and Merridee Bujaki (1989), "Acculturation attitudes in plural societies," *Applied psychology*, 38 (2), 185-206.

Bloch, Alice (2007), "Methodological challenges for national and multi-sited comparative survey research," *Journal of Refugee Studies*, 20 (2), 230-247.

Breakwell, Glynis M. (2014). Identity and social representations. In R. Jaspal, & G.M. Breakwell (Eds.), Identity Process Theory (pp.118-134). Cambridge, U.K.: Cambridge Press.

Calhoun, Craig (1994). Social Identity Theory and The Politics of Identity, John Wiley and Sons; U.S.A.

Cresswell, John W. (2012). Qualitative Inquiry and Research Design: Choosing Among Five Approaches, Sage Publications; London.

Denzin, Norman K. (1997). Interpretive Ethnography: Ethnographic Practices for the 21st Century, Sage Publications; U.S.A

Dey, Bidit Lal, John MT Balmer, Ameet Pandit, Mike Saren, and Ben Binsardi (2017), "A quadripartite approach to analysing young British South Asian adults' dual cultural identity," *Journal of Marketing Management*, 33 (9-10), 789-816.

Dey, Bidit Lal, Sharifah Alwi, Fred Yamoah, Stephanie Agyepongmaa Agyepong, Hatice Kizgin, and Meera Sarma (2019), "Towards a Framework for Understanding Ethnic Consumers' Acculturation Strategies to Multicultural and Cosmopolitan London: A Food Consumption Perspective," *International Marketing Review*, 36 (5), 771-804.

Holt, Douglas B. (2007), "How Brands Become Icons—The Principles of Cultural Branding," Journal of Direct, Data and Digital Marketing Practice, 8, 281-285.

Hall, Stuart (2014) Cultural identity and diaspora. In *Diaspora and visual culture* (pp. 35-47). Routledge.

Jamal, Ahmad (1998), "Food Consumption among Ethnic Minorities: the case of British Pakistanis in Bradford, UK," *British Food Journal*, 100, 221-227.

Kizgin, Hatice, Ahmad Jamal, and Marie-Odile Richard (2018), "Consumption of products from heritage and host cultures: The role of acculturation attitudes and behaviors," *Journal of Business Research*, 82, 320-329.

Kjeldgaard, Dannie, and Søren Askegaard (2006), "The glocalization of youth culture: The global youth segment as structures of common difference," *Journal of Consumer Research*, 33 (2), 231-247.

Luedicke, Marius K. (2015), "Indigenes' responses to immigrants' consumer acculturation: a relational configuration analysis," *Journal of Consumer Research*, 42 (1), 109-129.

Morse, Janice M. (2009). Mixing qualitative methods. pp. 1523-1524.

Okamura, Jonathan Y. (2010), "Bridges or barriers: Multiracial families and race relations," *Multiethnicity and Multiethnic Families: Identity, Development and Resilience. Honolulu: Le 'a Publications*, 43-66.

Oswald, Laura (1999), "Culture Swapping: Consumption and the Ethnogenesis of Haitian Immigrants," *Journal of Consumer Research*, 25 (4), 303-318.

Peñaloza, Lisa (1994), "Atravesando Fronteras/Border Crossings: An Ethnographic Account of The Consumer Acculturation of Mexican Immigrants," *Journal of Consumer Research*, 21, June, 32-54.

Phinney, Jean S. (1996), "Understanding ethnic diversity: The role of ethnic identity," *American Behavioral Scientist*, 40 (2), 143-152.

Pieterse, Jan N. (2001), "Hybridity, so what? Theory," *Culture & Society*, 18 (2-3), 219-245.

Prasad, M. Madhava (2000). Ideology of the Hindi Film: A Historical Construction. New Delhi: Oxford University Press.

Punathambekar, Aswin (2005), "Bollywood in the Indian-American diaspora: Mediating a transitive logic of cultural citizenship," *International Journal of Cultural Studies*, 8, 151-173.

Rajadhyaksha, Ashish (2003), "The Bollywoodization of the Indian Cinema: Cultural Nationalism in a Global Arena," in Preben Kaarsholm ed. City Flicks: Cinema, Urban Worlds ad Modernities in India and Beyond, *Inter-Asia Cultural Studies*, 4 (1), 25-39.

Rauf, Ateeq, and Ajnesh Prasad (2017), "Ritualistic Meal Consumption and the Temporal Reduction of Divisions Due to Economic Disparity," *Advances in Consumer Research*, 45, 833-834.

Stayman, Douglas M., and Rohit Deshpande (1989), 'Situational ethnicity and consumer behavior," *Journal of Consumer Research*, 16 (3), 361-371.

Takhar, Amandeep (2011), "Bollywood: A Consumer Reacculturation Agent," *Advances in Consumer Research*, 39, 695-696.

Takhar, Amandeep, and Pepukayi Chitakunye (2012a), "Family Quality Time and the Techno-Culture Food Environment," *Advances in Consumer Research*, 40, 720-721.

Takhar, Amandeep, and Pepukayi Chitakunye (2012b), "Rich descriptions: Evoking informant self-reflexivity in marketing and consumer research," *Journal of Marketing Management*, 28 (7-8), 912-935.

Ustuner, Tuba, and Douglas B. Holt (2007), "Dominated Consumer Acculturation: The Social Construction of Poor Migrant Women's Consumer Identity Projects in a Turkish Squatter," *Journal of Consumer Research*, 34 (1), 41-56.

Wamwara-Mbugua, L. Wakiuru, T. Bettina Cornwell, and Gregory Boller (2006), "Triple Acculturation: The Role of African Americans in the Consumer Acculturation of Kenyan Immigrants," *Advances in Consumer Research*, 33, 428.

Value Creation and Destruction in Consumption Practices

Débora Bogéa da Costa Tayt-son, Fluminense Federal University, Brazil
Leticia Moreira Casotti, Federal University of Rio de Janeiro, Brazil
Ana Raquel Coelho Rocha, Fluminense Federal University, Brazil

INTRODUCTION

Value refers to the benefit perceived by the consumer in a person, an object, or an activity (Figueiredo and Scaraboto 2016). Value has been the subject of a long history of research in the fields of marketing and consumer behavior (Bagozzi 1975; Holbrook 1999; Holbrook and Hirschman 1982; Humphrey and Hugh-Jones 1992; Levy 1959; Zeithaml 1988), and has recently garnered more attention. Authors of previous studies have argued that aside identifying value typologies, it is also important to understand how values are created (Arsel 2016; Karababa and Kjeldgaard 2013; Venkatesh and Peñaloza 2014), destroyed (Echeverri and Skålén 2011; Plé and Chumpitaz Cáceres 2010; Smith 2013), and analyzed using different theoretical lens (Arnould 2013). The present study aimed to understand how values can be created and destroyed in sun consumption practices. We use the term *sun consumption* based the definition proposed by Warde (2005, 137), which states that consumption is a process in which "...agents engage in appropriation and appreciation, whether for utilitarian, expressive or contemplative purposes, of goods, services, performances, information or ambience, whether purchased or not...".

Until the 20th century, sun consumption was linked to a dominant pattern of light skin valuation, indicative of higher socioeconomic positions. Rich people avoided sun exposure, thus differentiating themselves from those who worked in agriculture and had more tanned skin (Keesling and Friedman 1987). This stereotype reversed in the 1920s with the adoption of tanned skin by fashion influencers, such as the French fashion designer Coco Chanel. Tanned skin has thus come to signify wealth, as it is now indicative of plentiful time and financial resources to dedicate to leisure (de Souza et al. 2004). Heliotherapy promoted the association of tanned skin with health in the 1940s. This practice prescribes daily sunbathing to prevent or cure illnesses (de Souza et al. 2004). Concerns and research regarding heliopathy, pathological disorders caused by sunlight, appeared in the 1940s. However, the most alarming findings in this area of research did not appear until the 1960s, when some people began to present with tumors resulting from sunlight exposure (Keesling and Friedman 1987).

The literature regarding value creation (Gummerus 2013) has helped us to understand sun consumption in view of the historical relationship established between human beings and the sun. These works challenged the mainstream, focused on typologies of value (Humphrey and Hugh-Jones 1992; Zeithaml 1988), by proposing a paradigm shift from the discussion of marketing techniques and concepts to understanding the market as a social construction (Peñaloza and Venkatesh 2006).

The consumer behavior literature on value creation has failed to take into account the potentially negative results of consumption interactions that may lead to value destruction. Studies on value destruction can only be found in service marketing literature (Echeverri and Skålén 2011; Plé and Chumpitaz Cáceres 2010; Smith 2013). One may infer that if value can be co-created, then it can also be co-destroyed (Plé and Chumpitaz Cáceres 2010). If co-creation refers to the process in which providers and consumers collaboratively create value, then co-destruction refers to the collaborative destruction or decrease of value (Echeverri and Skålén 2011) resulting from the misuse of resources (personal, informational, and technological) during interactions between different service systems (Plé and Chumpitaz Cáceres 2010).

The present research was inspired by the proposal to develop a practice theory of value (Arnould 2013) that advocate the use of Practice Theory (Schatzki 2001) in value studies and offer a solution to the problem of agency and structure commonly found in social theories. In a practice theory of value, the unit of analysis is centered on the practice rather than the individual or the structure (Reckwitz 2002). Consumption occurs to the extent that goods are appropriate during engagement in particular practices (Warde 2005). The practice functions as nexus of *saying* and *doing*, meaning these concepts are linked in some way. This link involves understanding what to say and do, procedures or rules, and engagements (Warde 2005).

Many products are directly related to the conduction and reproduction of daily life, meaning that there is a material dimension of practice that deserves attention (Warde 2005). Various authors of consumer behavior research have attempted to include the material dimension in the analysis of practice (Magaudda 2011; Shove and Pantzar 2005). Magaudda (2011) proposed the *Circuit of Practice*, composed of three main analytical elements (meanings, doings, and objects) that constitute practice as a whole entity. Meanings function as rules that reflect knowledge about something to do. Doings provide skills, which comprise the knowledge and abilities that are acquired as people perform practices. Finally, objects are resources that can be used by people to achieve their goals. In the present research, the circuit of practice was used to explain the dynamics of practice change and transformation.

This study aimed to answer the following question: How are values created and destroyed in sun consumption practices?

METHOD

This work can be characterized as narrative research (Lieblich et al. 1998; Shankar et al. 2001). Seventeen semi-structured interviews were conducted with Brazilian women residing in Rio de Janeiro aged 20 to 70 years old. The city of Rio de Janeiro has been represented by aspects such as the beach, the sun, the ocean, seminaked bodies, carnivals, youth, and freedom (Goldenberg 2002). The interviews were conducted at the respondents' residences, and each lasted 60 minutes on average. Recordings of the interviews were transcribed, generating 133 pages for analysis. Codification was initiated through a gradual induction process (Lofland and Lofland 2006) with Atlas.ti software, generating a total of 306 codes grouped into three dualities of practices.

FINDINGS

The omnipresence of the sun triggers choices and submissions, as there are situations wherein the sun cannot be avoided. This context proved useful for understanding the value creation and destruction practices associated with tensions in the following positions: the consumer's relationship with their body (intrapersonal), their relationship with materiality, and their relationships with others (interpersonal).

INTRAPERSONAL PRACTICES

Practices involving the body were observed in relation to value creation in the participants' statements that the sun provides "balance

for the body and the life," "gives a lot of wellbeing," "invigorates," and "is a source of energy". One participant suggested that people may lack energy or become depressed without the sun. The sun was also connected to the body in participant statements indicating that value can be created or destroyed as a result of both sun tanning and prevention practices. Sonia (59 years old) stated that the "sensual tan line" of a bikini on a sunburned body, although typically desired, is also associated with discomfort because one can "feel stinging all over". She also stated that "information" has led people to grow more "careful" about the "dangers of exposure," evidencing the existence of different actors performing in the market of sun consumption (Karababa and Kjeldgaard 2013).

Interviewees indicated several dilemmas related to sun consumption and beauty. Although exposure to the sun can create positive aesthetic value, providing a "beautiful tan" and thus the appearance of a "health[y] face," it can also be a source of value destruction. For example, tans can create "painful burnt skin", "blemishes", and skin diseases. Another dilemma was noted when the image of an "extremely pale" woman "who doesn't get sun" was associated with prevention strategies that imply efforts such as the repeated use of sunscreen. However, the suntan aesthetic appeared to prevail in associations with beauty, as the participants reported their dislike of "pasty skin." The image of a suntanned woman with a "healthy look" and with aesthetics "linked to beauty" appeared to be admired and desired. This admiration, however, was accompanied by the use of "protection" during sun consumption because the participants had "access to information" about the "sun['s] harmful impacts on aging and health."

Although the participants seemed to have internalized the need to wear sunscreen, reports suggested that this strategy was not always followed. As Janet (34 years old) said, "the fear of having skin cancer" did not overcome "laziness" with respect to the systematic application of sunscreen.

MATERIAL PRACTICES

Objects were central to the mediation between sun consumption and the body. In recounting a visit to the beach with her husband, Amanda (35 years old) linked her "awful memory" to the use of an expired sunscreen, which caused "sunburns," "peeling skin" that was "very red," and "stinging pain." The purchase of another unexpired sunscreen with "a super high SPF" was crucial to her recovery of value. Another account that pointed to materiality as a mediator in the value recovery process focused on the sun's excessive brightness, which may create visual difficulties. Sunglasses, hats, and beach umbrellas were noted as fundamental mediating accessories in cases of sun exposure. Judith (50 years old) reported that her "sensitivity to light" may prevent her from going to the beach or walking in the streets on sunny days without sunglasses.

We identified several spaces that take the role of mediators in the recovery of destroyed value. Particularly, shopping malls and movie theaters were recalled because they offer amenities, such as air conditioning, that are capable of recovering the value of a sunny day, which may be destroyed by high temperatures. These spaces were described by interviewees as alternatives to avoid the "high energy cost" of staying at their homes with their air conditioners turned on.

The sun also appeared as a mediator in the value creation process. Some of the interviewees' memories accounted for the sun's presence or absence as a decisive or organizing element. Anna (54 years old) said that the weather is an important mediator in her decisions regarding outfit selection, assigning notions of heat and light clothes to sunny days and cold and heavy clothes to rainy days.

While discussing her organizing logic on weekdays and weekends, Joana (50 years old) referred to the sun as an element capable of "turning on the switch" of her routine, stating that "depending on the weather, [she] plan[s] [her]self."

INTERPERSONAL PRACTICES

Velho (1999), a Brazilian anthropologist, stated that the value of the beach as a socializing space, motivated people to visit this place more often. Participants in the present study suggested that sunny days motivate "meetings," "chats," "laughter," "being with people," and drawing "everybody together." Experiential aspects of consumption (Belk et al. 1989) were also highlighted, as phenomena such as leisure activities and sensory pleasures were important parts of the interviewees' behavior.

Sun holds positive associations and creates value by enabling social activities, but some accounts suggested that the presence of the sun also lead to negative associations. Some participants reported that they felt "pressured" or "obliged" to enjoy and prefer sunny days, to look "happy" and "joyful," "to hangout and have fun," and "to be with a bunch of people" even though these feelings and behaviors were not always genuinely desired. For example, there is a popular Brazilian song that says "*Cariocas* [Rio natives] don't like cloudy days" (Calcanhoto 1994), an idea frequently repeated by the general media. Alternatively, Clara (41 years old) named her favorite song as one that celebrates a day without sun (Azevedo 1996). Judith (50 years old) reported experiencing a "tormenting duel" between liking rainy days—which may be more "reflective" and productive for studying—and not seizing sunny days, which she feared could lead her to "[miss] some part of [her] life."

DISCUSSION

Findings showed that multiple practices work together in a process of value creation and destruction, even with the omnipresence of the consumption object. This was the first contribution that the sun context brings to the literature, revealing that value creation and destruction occurs even when individuals have less agency to either expose themselves to consumption or avoid consumption. The interviewees disclosed that they were aware of the sun's omnipresence, decided on the practices that would bring them benefit (i.e., create value), and understood that they were subject to practices that could compromise their relationship with the sun (i.e., destroy value). This research was not limited to the analysis of practices involving value creation, which is common in consumer behavior studies (Schau et al. 2009). On the contrary, it was possible observe how practices in the context of sun consumption could also lead to value destruction, a concept neglected in consumer behavior field.

The idea that practices are formed by meanings, doings, and objects (Magaudda 2011) allowed us to assume that a practice will create value for the consumer when these elements are aligned. In contrast, a practice may destroy value when a single element is not aligned. For example, one interviewee recounted her experience with an expired sunscreen, which left her with negative memories of her trip relating to skin burns. In this case, the object did not perform its function, causing misalignment and destroying value. Another interviewee described a situation in which the absence of the sun was preferred, as its presence could have exerted unwanted social pressures and obligations, which contrasted with the positive meanings often associated with the sun. In this case, there was a misalignment between the interpretive scheme constructed by the interviewee, in which unwanted obligations were associated with sunny days, and the activities she needed to perform (e.g., studying), which were more introspective and solitary and therefore should not have oc-

Table 1: Value creation and destruction in consumer practices

Practices in Sun Consumption	Value Creation and Destruction		
	Aspects of Value Creation	Core Tension	Aspects of Value Destruction
• Intrapersonal Practices	• The sun "invigorates" • Positive aesthetic value (i.e., a "beautiful tan")	Practice elements aligned versus Practice elements misaligned	• Discomfort (i.e., the "pain of burnt skin") • The "dangers of exposure" (i.e., skin cancer)
• Material Practices	• Products and spaces function as mediators • The weather functions as an organizer of daily events		• Problems with products (i.e., expired sunscreen) • High temperatures on sunny days
• Interpersonal Practices	• Socialization		• "Pressure" (i.e., to be happy)

curred on those days. Doings can also cause misalignments. For example, the respondents associated the use of sunscreen with laziness as well as the qualities of being repetitive and tiring. In this example, skills were misaligned, leading to sun consumption practices capable of destroying value. Table 1 summarizes these findings.

FINAL CONSIDERATIONS

The literature on value supports this study, which explored a concept academically marginalized in the field of consumer behavior research: the destruction of value as a result of consumption practices. The omnipresence of the sun allowed for both value creation and destruction to be identified and analyzed simultaneously because consumers cannot control the presence of the sun.

This work also contributed to the empirical articulation of ideas and categories developed in different studies that have addressed value creation and destruction as well as practice theory. Findings showed that these practices can generate positive results to the extent that their components are aligned (value creation) or can generate negative results to the extent that their components are misaligned (value destruction). This investigation also advanced the study of value co-destruction. While co-destruction reinforces the existence of a misalignment between at least one of the different elements of a service system, some of the experiences reported by participants in this study showed that misalignment can also occur outside of the context of services.

This work, which took a microsocial perspective, had several delimitations, including the theoretical lens of practice theory, the context of sun consumption, and a focus on women. In this way, opened several avenues for other studies of consumption, particularly studies of practices resulting in value destruction. Finally, recommendations for future research reinforced the main findings of this study, which criticized the openly positive bias of research on value in the field of consumer studies.

REFERENCES

Arnould, Eric J. (2014). Rudiments of a value praxeology. *Marketing Theory*, 14(1), 129-133.

Arsel, Zeynep (2016). Markets and Values. *Assembling Consumption: Researching Actors, Networks and Markets*, New York: Routledge, 32-44.

Azevedo. Geraldo (1996). Dia Branco. In: Azevedo, Geraldo. O Grande Encontro. Local: BMG Brasil, 1996. 1 LP/CD. Faixa 7.

Bagozzi, Richard P. (1975) 'Marketing as Exchange', *Journal of Marketing* 39(4): 32–9.

Belk, Russell W., Melanie Wallendorf, and John F. Sherry Jr. (1989). The sacred and the profane in consumer behavior: Theodicy on the odyssey. *Journal of consumer research*, 16(1), 1-38.

Calcanhoto, Adriana (1994). Cariocas. In: Calcanhoto, Adriana. A Fábrica do Poema. Local: Epic Records, 1994. 1 LP/CD. Faixa 9.

de Souza, Sonia RP, Frida M. Fischer, and José MP de Souza (2004). Bronzeamento e risco de melanoma cutâneo: revisão da literatura. *Revista de Saúde Pública*,38(4), 588-598.

Echeverri, Per, and Per Skålén (2011). Co-creation and co-destruction: A practice-theory based study of interactive value formation. *Marketing theory*, 11(3), 351-373.

Figueiredo, Bernardo, and Daiane Scaraboto (2016). The Systemic Creation of Value Through Circulation in Collaborative Consumer Networks. *Journal of Consumer Research* 43.4 (2016): 509-533.

Goldenberg, Mirian (2002). *Nu and Vestido: dez antropólogos revelam a cultura do corpo carioca*. Editora Record.

Gummerus, Johanna (2013). Value creation processes and value outcomes in marketing theory: strangers or siblings?. *Marketing Theory* 13.1 (2013): 19-46.

Holbrook, Morris B. (1999). Introduction to consumer value. *Consumer value: A framework for analysis and research*, Routledge: London, UK 1-28.

Holbrook, Morris B., and Elizabeth C. Hirschman (1982). The experiential aspects of consumption: Consumer fantasies, feelings, and fun. *Journal of consumer research*, 9(2), 132-140.

Humphrey, Caroline, and Stephen Hugh-Jones (Eds.). (1992). *Barter, exchange and value: an anthropological approach*. Cambridge University Press.

Karababa, Eminegül, and Dannie Kjeldgaard (2013). Value in marketing: Toward sociocultural perspectives. *Marketing Theory* 14(1), 119-127.

Keesling, Barbara, and Howard S. Friedman (1987). Psychosocial factors in sunbathing and sunscreen use. *Health Psychology*, 6(5), 477.

Levy, Sidney J. (1959) 'Symbols for Sale', *Harvard Business Review* March–April: 117–24.

Lieblich, Amia, Rivka Tuval-Mashiach, and Tamar Zilber (1998). *Narrative research: Reading, analysis, and interpretation* (Vol. 47). Sage.

Lofland, John, and Lyn H. Lofland (2006). *Analyzing social settings*. Belmont, CA: Wadsworth Publishing Company.

Magaudda, Paolo (2011). When materiality 'bites back': Digital music consumption practices in the age of dematerialization. *Journal of Consumer Culture*, 11(1), 15-36.

Peñaloza, Lisa, and Alladi Venkatesh (2006) 'Further Evolving the New Dominant Logic of Marketing: From Services to Social Construction of Markets', *Marketing Theory* 6(3): 299–316.

Plé, Loic, and Rubén Chumpitaz Cáceres (2010). Not always co-creation: introducing interactional co-destruction of value in service-dominant logic. *Journal of Services Marketing*, 24(6), 430-437.

Reckwitz, Andreas (2002). Toward a theory of social practices a development in culturalist theorizing. *European journal of social theory*, 5(2), 243-263.

Schatzki, Theodore R (2001). Practice mind-ed orders. *The practice turn in contemporary theory*, (pp. 50-63). Routledge.

Schau, Hope J., Albert M. Muñiz Jr, and Eric J. Arnould (2009). How brand community practices create value. *Journal of marketing*, 73(5), 30-51.

Shankar, Avi, Richard Elliott, and Christina Goulding (2001). Understanding consumption: Contributions from a narrative perspective. *Journal of marketing Management*, 17(3-4), 429-453.

Shove, Elizabeth, and Mika Pantzar (2005). Consumers, Producers and Practices Understanding the invention and reinvention of Nordic walking. *Journal of consumer culture*, 5(1), 43-64.

Smith, Anne M. (2013). The value co-destruction process: a customer resource perspective. *European Journal of Marketing*, 47(11/12), 1889-1909

Velho, Gilberto (1999). Os mundos de Copacabana. *Antropologia urbana: cultura e sociedade no Brasil e em Portugal*. Zahar.

Venkatesh, Alladi, and Lisa Peñaloza (2014). The value of value in CCT. *Marketing Theory*, 14(1), 135-138.

Warde, Alan (2005). Consumption and theories of practice. *Journal of consumer culture*, 5(2), 131-153.

Zeithaml, Valarie A. (1988). Consumer perceptions of price, quality, and value: a means-end model and synthesis of evidence. *The Journal of marketing*, 52(3), 2-22.

Masculinity May Mean Different Things in Different Contexts

Tabitha S Thomas, Unaffiliated

INTRODUCTION

When one is asked to imagine a masculine person, what is it that comes to mind? Past research shows that people have a tendency to link masculinity with external factors such as a fabulous physique (e.g. height, broad shoulders) and internal factors such as courage, independence and hiding emotions like sadness (e.g. real men don't cry; Bem 1974; Brozo and Schmelzer 1997; Holt and Thompson 2004). These masculine stereotypes are strongly engraved inside male brains because of cultural norms, societal norms and the way men are generally portrayed in the mass media. Prior research demonstrates that the pursuit of toxic masculinity has resulted in severe problems such as body dissatisfaction, eating disorders, depression, anxiety, and low self-esteem related issues in men (Burlew and Shurts 2013). What if men are forced to think about masculinity differently? For example, how would a person describe their father's masculinity, friend's masculinity, or professor's masculinity? Will their answer resemble one of the Marvel Comics superheroes? The response may be a yes or no depending upon the person answering the question. The primary objective of the present research is to show that when men are made to think about masculinity in different social contexts or roles their response to what they perceive as being masculine varies.

THEORETICAL BACKGROUND

Conceptualization of Masculinity

The Oxford English Dictionary defines masculinity as a set of qualities that characterize a man. Although masculinity varies culturally, the traits most societies consider manly remain consistent (Hofstede 1984). The prominent theories of masculinity are the breadwinner model, the rebel model, and the man-of action-hero model (Holt and Thompson 2004). In the breadwinner model, men are hard workers who are committed to their careers and chase after material success. The rebel model defines men as reckless, wild, uncivilized, immature, or anarchic, who also possess facets such as charisma and exceptional physical skills. The man-of action-hero model embodies components of both the breadwinner and the rebel model i.e. while men in the man-of action model are rugged and rebellious, they also consider the collective interests of others. In summary, masculinity has been allied with attributes such as assertiveness, dominance, competence, independence, strength, ambition, and aggression in the extant literature.

The Impact of Masculine Culture on Men

The social construction of masculinity has significantly influenced the way men think, feel, and behave in their day to day lives. For example, in the consumption context, men connect masculinity with excessive alcohol intake, drug abuse, sexual risk-taking behavior (Giaccardi et al. 2017; Lindsay and Lyons 2018), eating too much meat (Rozin et al. 2012), driving sports cars (Avery 2012), and taking part in radical gym workouts (Moore et al. 2019). Men who internalize such masculine norms simply refuse to participate in any act that threatens their macho image. This specific behavior is found to be highly prominent in the presence of other men (Nikolova and Lamberton 2016). Masculinity not only prevails in an external setting but is also strongly present in an internal setting (Moisio et al. 2013). For example, Moisio et al. (2013) reveal that men at home prefer engaging in household tasks such as fixing/assembling furniture, barbecuing, or plumbing to other domestic activities. Likewise, Brough et al. (2016) found that men had problems using environmentally friendly products or adopting to green behaviors because of the stereotypical relations between green behaviors and femininity. In conclusion, masculine norms have shaped the identity of men both inside and outside their homes.

How Stereotypes Shape the Way Men Think About Masculinity

Stereotypes help individuals categorize information and predict their experiences (Hilton and Von Hippel 1996). People use stereotypes to simplify their social world. What this simplification means is that people are cognitive misers. The human brain cannot begin to look afresh at every new situation; thus, it builds on what it has witnessed before (Blair, Ma, and Lenton 2001). Masculine stereotypes are like any other stereotype, i.e. when men are made to think about masculinity, they are bound to recollect and categorize information that they already know. For example, a man may link manliness with a great body due to being repeatedly exposed to male body ideals presented in the mass media. The question is, how can toxic masculine stereotypes be changed? The solution is not that simple. One way to bring about a change would be to make men think differently about masculinity in general. That is, would masculine stereotypes alter if men are to associate masculinity with the love and care of a father, the hard work that a professor puts into imparting knowledge in class or how a male friend cries with another male during troubled times.

The Present Research

The present research argues that perceptions of masculinity reflect a wide range of different behaviors and actions, and that different facets of masculinity can be activated in different social roles or settings. A drawing method was implemented to see if men responded to masculinity-related stereotypes in different social settings or roles. In the past, the drawing method has been successful in understanding physical attractiveness-related stereotypes in children (Thomas 2019). And so, in the present research, a drawing method was considered ideal to explore masculinity stereotypes in adults.

METHOD

Participants: 183 males between ages 18-20 years (*M*age = 19) participated in the drawing study. The participants were recruited using a convenience sample.

Procedure: Participants were divided into six groups. Each participant belonged to only one group. The participants were given an A4 size sheet of paper, a pen, and were asked to draw pictures of men. Participants in group 1 (*N* = 30) drew a picture of a masculine person. Participants in group 2 (*N* = 31) drew a picture of their father's masculinity. Participants in group 3 drew a picture of their own masculinity (*N* = 30). Participants in group 4 (*N* = 30) drew a picture of their friend's masculinity. Participants in group 5 (*N* = 31) drew a picture of their professor's masculinity. Lastly, participants in group 6 (*N* = 31) drew a picture of an army officer's masculinity. Following the drawing task, the participants were asked to write down few words describing the masculine characteristics of the men present in their pictures. The participants were thanked and given a small reward for taking part in the research.

Analysis: The analysis and interpretation of 183 drawings and texts were performed in line with those adopted by Thomas (2019). To understand masculinity-related attributes across six drawing conditions, two drawing conditions that were similar were assessed. For instance, the drawings of a masculine person and an army officer were compared because these two conditions met the socially constructed view of masculinity. Likewise, the father and professor condition drawings were put together for evaluation because a father or a professor is a person known to the participants; and age-wise a father or professor is most likely to be older than the participants. Lastly, the self-drawing condition and the friend's masculinity drawing conditions were compared with each other because a friend is a peer and probably the same age as the participants.

FINDINGS

Masculine Person and Army Officer: The drawings and the texts present in the masculine person condition and the army officer condition were found to be similar (see Figure 1). The descriptive words associated with a masculine person and an army officer are shown below.

"He is tough and is carrying weights on both arms. He has the perfect abs, chest, arms, and biceps. All the chicks go wow !!!" – Participant in the Masculine Person Condition

"He is muscular, strong, and has six-pack abs. He has good lungs and can run fast. His muscularity should help him hold his gun and fire at the enemy. He has a good short hairstyle" – Participant in the Army Officer Condition
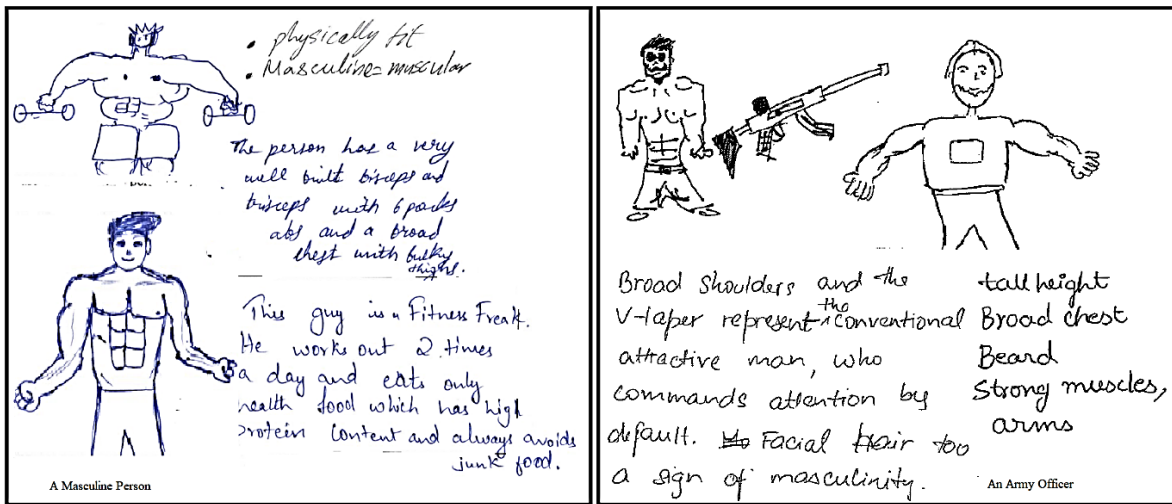
Figure 1 Drawings done by participants in the masculine person condition (on the left) and army officer's masculinity condition (on the right)

Figure 2 Drawings done by participants in the father's masculinity condition (on the left) and professor's masculinity condition (on the right)

Father and Professor: In the father's masculinity condition, most of the drawings comprised of a fat, bald person with a protruding stomach (see Figure 2). In the professor's masculinity condition, the drawings contained a non-muscular person wearing glasses and formal clothing (see Figure 2). The words used to describe a father or professor's masculinity varied based on the relationship that the participants appeared to share with their father or professor. Examples of positive words include:
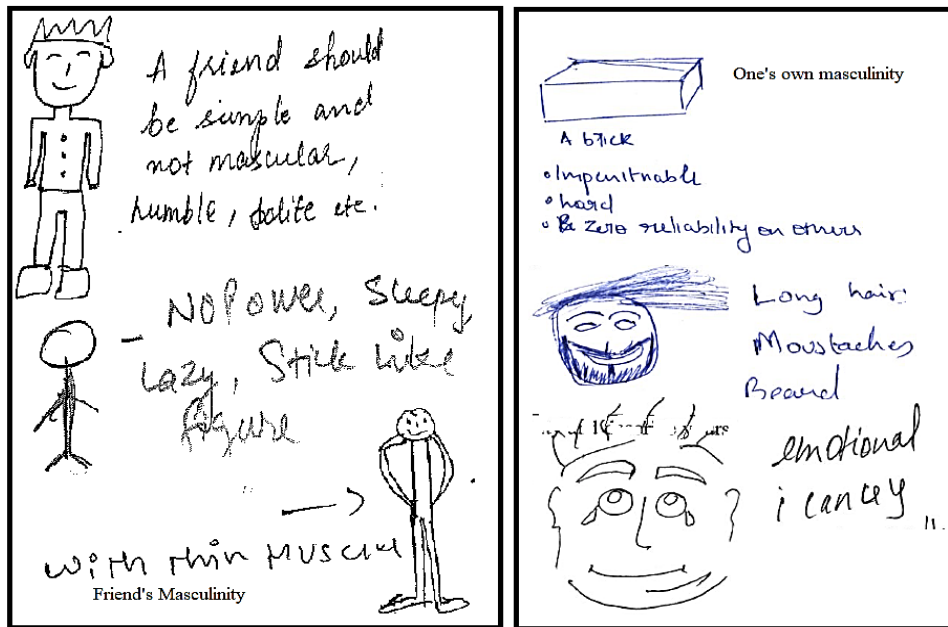
Figure 3 Drawings done by participants in the friend's masculinity condition (on the left) and self-masculinity condition (on the right)

"He is loving, caring, very hardworking and provides for the family" – Participant in the Father Condition

"He is friendly, soft-spoken, supportive, and helpful" – Participant in the Professor Condition

Examples of negative words used by the participants to describe their father's masculinity and professor's masculinity.

"He is arrogant, stubborn, and his expectations are too high" – Participant in the Father Condition

"He is grumpy, judgmental, seems smart but he is dumb" – Participant in the Professor Condition

Friend and Self: In the friend's masculinity condition, most drawings were depicted as being skinny (see Figure 3). Both positive and negative words were used by the participants to describe their friend's masculinity. For example:

"He is physically fit. But no six packs. He is healthy and looks smart" – Participant in the Friend's Masculinity Condition

"He is hairy, thin, skinny, short, and creepy" – Participant in the Friend's Masculinity Condition

In the self-masculinity condition, most participants drew pictures of faces with the rest of the body missing. Some participants drew pictures of random objects such as a brick, a tree, a jigsaw puzzle or a motorbike instead of a human face or figure to represent their masculinity (see Figure 3). Also, when participants were asked to describe their own masculinity, they tended to focus on internal aspects of appearances instead of external aspects. For example:

"Masculinity is about the mental strength to overcome hard situations with confidence" – Participant in the Self-Masculinity Condition

"I am weak in physical appearance. But good at my work and sharp at learning things" – Participant in the Self-Masculinity Condition

SUMMARY

The findings showed that masculinity related stereotypes were present across six drawing conditions. For example, when participants were asked to think (draw) about masculinity or a profession that signifies high masculinity (e.g. army officer), their assessment of manhood aligned with the socially constructed view. However, when participants were asked to think differently, i.e. draw their father, professor, friend or their own masculinity, their responses varied. For instance, a professor's masculinity was related to wearing glasses and non-stylish formal clothing which fits in with the general stereotypical notions of a professor. A father's physical appearance was linked to obesity and a friend's to being very thin. When participants were asked to draw their own masculinity, most of them drew only a face with facial hair (body missing). This might be because the participants may have felt embarrassed, insecure, or biased while evaluating themselves than while assessing others. In addition, when men were asked to describe a masculine person or an army officer, they related masculinity to external strength, great physique, and courage. However, when men were asked to talk about their father, professor, friend, or their own masculinity, a majority of them linked masculinity with internal factors such as kindness, the right to express feelings/emotions (e.g. men do cry), to be hardworking or mentally strong.

CONCLUSIONS

The present research is the first to show that in varied social settings or roles men view masculinity in a different way. This study is

also the first to use drawings as a method to understand masculinity-related ideals and stereotypes in adults. A limitation of this paper is that due to its qualitative nature, the causal effect cannot be determined. For instance, this paper does not explain why men possess certain masculinity stereotypes in the six drawing conditions. Likewise, the findings of the study cannot be generalizable because of the subjectivity element present in qualitative research. Therefore, quantitative methods such as experimental studies need to be undertaken in the future to make the findings generalizable and explain causality. Future research can also look at considering gender (men vs. women) and age-related differences (older vs. younger) while examining perceptions of masculinity. Finally, based on the empirical support provided, the present research raises the possibility that toxic masculinity perceptions in men could be changed if they are made to think about masculinity in a non-conventional manner.

REFERENCES

Avery, Jill. (2012). Defending the Markers of Masculinity: Consumer Resistance to Brand Gender-Bending. *International Journal of Research in Marketing*, 29(December), 322-336.

Bem, Sandra. L. (1974). The Measurement of Psychological Androgyny. *Journal of Consulting and Clinical Psychology*, 42(April), 155.

Blair, Irene V., Jennifer E. Ma, and Alison P. Lenton. (2001). Imagining Stereotypes Away: The Moderation of Implicit Stereotypes Through Mental Imagery. *Journal of Personality and Social Psychology*, 81(November), 828.

Brough, Aaron R., James EB Wilkie, Jingjing Ma, Mathew S. Isaac, and David Gal. (2016). Is Eco-Friendly Unmanly? The Green-Feminine Stereotype and its Effect on Sustainable Consumption. *Journal of Consumer Research*, 43(December), 567-582.

Brozo, William G., and Ronald V. Schmelzer (1997). Wildmen, Warriors, and Lovers: Reaching Boys through Archetypal Literature. *Journal of Adolescent & Adult Literacy*, 41(September), 4-11.

Burlew, Larry D., and W. Matthew Shurts. (2013). Men and Body Image: Current Issues and Counseling Implications. *Journal of Counseling & Development*, 91(October), 428-435.

Hilton, James L., and William Von Hippel. (1996). Stereotypes. *Annual Review of Psychology*, 47(February), 237-271.

Hofstede, Geert (1984). *Culture's Consequences: International Differences in Work-Related Values* (Vol. 5). Sage.

Holt, Douglas B., and Craig J. Thompson (2004). Man-of-Action Heroes: The Pursuit of Heroic Masculinity in Everyday Consumption. *Journal of Consumer Research*, 31(September), 425-440.

Giaccardi, Soraya, L. Monique Ward, Rita C. Seabrook, Adriana Manago, and Julia R. Lippman (2017). Media Use and Men's Risk Behaviors: Examining the Role of Masculinity Ideology. *Sex Roles*, 77(November), 581-592.

Lindsay, Samuel, and Antonia C. Lyons (2018). "Pour It Up, Drink It Up, Live It Up, Give It Up" Masculinity and Alcohol in Pop Music Videos. *Men and Masculinities*, 21(December), 624-644.

Moisio, Risto, Eric J. Arnould, and James W. Gentry. (2013). Productive Consumption in the Class-Mediated Construction of Domestic Masculinity: Do-it-Yourself (DIY) Home Improvement in Men's Identity Work. *Journal of Consumer Research*, 40(August), 298-316.

Moore, David, Aaron Hart, Suzanne Fraser, and Kate Seear. (2019). Masculinities, Practices, and Meanings: A Critical Analysis of Recent Literature on the Use of Performance-and Image Enhancing Drugs Among Men. Health, https://doi.org/10.1177/1363459319838595.

Nikolova, Hristina, and Cait Lamberton. (2016). Men and the Middle: Gender Differences in Dyadic Compromise Effects. *Journal of Consumer Research*, 43(October), 355-371.

Rozin, Paul, Julia M. Hormes, Myles S. Faith, and Brian Wansink. (2012). Is Meat Male? A Quantitative Multimethod Framework to Establish Metaphoric Relationships. *Journal of Consumer Research*, 39(October), 629-643.

Thomas, Tabitha Susan (2019) ,"Drawings As a Method to Assess Beauty Ideals and Stereotypes in Children", in *NA - Advances in Consumer Research* Volume 47, eds. Rajesh Bagchi, Lauren Block, and Leonard Lee, Duluth, MN : Association for Consumer Research, Pages: 872-872.

Children Perceive Beautiful People to Own Better Material Things

Tabitha S Thomas, Unaffiliated

INTRODUCTION

Past research shows that adults who value materialism and beauty-related ideals are more likely to be narcissists, engage in compulsive buying behaviors, and suffer from problems like anxiety, depression, and low self-esteem issues (Dittmar 2007; Kasser 2016). Understanding the beauty-materialism link in children is vital because stereotypes formed during a phase where children's brains are developing can not only impact their socio-cognitive abilities in the present, but it can also lead to severe psychological problems during adulthood (Bigler and Liben 2007). Even though the beauty-materialism link is widely seen in the mass media (e.g. attractive celebrities endorsing luxury brands) and its impact has been found to be negative in adults (e.g. Ashikali and Dittmar 2012), researchers studying children have not considered the beauty-materialism linkage as their primary research question. However, while investigating a different research problem, prior scholars have identified the beauty-materialism link as one of their findings (Banerjee and Dittmar 2008; Thomas 2019). For example, Banerjee and Dittmar (2008) while examining the correlation between materialism and peer popularity found that popular children were also considered to be attractive and brand conscious. Likewise, Thomas (2019) while exploring perceptions of beauty in 6-12-year-old children found that attractiveness was not only related to physical features such as a beautiful face or a perfect body but was also connected with owning material goods. This paper addresses the gap in the extant literature by assessing the beauty-materialism link as the key research question. Importantly, the present research is the first to test the relationship between physical attractiveness and perceived ownership of material possessions.

THEORETICAL BACKGROUND

Materialism and Children

Materialism is defined in the extant literature as the central importance people place on possessions (Belk 1984; Richins and Dawson 1992). Children's attachment to material objects is formed at an early age. For instance, toddlers and preschoolers express their desire for certain products by nagging, crying, and seizing things off store shelves (John 1999). However, interpreting the symbolic meanings that material things convey (i.e. the status and prominence associated with certain products) develops in children only during middle childhood to early adolescents (Chaplin and John 2005). Typically, children by ages 8-9 start using products and brands to signal their identity to their peers. The materialistic inclinations, however, peaks in children between ages 12-13 (Chaplin and John 2007). Further, past research shows that children from poorer families (Chaplin, Hill, and John 2014) and those with low self-esteem (Chaplin and Lowrey 2010) lean towards being more materialistic than others. Prior studies demonstrate that parents also play a significant role in instilling materialistic values in their children. For instance, the use of material objects by parents to express love or to correct their child's behavior has resulted in children making ties between possessions and rewards or punishments (Richins and Chaplin 2015). In conclusion, scholars have (1) defined materialism, (2) shown the importance of material goods in children's lives, (3) identified the ages at which materialistic tendencies begin and peak, and (4) found the mediators for high versus low materialism levels in children. This paper provides evidence for showing how owning material goods is becoming an integral part of the beauty-is-good stereotype.

The Beauty-is-Good Stereotype in Children

According to the beauty-is-good stereotype, children perceive attractive peers to have more positive characteristics than normal looking or unattractive peers. For example, Rennels and Langlois (2014) and Griffin and Langlois (2006) find that children are more likely to consider their attractive peers to be well behaved, friendly, appreciative, adventurous, helpful, smart, more ambitious than others. The beauty-is-good stereotype is also evident in the mass media wherein highly moral characters (e.g. Cinderella, Snow White) are often portrayed as attractive and evil characters are typified as being ugly (e.g. the evil stepmother and queen; Bazzini et al. 2010). The literature on the beauty-is-good stereotype in children has mainly focused on behavioral outcomes (e.g. attractive children being perceived as nice or unattractive children being perceived as mean). The current study, however, proposes that beauty stereotypes are not just related to positive or negative behavioral outcomes but are also linked to the ownership of material possessions.

Hypothesis Development

Prior work in materialism shows that children use possessions to signal their identity and status to others (Chaplin and John 2005; Chaplin and Lowry 2010). The beauty-is-good stereotype literature reveals that attractive children are perceived as having more positive behavioral characteristics than others (Griffin and Langlois 2006; Rennels and Langlois 2014). The current study predicts that children are going to view attractive children with owning expensive possessions and less attractive children with owning cheap possessions. More formally:

> Hypothesis: Attractive (less attractive) children are perceived to own more expensive (cheap) possessions and few cheap (expensive) possessions than less attractive (attractive) children

METHOD

Overview of the Studies

To understand the links between beauty and materialism two studies were conducted. The objective of study 1 was to quantitatively test children's associations between beauty and materialism using an experiment. The objective of study 2 was to explore children's feelings and experiences pertaining to the beauty-materialism link using a story telling method. A storytelling approach was used because through the "construction of stories, individuals organize their experiences, create order, explain unusual events, gain perspectives and make evaluations" (Escalas 1998, 271).

Study 1

Objective: To test the hypothesis

Participants and Design: The present study used a between-subjects experimental design. The research design has been adapted from Langlois and Stephan (1977). The participants for the study were recruited from a large public school. Two hundred and forty children (49 % female, M_{age} = 9.35) completed the experiment. Most of the children belonged to lower to middle-class families. Ethical approvals and necessary permissions from the concerned authorities

and the participants themselves were obtained before the commencement of the study.

Stimulus Materials: Ten pictures, five for boys and five for girls, (see Figure 1) varying in physical attractiveness levels was created by a professional artist. Following the guidelines from previous research (Langlois and Stephan 1977), fifty-four undergraduate students were asked to rank the pictures from 1 to 5 in order of attractiveness levels. The attractiveness ranking order determined by the participants can be seen in Figure 1. The highest attractiveness level ranked picture (1) and the lowest attractiveness level ranked picture (5) were chosen as stimulus pictures for the experiment.

conditions. Since the stimulus pictures for female and male participants were different, one-way between-subjects ANOVA was conducted separately for female participants and male participants. For girls, there was a significant effect of physical attractiveness levels on owning expensive possessions for the attractiveness and less attractiveness conditions ($F (1,116) = 34.57$, $p < .001$). The results revealed that the mean score for the attractive condition ($M_{attractivegirl} = 2.22$, $SD_{attractivegirl} = 1.81$) was significantly different from that of the less attractive condition ($M_{lessattractivegirl} = 0.59$, $SD_{lessattractivegirl} = 1.07$). Similarly, for boys, there was a significant effect of physical attractiveness levels on owning expensive possessions for the attractive vs. less attractive conditions ($F (1,120) = 36.09$, $p < .001$). The re-

Figure 1 The stimulus pictures ranked from 1 to 5 in order of attractiveness levels (1 = Highest   5 = Lowest)

Procedure: The experiment was conducted inside a classroom at the participants' school. Each participant was tested individually. Following the guidelines from Langlois and Stephan (1977), the participants either saw a picture of a good-looking child (picture 1) or a less good-looking child (picture 5). Female participants saw only female stimulus pictures, and male participants saw only male stimulus pictures. After the participants had viewed the respective pictures (either attractive or less attractive), they were asked a set of questions that measured materialism.

To assess the participants' evaluation of the stimulus pictures (attractive vs. less attractive) they were asked to indicate 'yes' or 'no' while responding to questions. The questions relating to material success (owning expensive vs. cheap possessions) was adapted from Richins and Dawson (1992). Examples of the material success items include "this child's parent owns an expensive (cheap) car", "this child does not live in a big (small) house (reverse scored)", "this child wears branded (non-branded) clothes" and "this child has no money (reverse scored). The above items were combined, and a total score was calculated for analysis.

Manipulation Check. Analysis of the recognition check measured indicated that 77% of participants were able to correctly identify whether the picture of the child shown to them was attractive or not in the first condition. Similarly, 82% of participants were able to correctly recognize if the picture of the child revealed to them was less attractive or not in the second condition.

Test of Hypothesis. A one-way between-subjects ANOVA was conducted to compare the effect of physical attractiveness levels on owning expensive possessions in the attractive versus less attractive

sults revealed that the mean score for the attractive condition ($M_{attractiveboy} = 2.61$, $SD_{attractiveboy} = 1.63$) was significantly different than the less attractive condition ($M_{lessattractiveboy} = 0.94$, $SD_{lessattractiveboy} = 1.45$).

Similarly, a one-way between-subjects ANOVA was conducted to compare the effect of physical attractiveness levels on owning cheap possessions in the attractive and less attractive conditions. For girls, there was a significant effect of physical attractiveness levels on owning cheap possessions between the two conditions ($F (1,116) = 34.67$, $p < .001$). The results indicated that the mean score for the attractive condition ($M_{attractivegirl} = 1.34$, $SD_{attractivegirl} = 1.37$) was significantly different than the less attractive condition ($M_{lessattractivegirl} = 2.57$, $SD_{lessattractivegirl} = 0.81$). Similarly, for boys, there was a significant effect of physical attractiveness levels on owning cheap possessions for the attractiveness and less attractiveness conditions ($F (1,120) = 32.67$, $p < .001$). The findings indicated that the mean score for the attractive condition ($M_{attractiveboy} = 1.08$, $SD_{attractiveboy} = 1.25$) was significantly different than the less attractive condition ($M_{lessattractiveboy} = 2.29$, $SD_{lessattractiveboy} = 1.07$).

The hypothesis presented in this study was supported.

Discussion

The experimental study revealed significant differences between physical attractiveness levels and owning possessions. The findings showed that children perceived attractive children to own more expensive possessions than less attractive children. A qualitative study was added for the subjectivity element i.e. to understand children's feelings and to strengthen the findings from study 1.

Beauty and Materialism Link
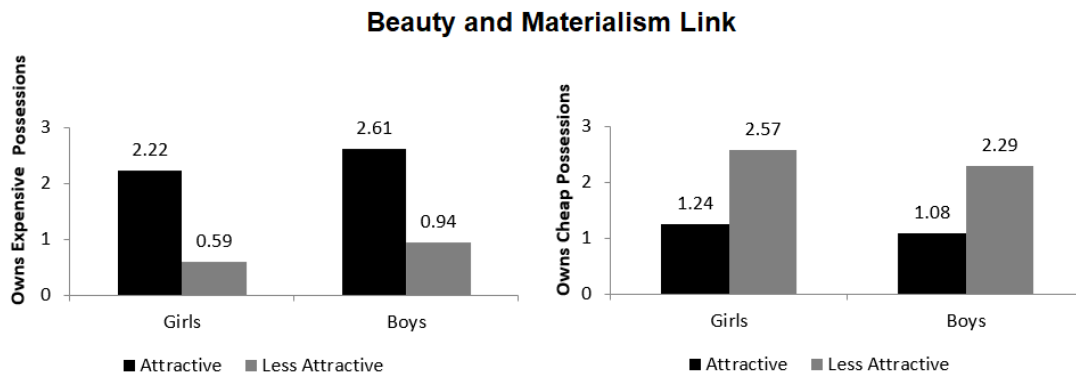
Figure 2 Means for expensive and cheap possessions owned

Study 2

Goal: To collect stories relating to children's feelings and experiences which an experimental study is not able to capture.

Participants and Procedure: The participants for the study comprised of twenty-four children (54% female, M_{age} = 8.7). In this study, children were asked to imagine and narrate how a good-looking child versus a less good-looking child spent their birthday. A birthday party context was chosen for the study as birthdays involve experiences (time spent with family and friends) and possessions (receiving gifts). The stories were transcribed, read back and forth, and analyzed using Braun and Clark's (2006) thematic content analysis process.

Results

(1) *Gifts, Fun, and Friends*: The findings revealed associations between beauty, receiving gifts, having fun, and the number of friends a good-looking or a less good-looking child had. The participants described the following:

"A good-looking boy would decorate his house, wear nice clothes, play games, and receive many gifts on his birthday…. However, a less good-looking boy receives no gifts, his house is not decorated with balloons, and he doesn't get to wear any party clothes" – 8-year-old boy

"The pretty girl's parents will buy her new clothes and host a fancy birthday party for her. She gets lots of gifts. The less pretty girl receives few gifts not many and wears old clothes" – 9-year-old girl

(2) *Venue for the Birthday Celebration:* The analysis revealed that the good-looking child spent their birthday at the following places. (1) A five-star hotel, (2) an expensive restaurant, (3) a foreign country, or (4) an amusement park. On the contrary, the participants stated that the less-good looking child spent their birthday at home.

"The pretty girl would spend her birthday in an amusement park. The less pretty girl's family is poor, and so she spends her birthday at home with a few friends, watching television, eating food and some cake" – 11-year-old girl

"The good-looking child will celebrate their birthday by going to an expensive restaurant or a foreign country A child who is not good looking would spend their birthday in their house with a homemade cake" – 12-year-old girl

Discussion

Study 2 confirms the findings of Study 1 by showing the beauty-materialism link. The participant responses indicated that the good-looking child was perceived to host a fancy birthday party at an expensive place for all their friends. The good-looking child was also perceived to cut a big cake and receive expensive gifts (e.g. toys, balloons, new clothes) from both their family members and friends. In contrast, the less god-looking child was perceived to have a simple birthday party and cut a plain or a homemade cake. The less good-looking child's parents were described as poor and therefore they could not afford to buy their son or daughter an expensive gift or throw a lavish birthday party.

CONCLUSIONS

The present research is the first to show a relationship between physical attractiveness and perceived ownership of material possessions. The results obtained from the experimental study and the story narration study contributes to the consumer behavior literature by revealing that beautiful people are not only seen to own better things (Study 1) but are also perceived to have better life experiences (Study 2). The limitations of the present research are as follows. First, while the present research highlights the relationship that exists between physical attractiveness and perceived ownership of material possessions, this research does not provide an explanation as to why this relationship exists in children. This particular shortcoming provides an opportunity for future research. Second, the current study has examined children's perceptions of others concerning beauty and materialism. Future research can investigate how children's perception of beauty or exposure to beauty will influence their own materialistic tendencies. Lastly, in the current research, female participants saw female stimulus pictures and male participants saw male stimulus pictures after which they were asked questions relating to materialism. Future studies can use cross-gender stimuli, followed by questions on materialism. A comparison can then be made to understand the same gender versus cross-gender responses concerning materialistic orientations and beauty stereotypes. In conclusion, the main take away from this paper is that "beauty isn't about wearing costly jewelry or fancy clothes or owning other expensive things, but beauty comes from within the unfading beauty of a gentle and quiet spirit" (1 Peter 3: 3-4). Hence, as a society we are responsible to educate, teach, and train children not to judge, discriminate, or treat people unfairly based on their physical appearance or the material possessions owned by them.

REFERENCES

Ashikali, Eleni-Marina, and Helga Dittmar (2012). The effect of priming materialism on women's responses to thin-ideal media. *British Journal of Social Psychology*, *51*(4), 514-533.

Banerjee, Robin, and Helga Dittmar (2008). Individual differences in children's materialism: The role of peer relations. *Personality and Social Psychology Bulletin*, *34*(1), 17-31.

Bazzini, Doris, Lisa Curtin, Serena Joslin, Shilpa Regan, and Denise Martz. (2010). Do animated Disney characters portray and promote the beauty–goodness stereotype? *Journal of Applied Social Psychology*, *40*(10), 2687-2709.

Belk, Russell W. (1984). Three scales to measure constructs related to materialism: Reliability, validity, and relationships to measures of happiness. *ACR North American Advances*.

Bigler, Rebecca S., and Lynn S. Liben (2007). Developmental intergroup theory: Explaining and reducing children's social stereotyping and prejudice. *Current Directions in Psychological Science*, *16*(3), 162-166.

Braun, Virginia, and Victoria Clarke (2006). Using thematic analysis in psychology. *Qualitative Research in Psychology*, *3*(2), 77-101.

Chaplin, Lan Nguyen, Ronald Paul Hill, and Deborah Roedder John (2014). Poverty and materialism: A look at impoverished versus affluent children. *Journal of Public Policy & Marketing*, *33*(1), 78-92.

Chaplin, Lan Nguyen, and Deborah Roedder John (2005). The development of self-brand connections in children and adolescents. *Journal of Consumer Research*, *32*(1), 119-129.

Chaplin, Lan Nguyen, and Deborah Roedder John (2007). Growing up in a material world: Age differences in materialism in children and adolescents. *Journal of Consumer Research*, *34*(4), 480-493.

Chaplin, Lan Nguyen, and Tina M. Lowrey (2010). The development of consumer-based consumption constellations in children. *Journal of Consumer Research*, *36*(5), 757-777.

Dittmar, Helga. (2007). *Consumer culture, identity and well-being: The search for the 'good life' and the 'body perfect'*. Psychology Press.

Escalas, Jennifer Edson (1998). Advertising narratives: What are they and how do they work. *Representing Consumers: Voices, Views, and Visions*, 1, 267-289.

Griffin, Angela M., and Judith H. Langlois (2006). Stereotype directionality and attractiveness stereotyping: Is beauty good or is ugly bad? *Social Cognition*, *24*(2), 187-206.

John, Deborah Roedder (1999). Consumer socialization of children: A retrospective look at twenty-five years of research. *Journal of Consumer Research*, *26*(3), 183-213.

Kasser, Tim. (2016). Materialistic values and goals. *Annual Review of Psychology*, *67*, 489-514.

Langlois, Judith H., and Cookie Stephan (1977). The effects of physical attractiveness and ethnicity on children's behavioral attributions and peer preferences. *Child Development*, *48*(4), 1694-1698.

Rennels, Jennifer L., and Judith H. Langlois (2014). Children's attractiveness, gender, and race biases: A comparison of their strength and generality. *Child Development*, *85*(4), 1401-1418.

Richins, Marsha L., and Lan Nguyen Chaplin (2015). Material parenting: How the use of goods in parenting fosters materialism in the next generation. *Journal of Consumer Research*, *41*(6), 1333-1357.

Richins, Marsha L., and Scott Dawson (1992). A consumer values orientation for materialism and its measurement: Scale development and validation. *Journal of Consumer Research*, *19*(3), 303-316.

Thomas, Tabitha Susan (2019) ,"Drawings As a Method to Assess Beauty Ideals and Stereotypes in Children", in *NA - Advances in Consumer Research* Volume 47, eds. Rajesh Bagchi, Lauren Block, and Leonard Lee, Duluth, MN : Association for Consumer Research, Pages: 872-872.

How #Flygskam Helped to Redefine the Environmental Sensitivity Concept

Leo Trespeuch, EGUQTR, Canada
Élisabeth Robinot, ESG UQAM, Canada
Béatrice Parguel, CNRS, Canada

INTRODUCTION

Greta Thunberg, environmental activist and Times Magazine personality of the year 2020, has helped reveal the environmental sensitivity (ES) of many individuals. ES influences many behaviours like "flygskam", or flying shame, "the movement that encourages people to refrain from flying to lower their carbon footprints" (New York Times, 2019). The movement made an impact, as airlines Easy Jet and Air France - KLM reacted quickly by announcing the compensation for the carbon emissions of their flights. This suggests that we must expand our understanding of ES in the context of accelerating climate change to include consumer's emotions like shame, guilt and anxiety.

On an academic level, ES and its impact on individuals' behaviours have fueled research studies since the 1980s as well as new terminology to designate environmentally sensitive consumers; "ecologically concerned consumers" (Kinnear, 1974), "socially conscious consumers" (Webster, 1975), "environmentally conscious consumers" (Schlegelmilch, Bohlen and Diamantopoulos, 1996), "environmentally sensitive consumers" (Chawla, 1998), and "green consumers" (Diamantopoulos *et al.,* 2003). However, these studies do not lead to a consensus on the identification of the underlying dimensions of these similar concepts. For example, Diamantopoulos *et al.,* (2003) compare 133 measures across three dimensions: environmental knowledge, attitudes and behaviour, before proposing a new measure in five dimensions of scales to measure environmental knowledge, attitudes, recycling behaviour, political action and purchasing behaviour, without considering the influence of recent climate change on people.

In this study, we will employ the term environmental sensitivity defined by Chawla (1998, p. 11) as "*a predisposition to take responsible environmental action.*" However, recent societal developments show that ES includes cold glow feelings like shame and anxiety, as opposed to "*warm glow of giving*" (Menges, Schroeder and Traub, 2005; Hartmann *et al.,* 2017). Another limit is the evolution of the impact of the societal dimension. Indeed, ES is a behaviour influenced and shared between individuals, such as at the 2019 Montreal climate march that gathered half a million people. Consequently, the egocentric measures of this construct no longer seem to suffice.

To respond to these limits, this article proposes an updated ES measurement by employing the Diamantopoulos *et al.,* (2003) technique. An exploratory qualitative study was first conducted. A quantitative study then enabled to propose and validate an ES measuring tool. The exploratory qualitative study was carried out with 27 participants and the quantitative study with 233 respondents. The end-product is a three-dimensional ES scale that considers environmental consciousness, eco-anxiety and cold glow. In terms of nomological validity, the results highlight that the environmental consciousness dimension significantly impacts the influence on the intention to reduce air travel, and the cold glow dimension positively influences the intention to offset the emissions of carbon linked to air travel.

LITERATURE REVIEW

According to Kinnear *et al.,* (1974), individuals who possess a strong ecological conscience have a sounder understanding of the environmental threat posed by increased human activity on the planet, such as industry. These individuals, through their purchases, go beyond their primary needs of satisfaction linked to the product and feel accomplished when performing symbolic consumer acts (Robinot, 2007). This strengthens their identity and their status in society (Solomon, 1983; Petkus, 1992). Initially, studies regarding environmentally concerned people were based on research to assess the degree of social responsibility of individuals (Webster, 1975). Kinnear, Taylor and Ahmed (1974) pointed out that social awareness is also expressed with regards to the environment. Hence, an environmentally concerned individual tends to minimize their negative impact on the environment at all levels of the consumption process, from acquisition to product disposal (Kreziak *et al.,* 2020). The consumer's purchase behaviour reflects a lifestyle in keeping with their values (Stern et al., 1999).

TWO PERSPECTIVES ON ENVIRONMENTAL SENSITIVITY (ES)

The exploration of ES may be done by using one of two perspectives: egocentric and socio- centric.

EGOCENTRIC PERSPECTIVE

The first approach groups studies that focus on identifying the behavioural determinants of ES individuals such as sociodemographic characteristics, attitudes and values.

Using purely sociodemographic variables leads to contradictory results (Kinnear *et al.,* 1974). Some studies show no correlation regarding age (e.g. Anderson *et al.*, 1974), whereas others demonstrate a positive relationship (e.g. Giannelloni, 1998). Diamantopoulos *et al.,* (2003, p.467) carried out a retrospective analysis of over 136 studies and measurements of ES published between 1972 and 1998. Their conclusions were that: "*the large majority of studies have failed to review all aspects of environmental consciousness and revealed several problems with sample selection procedures.*"

A great deal of research has focused on the connections between attitude and the various behaviours linked to environmental preservation (e.g. Kaiser *et al.,* 2003; Oreg and Katz- Gerro, 2006). This groundwork made it possible to establish a link between an individual's evaluative mental process (often unconscious) and their behaviour. Ajzen (1991), however, suggested that models such as Theory of planned behavior, be further investigated, including the role of emotions. Smith *et al.,* (1994) established that the association between attitude and behaviour linked to environmental concern is weak because of the lack of consideration for consumers' emotional reactions. Some authors have worked on positive emotions linked to responsible consumption. Giebelhausen *et al.,* (2016) show that engaging in sustainable actions causes "warm-glow feelings" which can lead to more favourable assessments of the consumer experience. Positive emotions could thus stimulate more sustainable behaviours (Onwezen *et al.,* 2013; Rezvani *et al.,* 2017; Soleil and Trudel, 2017; White *et al.,* 2019). Peter and Honea (2012) showed that positive emotions, such as joy and pride, can inspire people to reduce their consumption of plastic water bottles. To the best of our knowledge, no research, to our knowledge, has ever addressed how negative emotions can explain responsible behaviours.

Previous research confirms the association between ES and individual values. Values manifest lasting beliefs that one mode of behaviour is preferable to another. Stern, Dietz and Guagnano (1999)

suggest the natural environment would be a new value in contemporary societies. They suggest that individuals will, therefore, behave in an environmentally friendly manner if they understand their harmful consequences. Riis and Gundelach (1992) identified the evolution of generations, changes in the life cycle of individuals and periodic influences. Ultimately, these studies cannot prove a correlation between individual values and protective behaviour (Gärling *et al.*, 2003). Certain psychological mechanisms can block the spillover effect (Tørgersen and Ölender, 2003). As Schwartz (1977) explains, when the cost of behaviour modification is too significant for an individual, they will react with a post-rational defence. In this perspective, only collective action can solve environmental problems. An individual, on the other hand, will act according to social ethics and freedom of choice.

SOCIO-CENTRIC PERSPECTIVE

This approach groups work that advocates a global analysis of how individuals take the environment into account. The set of variables that can change collective behaviour are considered (Bagozzi, 1977; Shapiro, 1978). The need to effect social change to "promote, facilitate and ensure environmentally responsible behaviour" is highlighted (Le Gall, 2002). However, Le Gall (2002) emphasizes the absence of solutions for the implementation of a collective transition; the sustainable development movement. Furthermore, societal environmental awareness is the key to achieving more sustainable development. ForCorraliza (2001), environmental awareness emerges when certain actions based on values, beliefs and regulations try to reduce the negative impact of human activity on the environment. As stated by Grob (1995), to have environmental consciousness, emotions must be attached to the awareness that there are environmental issues, as they are often linked to people's behaviour. In this sense, certain feelings, such as shame about flying or guilt about polluting, are markers of the weight of collective opinion in individuals' behaviour. In this sense, Brennan and Binney, (2010, p.144) qualify shame "*as an emotion that individuals experience when other people who are significant to them become aware of their socially unacceptable behaviour*". For these authors, "*guilt and shame both carry messages about the moral consequences of one's action and "doing the right thing*".

Both approaches, egocentric and socio-centric, complement our understanding of ES. Certain aspects are specific to the individual; eco-responsible purchasing, intention to have a positive impact on the planet; whereas others express themselves through the group or awareness of human well-being, like feelings of shame or guilt. All these elements have led to updating the ES concept.

EXPLORATORY STUDY

To better appreciate the drivers of ES, 27 respondents were interviewed on how they think, feel and behave regarding the environmental impact of travelling by plane. The interviews were conducted using a guide divided into five themes: mobility and air activity, awareness of the ecological problem posed by air travel, individual reactions to this question, the conditions that would make it possible to change travel habits, and the relationship with ecology. The interviews lasted an average of 50 minutes each. The individuals were on average 46 years old.

RESULTS:

Environmental consciousness as defined by Diamantopoulos et al., (2003) have been founded in the interview: "*We close our eyes as usual. Ah-ah. It's terrible. But what I am saying is awful…no, no, well we think about it, yes. But if I already sort my trash… only buy*

local… and no more plastic… in a short distribution chain… without packaging… I don't use my car… I use a bike or public transport and that I only buy clothes that don't destroy the water and that…) (Interview-Extract1).

Eco-anxiety linked to climate change and the impact on humans and the planet emerged thought this phase : "*Not preoccupied… rather optimistic about the rise in consciousness, but worried that it won't spread globally. Some countries won't want because they aren't economically developed… We will have completely different opinions and politics. So, it will make the world even more differentiated*" (Group 1 Interview 4.)

Cold-glow feelings emerges from the interviews as a negative feelings related to the human impact on the environment. "*Um, no… honestly, I don't… well now I am starting to have a bad conscience, but seriously when I buy my plane ticket, I am not telling myself, "Oh no, I am polluting the planet!". I am starting. I am starting. I think flying is practical, its quick, but I don't like this method of transportation.*" (Group 1 _interview7).

The results revealed people's evolved ES. Based on the interviews, a three-dimensional construct was created. The three dimensions are environmental consciousness, eco-anxiety and cold-glow feelings. This last dimension is new compared to previous research.

MAIN STUDY

Methodology

Following the analysis of the responses obtained in Study 1, 5 experts generated 38 items associated with the 3 dimensions: environmental consciousness, eco-anxiety, and cold-glow feeling. A quantitative study with 231 respondents (made up of 153 women and 75 men) was performed to test the items and their nomological validity.

RESULTS

Principal component analysis (PCA) followed by Promax rotation allowed dimensionality examination and suggestions for item deletion. A three-factor solution with 11 items was the most appropriate solution based on a variety of common criteria: inspection of screen plot, interpretability, and eigenvalues greater than unity (D'Astous and Boujbel, 2007; Sung and Tinkham, 2005). The scale showed adequate convergent reliability and validity. All items had high factor loadings, and exceeded the cut-off point of 0.50 (Hair et al., 2009); reliability coefficients exceeded the cutoff standard of 0.70 (Murphy and Davidshofer, 2001); and AVEs were > 0.50 (Fornell and Larcker, 1981; Hair *et al.,* 2009) (see Table 1- in Appendix).

Conforming to Henseler *et al.,* (2016) guidelines, we used the suggested criteria for overall model fit and assessed each of the measurements and structural models. For the overall model, the SRMR value indicated an acceptable fit. The SRMR (0.090) was close to the recommended cut-off value suggested by Hu and Bentler (1999). Whalers et al. (2003), indicated that a relatively substantial amount of information is being considered at the measurement and structural levels.

The structural part of the model was subsequently studied. As stated in Figure 1, R^2 valuesare good, at 19% and 24%. All path coefficients prove statistically significant, with 'T' values greater than 2 and 95% confidence intervals that do not include zero.

Discussion - Conclusion:

This study made it possible to propose an updated definition of ES to: "*environmental awareness associated with negative feelings (cold glow, eco-anxiety) which accompanies the adoption of*
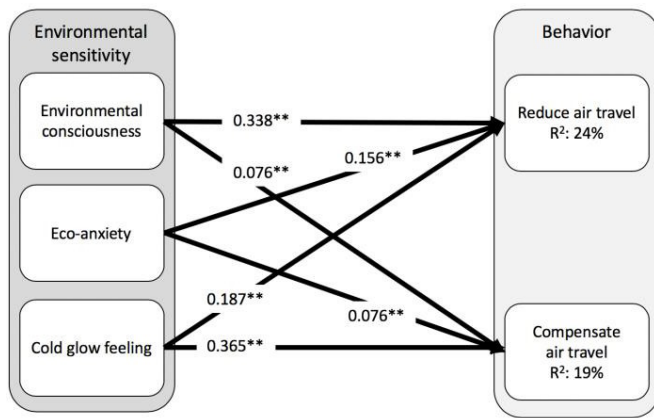
Figure 1: Conceptual Model

pro-environmental behaviour". The integration of Negative feelings like environmental shame, eco-anxiety, are increasingly present in environmentalists' discourse on ES. It is therefore important to integrate these notions into previous research on the subject (Kinnear *et al.,* 1974; Diamantopoulos *et al.,* 2003; Schlegelmilch *et al.,* 1997; Webster, 1975; Hartmann and Apaolaza, 2006). With regards to the environment, the results are consistent with psychology studies that have already made associations between feelings of shame and guilt. (Damasio, 1994; Abe, 2004). Also, facing the socio-centric aspect of these feelings, which is lacking in most ES measures, these feelings could be "*Associated with a clearly understood moral obligation towards others*" (Brennan and Binney, 2010, p.143).

When considering the application of the ES construct, this study exposed a history that was expressed differently when it had the intention of either reducing air travel or compensating carbon emissions. This theoretical contribution is a source of recommendations for the tourism sector. Airlines are recommended to base their communication campaigns on carbon offsetting around social interactions. For example, with the possibility for consumers to share that their trip is carbon neutral on social networks to reduce the guilt and shame of flying and increase social acceptance. For environmental organizations, eco-anxiety and the desire to have a positive impact on the planet are the levers to use to encourage using other modes of transport when possible.

On the methodological level, this study offers a current measurement of ES in 11 items and 3 dimensions, which makes it possible to better understand the behaviours with a history associated with the environment. To strengthen the validity of this scale, it would be interesting to apply it to phenomena other than Flygskam and to other cultures, such as Asian cultures, where saving face appears as an important motivation for consumption choices.

To conclude, both studies in this research are concerned with negative feelings (Damasio, 2003; Damasio, 1994; Brennan and Binney, 2010) associated with ES. In the case of flygscam, these studies have revealed two levels of commitment: the most advanced ecologists in terms of environmental consciousness will reduce their air travel, while individuals who experience cold glow warming (shame and guilt) will further reduce their carbon emissions in response to a likely cognitive dissonance.

Appendices Table 1.

Dimensions	Items (with p value 0,000)	Loading	Outer Weights	Cronbach's Alpha	Composite Reliability	Average Variance
Environnemental consciousness	I am trying to have a positive impact on the planet	0.861	0.406	0.816	0.868	0.569
	I do my best not to buy from companies that pollute	0.808	0.320			
	I always chose the product that has the least negative impact on the environment	0.776	0.247			
	I do what I can to protect the environment	0.755	0.265			
Eco-anxiety	Thinking about climate change scares me	0.832	0.266	0.836	0.891	0.672
	Thinking of climate change often worries me	0.866	0.318			
	I fear the end of the world (rising waters, extreme temperatures, etc.)	0.775	0.304			
	I think that our current way of life will kill us	0.801	0.335			
Cold-glow	The feel ing of guilt pushes me to change my behaviour	0.925	0.429	0.824	0.892	0.735
	I feel guilty for consuming earth's resources	0.894	0.450			
	I am ashamed of not taking daily action to reduce my environmental impact.	0.748	0.369			

KMO Index and Bartlett Test

Kaiser-Meyer-Olkin Index for measuring sampling quality.	,783

Bartlett's Sphericity Test	Chi-square approx.	1202,985
	ddl	55
	Significance	,000

Structure Matrix

	Components		
	1	2	3
Ecoanxiety3	,889		,445
Ecoanxiety1	,858	,158	,472
Ecoanxiety9	,760	,155	,428
Ecoanxiety5	,746	,111	,430
Envi.Con.2		,814	,149
Envi.Con.1	,239	,809	,139
Envi.Con.3		,795	,153
Envi.Con. 4	,177	,788	
ColdGlow Culp	,520	,189	,904
ColdGlow Coulp	,445	,292	,869
ColdGlow Shame	,453	-,112	,793

Extraction method: Principal component analysis. Rotation method: Promax with Kaiser normalisation.

REFERENCES

Abe, Jo Ann (2004) "Shame, Guilt, and Personality Judgment.," Journal of Research in Personality,

Bagozzi, R. P. (1977) "Is All Social Exchange Marketing?: A Reply.," Journal of the Academy of Marketing Science, 5 (3). Sage PublicationsSage CA: Thousand Oaks, CA, 315–326.

Brennan, Linda, and Wayne Binney (2010) "Fear, Guilt, and Shame Appeals in Social Marketing.," Journal of Business Research,

Damasio, Antonio R (1994 *Descartes' Error: Emotion, Rationality and the Human Brain*.Vol. 352. New York: Putnam

Damasio, Antonio R (2003 *Spinoza Avait Raison; Joie et Tristesse, Le Cerveau Des Émotions*. Vol. 318. Paris: Odile Jacob

Diamantopoulos, Adamantios, Bodo B Schlegelmilch, Rudolf R Sinkovics, and Greg M Bohlen (2003) "Can Socio-Demographics Still Play a Role in Profiling Green Consumers? A Review of the Evidence and an Empirical Investigation.," Journal of Business Research, 56 (6). Elsevier, 465–480.

Fisk, George (1973) "Criteria for a Theory of Responsible Consumption.," Journal of Marketing, 37 (2). SAGE PublicationsSage CA: Los Angeles, CA, 24–31.

Hartmann, Patrick, and Vanessa Apaolaza Ibáñez (2006) "Green Value Added.," Marketing Intelligence & Planning,

Hartmann, Patrick, Martin Eisend, Vanessa Apaolaza, and Clare D'Souza (2017) "Warm Glow vs. Altruistic Values: How Important Is Intrinsic Emotional Reward in Proenvironmental Behavior?," Journal of Environmental Psychology,

Kinnear, Thomas C., James R. Taylor, and Sadrudin A. Ahmed (1974) "Ecologically Concerned Consumers: Who Are They?," Journal of Marketing, 38 (2), 20.

Le Gall, Marine (2002) "De La Préoccupation Pour l'environnement à La Consommation Durable,." Actes Du 2e Congrès Sur Les Tendances Du Marketing En Europe ESCP-EAP, Université de Venise, Paris, 25–26

Menges, Roland, Carsten Schroeder, and Stefan Traub (2005) "Altruism, Warm Glow and the Willingness-to-Donate for Green Electricity: An Artefactual Field Experiment.," Environmental and Resource Economics,

Petkus, Ed (1992) "Implications of the Symbolic Interactionist Perspective For the Study of Environmentally-Responsible Consumption.," ACR North American Advances, NA-19

Schlegelmilch, Bodo B., Greg M. Bohlen, and Adamantios Diamantopoulos (1996) "The Link between Green Purchasing Decisions and Measures of Environmental Consciousness.," European Journal of Marketing,

Schlegelmilch, Bodo B., Alix Love, and Adamantios Diamantopoulos (1997) "Responses to Different Charity Appeals: The Impact of Donor Characteristics on the Amount of Donations.," European Journal of Marketing, 31 (8). MCB UP Ltd, 548–560.

Schwartz, Shalom H. (1977) "Normative Influences on Altruism.," Advances in Experimental Social Psychology, 10 (January). Academic Press, 221–279.

Shapiro, Stanley J. (1978) "Marketing in a Conserver Society.," Business Horizons, 21 (2), 3–13.

Solomon, Michael R. (1983) "The Role of Products as Social Stimuli: A Symbolic Interactionism Perspective.," Journal of Consumer Research, 10 (3). Oxford University Press, 319.

Webster, Jr., Frederick E. (1975) "Determining the Characteristics of the Socially Conscious Consumer.," Journal of Consumer Research

Understanding Consumer Activism in Digital Environments

Philipp K. Wegerer, MCI Management Center Innsbruck, Austria

INTRODUCTION

In the Austrian Alps, a conglomerate of regional corporations planned to connect two ski resorts in order to create the world's largest glacier ski destination. Just before local authorities approved the project, a local grass-root movement launched an online petition against the tourism infrastructure project. Within weeks, the more than 150.000 activists signed the petition. The resulting political pressure forced the project operators to abandon the project. We think that examining the success of this online petition through the concept of 'online publics' (Arvidsson and Caliandro, 2016) can be particularly useful for enhancing our understanding of consumer-activism in digital environments.

Consumer activism has become a key analytical concept within Consumer Culture Theory. The way in which consumers engage in activism has been studied in terms of consumer resistance (Penaloza and Price, 1993; Holt, 2002), anti-brand communities (Hollenbeck and Zinkhan, 2010) and consumer movements (Kozinetz and Handelsmann, 2004). While much emphasis has been placed upon understanding the communitarian aspects of consumer activism (e.g. Kozinetz and Handelmann, 2004, Hollenbeck and Zinkhan, 2010), as yet there has been little attention paid to understand the social formation that activists form in digital mediated environments. This study mobilizes the concept of 'online publics' as a theoretical framework for studying online consumer-activism. Online publics are discursive formations that are characterized by the absence of the communitarian characteristics, such as shared values and identities, and direct interaction (Arvidsson and Caliandro, 2016).

Employing a combination of netnography and discourse analysis, this study investigates why consumers engage in an online petition (www.meinaufstehen.at) against a large-scale tourism infrastructure project. An analysis of the comments posted on the petition website revealed that the activists form an online public that is mediated by a degrowth discourse. The findings suggest that online consumer-activism can be understood as a 'productive public' (Arvidsson and Peiterson, 2016) demanding environmental responsibility of regional economic actors. The study concludes with pointing out differences between online-activism publics and 'brand publics' (Arvidsson and Caliandro, 2016), as well as interpreting the findings in terms of a new 'ethical economy', in which "corporations depend ever more on collaborative peer judgements mediated via social media" (Arvidsson and Peiterson, 2016, p.13).

THEORETICAL BACKGROUND

Consumer activism and online publics

Social relations among consumers can take on different forms and typically differ in the nature of their internal organization. Social forms that have gained widespread recognition within consumer research are consumer tribes (Cova, Kozinets and Shankra, 2007), subcultures of consumption (Schouten and McAlexander, 1995), and brand communities (Muniz and O'Guinn, 2001). These concepts are community oriented and served as a theoretical background for the study of consumer activism, setting the research focus towards understanding the social bounds among activists, in terms of shared values, practices and identities (e.g. Hollenbeck and Zinkhsan, 2012, Kozinets and Handelmann 2004, Hollenbeck and Zinkhsan, 2012). In online environments, associations among consumers, being activists against or admires of a brand, were found to be "less structured and more fleeting and ephemeral", than community oriented concepts would imply (Alvesson and Caliandro, 2016). These publicity-driven forms of online consumer sociality, are characterized by the absence of tight social bounds among its participants, and have been conceptualized as 'online publics' (Alvesson and Caliandro, 2016). In the following, the example of the #metoo debate is used to highlight the peculiarities of online publics.

The #metoo debate represents an ideal typical example of an online public that forms around a social issue. Participants use the social media platform Twitter to share their private experiences and perspectives onto the issue of sexual harassment. The tweets connected through the hashtag #metoo can be understood as a mediated association among strangers that is directed towards the pursuit of a 'common thing' (Arvidsson and Peitersen, 2016). The hashtag #meetoo serves as a mediation device that links the individual contributions into a discursive formation. In contrast to the aforementioned communitarian forms of consumer activism such as anti-brand communities (Hollenbeck and Zinkham, 2006), or consumer movements (Kozinets and Handelman, 2004), the online public around the #metoo hashtag is characterised by the absence of direct communication among its participants. Tweets associated with the #metoo hashtag represent an accumulation of 'private affects' that trigger 'waves of imitations' (Arvidsson and Caliandro, 2016, p.728). A comment on Facebook, a post on Instagram, or a like or a share would be other examples for private affects. However, the individual tweets do not lead to an extensive discussion on the platform, since the majority of participants engages only once or twice in the public. Therefore, online publics represent assemblages of individual perspectives on a common issue, they form "an organized media space kept together by a continuity of practices of mediation that are centred on a mediation device" (Alvesson and Caliandro, 2016). In contrast to the aforementioned community type social formations (Muniz and O'Guinn, 2001; Luedicke, Thompson & Giesler, 2010), online publics are characterized by the absence of community markers such as deliberate interaction, a shared identity, and shared values (Arvidsson and Caliandro, 2016). Rather, an online public represents a temporal, discourse phenomenon that develops around a common theme.

Since online publics are a 'discursive formation' (Arvidsson and Caliandro, 2016), the aim of this research project is to understand the nature and function of discourse in sustaining and directing online publics. This research project is particularly interested in revealing which vocabularies, statements, concepts and ways of reasoning constitute online activism publics. We understand discourse as "a connected set of statements, concepts, terms and expressions which constitutes a way of talking and writing about a particular issue" (Watson, 1994, p.113). In particular, we are interested in examining the relationship between discourse as social text that is produced in the context of an online petition and discourses "in the sense of large-scale ordered, integrated way of reasing/ constituting the social world (Alvesson and Karremann 2000, p. 1125).

METHODOLOGY

This study develops a methodological approach that combines netnography (Kozinetz, 2015; Bartl et. al., 2016) and critical discourse analysis (Fairclough & Wodak, 1997; Cuarana and Cane, 2008). Our primary source of data were comments posted by participants of an online petition (www.meinaufstehen.at). We collected

a sample 492 posts. This data set represented a complete inventory count, when the petition reached 150.000 participants. The low ration between signers of the petition and comments posted is typical for affect-driven online publics (Arvidsson and Caliandro, 2016). After signing the petition via entering the name and confirming the signature via email, participants have the possibility to post a short comment in which they state their rational for signing the petition. Posts are typically one to three sentences long and provide one argument for signing the petition. Secondary data encompassed the monitoring and collection of online media coverage as well as an expert interview with the petition initiator. Data analysis encompassed an iterative process of inductive categorization (Kreiner, Hollensbe, and Sheep 2006; Spiggle 1994) and abstraction to derive major themes related to the petition. In a second step, we approach the data using a discourse analytical framework in order to identify subjects, objects and concepts, and how they relate to each other (Cuarana and Cane, 2008). The two authors coded independently, and reached final consensus and inter-coder reliability in extensive rounds of discussion (Arnold and Fischer 1994; Kreiner et al. 2006).

FINDINGS

This study provides a critical discourse analysis (Fairclough & Wodak, 1997) of comments posted by participants of an online petition against a large-scale infrastructure project. It was found that the participants form an online public that is centred around a degrowth discourse, that questions the endless-growth paradigm of capitalism. In the following we show how the individual posts are connected by a coherent sent of meanings.

Absence of a common opponent

The first discursive process we identified is, that the public is characterised by the *absence of a common opponent*. This finding is stark contrast to Kozinets and Handelman (2004) who state that "Social struggles and social movements must have an adversary against which to fight, if they want to be effective" (p.697). Instead of a common opponent in the form of an individual or a corporate brand, the public refers to an inhuman, powerful and destructive force. The comments ascribe agency to a not further specified 'elite', to 'the people in power', to 'the glacier ski-resort', to 'the Pitztaler', or simply 'the few'. Overall, the enemy is out of sight, unknown and faceless. The comments are characterized by the absence of personal names, the absence of direct capabilities, such as 'CEO', and the absence of specific organizations. E.g., the name of the concerned ski-resorts is more or less absent. If there is an opponent defined, it is seen as a very small group of insiders, an economic elite that is outside of direct touch for the public.

Since there is no direct or human opponent, the public does not criticise the infrastructure project or its proponents directly. Rather,

Table 1: Summary of Findings

THEME	EXAMPLE QUOTES
Absence of a common opponent	Because the madness never ends. Just because some people just can't get their necks full, to sacrifice our nature again and again and again is just unbelievable! This madness simply has to be stopped, where else is it going to lead? Such projects also find imitators very quickly and then???? (Angelica P. 1135) "It is time to stop this insane robbery of nature and to see ourselves as part of this world and not its consumers" (Stephan O. 936) "Pure greed of a few lunatics" (Karlheiz E. 405) Because they are only interested in profit. Not about environmental protection" (Siegfried G.)
Greed and Insanity as suspected causes	"because what is being planned here is simply madness... a crime against nature" (Claudia p. C 57) "Man has only megalomania and has calcified and is only destroying the wonderful nature, it is enough, slowly" (Manuela E. C.65). "This ski slope proliferation is simply madness" (Roswitha p.c.79) This greed for profit pisses me off!! Where is the respect for our beautiful nature! " (Gisela K. C.1140) "Nature conservation/climate protection must be in the foreground and NOT THE greed for even more money at the expense of nature!!!" (Rudolf S.)
Nature as an abstract object of protection	"Because, as an Upper Austrian, the protection of the Alps is also very important to me" (Roland S.) "Our environment needs protection." (Gabriel) "Nature conservation concerns us all" (Elfi T.) "The existing ski areas are sufficient. For the protection of nature"

comments were found to criticise the destruction of landscape, of glaciers, nature and the mountains in general terms. Or, a considerable amount of comments was found to question the endless-growth logic of the tourism industry and of capitalism in general. These findings suggests that the online petition serves as a trigger for a concerned public to collectively express their deep concern regarding the growth logic of capitalism and the perceived end-of growth in alpine tourism infrastructure.

Greed and insanity as suspected causes

One on the most significant pattern in the data was that the public suspected *greed* and *insanity* as the two central causes for the project. Due to the absence of a personified opponent, both drivers should not be misunderstood as character traits. Greed and insanity are seen as two systemic drivers of tourism policy in the region and capitalism in general. Greed and insanity were perhaps the most significant pattern in the data and played a key role in framing the entire discourse. Greed involved the construction of the enemies as being primary concerned with the unlimited accumulation of wealth on the expense of the public, nature and future generations. Terms used to describe greed were *greed, greedy, moneygrubbing, greed for profit, pure greed,* and *greedy entrepreneurs*.

The second key driver was *insanity*. Insanity appeared in various versions ranging from *insane*, to *insanity,* and *megalomania*, to more polemic notion such as *dementia, ludicrous, imbecility, manic* and *idiocy* and *bullshit*. Despite the partly accentuated terms, the statements appeared all in an objective, serious and respectable tone. Polemic, offensive, insulting or below the line comment were more or less non-existent. Since the enemy is an irrational, greedy and insane force, it appears, that the signers construct their subjectivity in opposition to the enemy, as being the rational, responsible and long-term oriented subjects.

Nature as an abstract object of protection

The public was found to be united around nature as the primary object of concern. Nature appeared in a number of abstract manifestations such as *landscape, glacier, mountains, mountain landscape, the Alps, and environment*. However, the majority of the comments sticked the abstract term *nature*. What is crucial for the understanding of the discursive formation is, that nature is seen in the dichotomy of *untouched* or *destroyed.* Hence, nature is seen as an *irretrievable entity* and a *holistic quality*, which is *untouched* and can only exist being untouched from human influences. This holistic understanding of nature leaves no space for the project group to develop other solutions, such as a downscaled project, or compensation activities.

The analysis reveals how the public defines appropriate behavioural patterns. The activists see themselves holding an *appropriate, long-term* and *altruistic* relationship to nature. The initiators are seen to hold a *short-term oriented* relationship to nature that is characterized by *profit-maximization* and *exploitation*.

The differences in terms of time scales were remarkable. The public was found to hold a very *long-term oriented* perspective. They regularly stressed their responsibility for *future generations*. Terms that appeared were *future generations, children* and *grandchildren*. The activists are advocates of the future. Their subjectivity is a manifestation of the *rational, long-term oriented* force. Their relation to nature is *protective* and *conserving*.

DISCUSSION AND CONCLUSIONS

This study finds that online activism represents a social formation that can be described in terms of an online public. The online public around the online petition platform shows many similarities with the original concept of 'brand publics' (Arvidsson and Caliandro, 2016). The posts represent a 'multitude of private perspectives' onto the infrastructure project with the aim of initiating 'waves of imitation'. The platform allows no interaction among the participants; its function is to 'mediate' the continuous flow of 'private perspectives'. The participants create 'publicity value' for the petition initiators. Beside these similarities between brand publics and online-activism publics, our analysis revealed two key differences between online-activism publics and 'brand publics' (Arvidsson and Caliandro, 2016).

First, brand publics are characterised by 'heterogeneous meanings', and the 'absence of collective values' (Arvidsson and Caliandro, 2016). Our case clearly departs from these two markers. The discourse analysis clearly shows how the individual comments share a connected set of meanings. The comments represent a connected set of statements, concepts, terms and expressions, which constitute the way the infrastructure project is seen. Overall, the comments mimic a post-modern degrowth discourse, that questions the endless-growth logic of capitalism. This implies that online publics can indeed share a collective set of values. In our case these values resonate around the protection of nature, and a shared rejection of mass-tourism and questioning the endless-growth logic of capitalism.

Second, we found that, similar to brand publics, the online petition gains publicity value "through harvesting a mass of temporal and small contributions" (Alvesson and Caliandro, 2016). The individual contributions aggregate to a powerful semiotic force (Tsoukas, 1999), a 'productive public' that creates 'reputation value' (Arvidsson and Peiterson, 2016). However, in contrast to brand publics, activists do not derive publicity value through their participation. The platform is serious about the anonymity of the signers; the name does not appear in public. The findings suggest that participants derive 'identity value' through participating in the online petition. Comments were united by a shared post-modern concern regarding the 'endless-growth logic' of capitalism. Signing the petition transforms consumers from concerned citizens into activists (Caruana and Crane, 2008). This does not mean that 'being a petition signer' or 'being an activist' is a major part of individual identity of the signers. Rather signing the petition, is similar to buying a bottle of organic milk, it represents an act of post-modern consumption that provides a valuable identity brick used for 'curating' a singularized consumer subjectivity (Reckwitz, 2020).

Finally, we suggest that this case can be understood as a manifestation of a new 'ethical economy', in which corporations need "to broadening their value horizons", and have to become "more sensitive to online sentiment in their operations" (Arvidsson and Peiterson, 2016, p.13). This new semiotic environment implies that corporations need to understand that "reputation functions as a kind of capital" (p.16), and consequently need to develop means for managing their 'ethical capital' as a strategic resource.

REFERENCES

Alvesson, Mats and Dan Karremann (2000), "Varieties of Discourse: On the Study of Organizations through Discourse Analysis," *Human Relations* 53(9), 1125-1149.

Arnold, Stephen J.and Eileen Fischer (1994), "Hermeneutics and Consumer Research," *Journal of Consumer Research*, 21 (1), 55-70.

Arvidsson, Adam & Alessandro Caliandro, (2016), "Brand Public," *Journal of Consumer Research*, 42, 727–748.

Arvidsson, Adam & Peiterson Nicolai (2016), The ethical economy: Rebuilding Value after the Crisis, New York: Columbia University Press.

Bartl, Michael, Vijai K. Kannan and Hanna Stockinger (2016), "A Review and Analysis of Literature on Netnography Research," *International Journal of Technology Marketing*, 11 (2), 165-96.

Caruana, Robert, & Andrew Crane, (2008). "Constructing Consumer Responsibility: Exploring the Role of Corporate Communications," *Organization Studies*, 29(12), 1495–1519.

Cova, Bernard (1997), "Community and Consumption: Towards a Theory of the Linking Value of Products and Services," European Journal of Marketing, 31 (3/4), 297-316

Cova, Bernard, Robert V. Kozinets, and Avi Shankar (2007), Consumer Tribes, Amsterdam, the Netherlands: Butterworth-Heinemann.

Fairclough, N (1993), "Critical Discourse Analysis and the marketization of public discourse," *Discourse and Society*, 4, 133-159.

Hollenbeck, Candice. R., & Zinkhan, Georg. M. (2006), "Consumer activism on the internet: The role of anti-brand communities," *NA Advances in Consumer Research*, 33, 479–485.

Holt, Douglas B. (2002), "Why Do Brands Cause Trouble? A Dialectical Theory of Consumer Culture and Branding,"*Journal of Consumer Research*, 29 (1), 70-90.

Izberk-Bilgin, Elif (2012), "Infidel Brands: Unveiling Alternative Meanings of Global Brands at the Nexus of Globalization, Consumer Culture, and Islamism," Journal of Consumer Research, 39(4), 663-87.

Kozinets, Robert V. (2015), Netnography: Redefined, London: Sage.

Kreiner, Glen E., Elaine C. Hollensbe, and Mathew L. Sheep, (2006), "Where Is the "Me" Among the "We"? Identity Work and the Search for Optimal Balance," Academy of Management Journal, 49 (5), 1031-57.

Luedicke, Marius, Craig J. Thompson, and Markus Giesler (2010), "Consumer Identity Work as Moral Protagonism," Journal of Consumer Research, 36 (April), 1016-32.

Lee, Michael (2007), "Brands We Love to Hate: An Exploration of Brand Avoidance," Dissertation, University of Auckland.

Micheletti, Michele, Andreas Føllesdal, and Dietlind Stolle, eds. (2004), *Politics, Products, and Markets: Exploring Political Consumerism Past and Present*, New Jersey: Transaction Publishers.

Muniz, Albert M. and Thomas C. O'Guinn (2001), "Brand community," Journal of Consumer Research, 27 (4), 412-32.

Penaloza, Lisa and Linda L. Price (1993), "Consumer Resistance: A Conceptual Overview," in *Advances in Consumer Research*, Vol. 20, ed. Leigh McAlister and Michael L. Rothschild, Provo, UT: Association for Consumer Research, 123-28.

Reckwitz, Andreas (2020), Die Gesellschaft der Singularitäten. Frankfurt, Suhrkamp.

Rose, Gillian. (2007). *Visual Methodologies: An Introduction to the Interpretation of Visual Materials*. Thousand Oaks: Sage Publications Ltd.

Schouten, John W. and James H. McAlexander (1995), "Subcultures of Consumption: An Ethnography of the New Bikers," *Journal of Consumer Research*, 22 (1), 43–61.

Spiggle, Susan (1994), "Analysis and interpretation of qualitative data in consumer research," *Journal of Consumer Research,* 21 (3), 491-503.

Watson, Thomas J. (1994). In search of management. London: Routledge.

Women Who Watch Porn: Market-Mediated Gendered Discourses and Consumption of Pornography

Maria Carolina Zanette, Neoma Business School, France
Athanasia Daskalopoulou, University of Liverpool, UK

INTRODUCTION

Institutional logics can be described as patterns that shape the social world (Friedland and Alford 1991; Thornton and Ocasio 2008). They provide a 'grammar' (Friedland and Arjaliès 2019) that organizes individual (Friedland et al. 2014) and market-level practices (Ertimur and Coskuner-Balli 2015; Rao, Monin and Durand 2003). Institutional logics influence how individuals consume particular objects (Zanette and Scaraboto 2019a). However, how objects are perceived and consumed can change over time through the agency of market actors, such as consumers (Dolbec and Fischer 2015; Scaraboto and Fischer 2013).

Friedland (2018) argues that the triadic relationship among institutional objects, practices, and the subjects that consume them is what materializes an institutional logic. Specifically, he defines institutional objects as a set of material, emotional, and practical arrangements that translate a logic into everyday practices (Friedland 2018). As a result, through these articulations, consumers are said to inhabit institutions.

Yet, previous literature has not sufficiently explored how consumers inhabit institutions whose institutional objects transmit controversial 'grammars' of practices. In particular, prior studies, with a few exceptions (Zhao and Wry 2016; Zanette and Scaraboto 2019b) have overlooked how institutional logics can be gendered, and how consumers relate to them (Thompson and Üstüner 2015). In this study, we, therefore, explore how consumers engage in the triadic relationship proposed by Friedland (2018). Specifically, we investigate a particularly gendered institutional object that is used by female consumers: pornography.

Pornography acts as a point of knowledge, power, and truth in which sexuality is specified and disciplined (Foucault 1990). It is an object infused with logics of eroticism (McCormack and Wignall 2017), but it has also been contested politically and academically over its role in reproducing patriarchal behaviors and aesthetics (Dworkin 1981; Smith 2007; Neville 2018). Historically, pornography has been created by men for men, and as a result prior studies argue that women tend to prefer other institutional objects such as erotica (Hardy 2001). However, recent research finds that women consume pornography frequently and use it to reach a state of pleasure (e.g. for sexual gratification) (Daskalopoulou and Zanette 2020). With that in mind, we explore how different market-mediated gender discourses affect how women use pornography.

Our contributions to the literature are twofold: first, we respond to past calls in the literature to understand how institutions are inhabited on an individual level (Friedland 2018; Friedland et al. 2014), focusing on the experiences of consumers. Second, we advance the literature in market-mediated gender discourses (Holt and Thompson 2004; Minowa, Maclaran and Stevens 2019; Thompson 1996; Thompson and Üstüner 2015) by enhancing our understanding of how recent feminist and sex-positive discourses impact consumption practices.

MARKET-MEDIATED FEMININITY DISCOURSES AND THE CONTROVERSY AROUND PORN

Marketplace enactments of women's roles in the consumption sphere represent the ways in which consumers understand femininity (Maclaran 2012). Market-mediated gendered discourses are rooted in the cultural production of objects (Scaraboto and Zanette 2020; Zanette and Scaraboto 2019b), advertising (Minowa et al. 2019; Pirani, Cappellini and Harman 2018), popular mass media and social media (Maclaran 2015; Zanette and Brito 2019). These discourses produce models (Holt and Thompson 2004) or 'grammars' that might affect how consumers engage with a particular institutional object. We describe two market-mediated gendered discourses relevant to pornography consumption and female sexuality: consciousness of the 'negative effects paradigm' (NEP) of pornography and sex-positivity.

We use McCormack and Wignall's (2017) NEP terminology to refer to a pool of criticisms that highlight negative attitudinal and behavioral consequences of pornography. Under NEP, anti-porn feminists have claimed that pornography as a genre and as an industry promotes female oppression and sexual aggressiveness towards women (Dworkin 1981; MacKinnon 1993). The anti-porn rhetoric was popularized during the so-called 'sex-wars' - public and publicized debates that took place in the United States in the '70s and early '80s (Ciclitira 2004). Such criticisms have lost prominence in contemporary debates over porn and a plethora of studies have called for more research on the role of pornography on sexual identity and sexual practices beyond NEP (Attwood 2002; Comella and Tarrant 2015).

However, the production of cultural materials such as the documentary 'Hot Girls Wanted' or the emergence of fan-based, alternative forms of producing erotic materials for women (Neville 2018) indicate a revival of the debate around the consequences of pornography. This revival occurs at a time when political consciousness and (online) activism characterize what has been recently called feminism's fourth wave. According to Maclaran (2015) feminism is having a 'come-back' in popular culture in a mostly social media-based form of engagement that sustains a dubious relationship with commercial and marketing symbols. Examples of fourth wave feminism range from a renewed understanding of controversial markets as empowering for women, such as pole-dancing and sex toy shopping (Maclaran 2015) to grassroots feminist organizing such as the #freethenipple campaign that addresses the sexualization and censorship of women's breasts (Matich, Ashman and Parsons 2018). Women's engagement in social-media activities that highlight the treatment of women's bodies and sexuality by misogynistic mechanisms of patriarchal reinforcement (Manne 2018) has fostered a new activist-consciousness about NEP – not necessarily associating pornography with violence towards women, but still raising awareness about its consequences.

A second discourse relevant to porn consumption is sex-positivity. In the past decades, sexuality has emerged as an important factor defining the 'new femininity' of the end of the 20th century (Glick 2000). As the focus of feminist movements moved from the collective struggle for political and economic rights in the public sphere to identity-related themes such as gender, race, and the body (Bordo 2004; Butler 1990; Crenshaw 1989), women's relationships with their bodies also became a site of gender politics. In this sense, under the umbrella of identity politics, sex-positivity emerged as a type of empowered eroticism (Attwood 2007; Glick 2000), whose discourse affirms that openness about one's bodily pleasures and sexual practices is empowering per se. This discourse of femininity

has been picked up by marketers and translated into the 'girl power' figure (Munford and Roberts 2014), of which Carrie Bradshaw is an example. It also opened avenues for other types of cultural production targeted at women, such as explicit magazines (Smith 2007) and sex toys (Piha et al. 2018; Walther and Schouten 2016; Wilner and Dinnin Huff 2017).

Despite the popularity of sex-positivity, porn consumption can be a source of contradictory feelings for women (Daskalopoulou and Zanette 2020), especially for those who consider themselves feminists (Ciclitira 2004). As women understand that some aspects of the genre are problematic, they often employ strategies to negotiate complex feelings about porn (Ashton, McDonald and Kirkman 2018; Chadwick et al. 2018). For example, in order to cope with these contradictions many women choose to consume feminist pornography, which is committed to intersectional feminism politically and aesthetically (Taormino 2013). However, we still lack a detailed account of how the 'negative effects paradigm' (NEP) of pornography and sex-positivity discourses influence the relationship with the institutional object of porn.

METHOD

We conducted 27 in-depth interviews (Denzin 2001) with women, aged between 20 and 48 years old (mean age 29), with both exclusive and non-exclusive sexual orientations. We used purposeful and snowballing sampling (Patton 2002) to select women who both consumed pornography and were willing to share their experiences with us. The semi-structured (McCracken 1988) interviews lasted up to 78 minutes, with the average interview lasting 50 minutes. Our analysis followed an interpretivist, modified grounded theory approach (Charmaz 2014). Both authors analyzed the interview data: initially, the interview transcripts were coded independently, and then emerging codes were discussed and developed conjointly.

FINDINGS

Our findings (summarized in table 1) are structured around exemplary cases and portray how the two different market-mediated gender discourses affect the consumption of pornography.

Detaching pornography from gendered discourses: Cecilia and porn as pleasure

The exemplary case of Cecilia illustrates consumers whose relationship with pornography is not influenced by gendered discourses. Her relationship with pornography reflects her interest in *her* pleasure, education, and sexuality.

Her practices of watching pornography derive from curiosity about her pleasure, focusing on her expectations and sexual enactments. In that sense, her usage of pornography relates considerably with what McCormack and Wignall (2017) have described for male consumption of pornography: an exploration of desire and fantasy.

Nevertheless, she has had contact with materials that criticize the porn industry. She acknowledges, for example, a documentary she watched on Netflix dealing with certain stories and abuses that have happened in the porn industry. However, when she engages critically with pornography, her comments tend to revolve around her identification with the material and her personal taste. As such, her consumption is individualized, and she does not contest the object per se or the industry that produces it. Ellie exemplifies an entirely different case, which is analyzed below.

Further de-legitimizing porn: Ellie and porn as oppression

Unlike Cecilia, Ellie's relationship with pornography has been fraught with different conflicts, leading to a different form of engagement with the institutional object, which is repurposed, or directly rejected.

Ellie, in her personal experiences, started reflecting upon and being more critical of the consumption of pornography due to a past relationship whose sexual acts were similar to what she understands as 'porn'. For Ellie pornography is sex depicted without a 'human' (emic term) representation.

Furthermore, she considers herself someone who has invested a lot of time reading about pornography, and she points its harmful effects as a means of sexual education, reproducing sexist values in how people act out their sexuality. As a consequence, she has disengaged from pornography and engaged with a different institutional object connected to her sexuality: erotica. In her view, erotica is defined not by the explicitness of the genre, but by the contact and humanization of the sexual relationship it depicts.

Repurposing porn: Peppa and porn as empowerment

Peppa shows a high level of engagement with the sex-positivity discourse. For her, watching pornography, masturbating, and talking openly about pornography, especially in front of the opposite sex, is in itself an empowering act.

When prompted about the role of pornography in her life, Peppa, like Cecilia, described how pornography helped her understand the different aspects of her sexuality that she could enjoy. She explains how pornography has enabled her to be confident in her sexual interactions. For her, pornography, by depicting sex not necessarily partnered with emotional engagement, helps her to see an alternative conceptualization of sex as pure pleasure.

According to the type of pornography she watches, we found that the dialogues Peppa sustains with her friends – especially from the opposite sex – help her to normalize what Ellie and Cecilia view as violent or submissive practices. By looking at the object through a sex-positivity lens, and discussing her views with different people, what could be considered harmful, oppressive, or submissive becomes acceptable as a form of fantasy.

Changing porn: Valerie and feminist porn

Finally, our last exemplary interviewee is Valerie, who openly advocates changes concerning the institutional object. Like Peppa, Valerie likes to talk about pornography with her friends, even to exchange materials. However, she currently considers it problematic. The fact that it is male dominated, as she and the other interviewees refer to it, makes her 'confused' about the fact that women also tend to like pornography.

However, instead of giving up on watching pornography, Valerie's solution was to subscribe to a different type of pornography made by women for women. She says that this type of pornography deals with issues such as the wellbeing of actors, consent, and protection, which erases her concerns about 'disturbing' materials. She mentions, for example, that she is interested in the process of mediation between the actors before shooting different scenes, regardless of the types of sexual practices that are depicted. In that sense, the sexual practice depicted in the video itself, for her, qualifies as fantasy. Once there are mechanisms that inhibit exploitation, different kinks can be viewed positively and not as mechanisms that foster the oppression and exploitation of women.

DISCUSSION AND CONCLUSIONS

Our work departs from the idea that consumers inhabit institutions differently depending on their interaction with market-mediated gendered discourses (Holt and Thompson 2004; Thompson and Üstüner 2015) when confronted with an institutional object infused

TABLE 1

How consumers interact with the institutional object	Consumer	Engagement with market-mediated gendered discourses	Excerpt
Detaching pornography from gendered discourses: consumers in this case interact with pornography searching for pleasure, leisure, and sexual education. Gendered discourses are acknowledged, but do not affect the consumer's relationship with it	Cecilia	Low level of engagement with both discourses	*"Then I started watching bizarre things, because I was curious. I said: Hey! It's a lot of things... when you think you do crazy things; you see that there are completely different things. But I also remember ... what did I start to see? I remember that once I saw... I wanted to watch amateur videos to see the time women take to come, because I had doubts about that. Because [...] I had relationships that I think I never had an orgasm during penetration, and I was: 'Hey! It's not possible, how does it work ... what do they do?'"*.
Further de-legitimizing porn: consumers avoid interacting with the object, rejecting its patriarchal nature. For these consumers, pornography as an institutional object is infused with aggression towards women, lack of affection, and misrepresents "real" sexual relations	Ellie	Low level of engagement with sex-positivity and high level of engagement with consciousness of NEP	*"[In porn, sex] is an object who plays a role and that's it, but I think the problem is that when you watch that kind of content you are not aware that in some way, on some level, something is influencing you ... because you're starting to see sex just in that sense ... as porn, not sex that usually people are having in their houses, which is not me with two big boobs, screaming or I don't know. That's the difference. And you want probably the kind of beautiful man with a big cock that you see in the movie, with marvelous gestures that make you scream. I think this is the difference, because it's so different from reality and the issue of submission for me is pretty important today."*
Repurposing porn: consumers who repurpose porn use the intimate nature of the object to openly talk about sex and position themselves through porn as women who are engaged in sex-positive practices. Openly watching pornography, in this case, becomes a statement of empowerment.	Peppa	High level of engagement with sex positivity and low level of engagement with consciousness of NEP	*"I think, I found speaking to people about it, if it comes up in silly conversations when you've had a couple of drinks and people talk about it, or people make a joke about it."*
Changing porn: consumers support new initiatives by different institutional actors who try to change the porn industry to overcome the patriarchal nature of the institutional object, such as subscribing to websites of feminist porn directors.	Valerie	High level of engagement with both discourses	*"I was making a subscription for Erica Lust's website. I enjoy her and, it's the first name that comes across when you look for alternative porn, or maybe called feminist porn. So, I was mostly looking through websites that speak about this subject, and then looking for the names that pop up... so Erica Lust, because she as well has guests as directors, so there's a wide variety of things, rather than just one style or one kink... and I came to the conclusion that I pay for many different things and porn is something I enjoy, so I could throw some 9$ a month to access a product that I know I will enjoy... not all the shots, but generally it's nice and there are interviews with the actors, and they're gonna get paid at the end of the day, it's their job, it's entertainment, and yes, I would rather consume that kind of product than some random clips that I don't know where they've been shot. Another thing that I find problematic for me is that it's impossible to know who these people are, unless they are professionals, there's normally no information available because there's lots of exploitation, I don't feel really comfortable watching clips of someone who has been exploited, and if I have no way of knowing"*.

with patriarchal logics (Zhao and Wry 2016). As the object itself does not provide a 'grammar' of practices for consumers, they engage in different strategies to learn how to use it. As such, the subject-practices-institutional objects triad provokes different forms of engagement with the object (Friedland, 2018): ignoring the market-mediated discourses, rejecting the usage of the institutional object, repurposing the object, or engaging with new objects that defy the patriarchal logics.

We also found that due to NEP consumers associate the plots and aesthetics of porn with industry scandals and societal consequences. Interviewees mainly focused on how women in pornography look oppressed or appear to be 'suffering' during sexual acts. Both NEP and sex-positivity discourses promote contradictory messages about pornography. On the one hand, activist-consciousness still spreads the idea that pornography fosters violence towards women (Dworkin 1981), for example we found this on Ellie's understanding. On the other hand, sex-positive discourses (Glick 2000; Walther and Schouten 2016) encourage women to understand their sexuality – sexual fantasies, kinks, and self-pleasure – as something that is empowering. Pornography has its place within this discourse as a tool for self-discovery and sexual education, if not as a resistant performativity of female sexuality. As our findings show, these contradictions affect the 'grammar' of practices with which women use pornography, producing different conflicts, emotions and coping mechanisms to justify using porn.

Our informants have expressed different preferences about pornography, ranging from more 'soft' or romantic videos to specific 'kinks'. Pornography, as an institutional object that is mostly framed for a male audience, does not provide a 'script' for solving the conflict between the apparent (and sometimes real) exploitation of actors and the pleasure derived by engaging with fantasies and kinks. As such, even though women may use it for their sexual desire and education (Attwood et al. 2018), pornography, with its confusing 'grammar' of practices, becomes a blurry, ambivalent object with which women interact for pleasure. However, as Rao et al. (2003) have shown, when activism enters the subject-institutional objects-practices triad, it can foster changes to a particular institutional object, creating, in turn, further changes in the institutional logics of a field. Our findings show that as market-mediated gendered discourses foster conversations around porn consumption, new forms of portraying and enacting sex and sexuality might gain space to emerge.

REFERENCES

Ashton S., K. McDonald, and M. Kirkman (2018). "Women's Experiences of Pornography: A Systematic Review of Research Using Qualitative Methods". *The Journal of Sex Research,* 55(3), 334-347.

Attwood F. (2002). "Reading Porn: The Paradigm Shift in Pornography Research". *Sexualities*, 5(1), 91-105.

_____ (2007). "No Money Shot? Commerce, Pornography and New Sex Taste Cultures". *Sexualities,* 10(4), 441-456.

Attwood F., C. Smith and M. Barker (2018). "I'm Just Curious and Still Exploring Myself': Young People and Pornography", *New Media & Society*, 20(10), 3738-3759.

Bordo S. (2004*). "Unbearable Weight*: Feminism, Western Culture, and the Body". Berkeley, CA: University of California Press.

Butler J. (1990). "*Gender Trouble:* Feminism and the Subversion of Identity". New York: Routledge.

Chadwick S.B., J.C. Raisanen, K.L. Goldey, S. van Anders (2018). "Strategizing to Make Pornography Worthwhile: A Qualitative Exploration of Women's Agentic Engagement with Sexual Media". *Archives of Sexual Behavior,* 47(6), 1853-1868.

Charmaz K. (2014). "*Constructing Grounded Theory*". London: SAGE.

Ciclitira K. (2004). "Pornography, Women and Feminism: Between Pleasure and Politics". *Sexualities,* 7(3), 281-301.

Comella L. and S. Tarrant (2015). "*New Views on Pornography*". Oxford: Praeger.

Crenshaw K. (1997). "Intersectionality and Identity Politics: Learning from Violence Against Women of Color", in *Reconstructing Political Theory*, Mary L. Shanley and U. Narayan (eds), University Park: The Pennsylvania State University Press, 178-193.

Daskalopoulou A. and M.C. Zanette (2020). "Women's Consumption of Pornography: Pleasure, Contestation, and Empowerment". *Sociology*, DOI: 10.1177/0038038520918847.

Denzin N. D. (2001). "The Reflexive Interview and a Performative Social Science". *Qualitative Research*, 1(1), 23-46.

Dolbec, P. and E. Fischer (2015). "Refashioning a Field? Connected Consumers and Institutional Dynamics in Markets". *Journal of Consumer Research*, 41(6), 1447-1468.

Dworkin A. (1981). "*Pornography: Men Possessing Women*", New York: Perigee.

Ertimur B. and C.G. Gokcen (2015). "Navigating the Institutional Logics of Markets: Implications for Strategic Brand Management". *Journal of Marketing*, 79(2), 40-61.

Foucault M. (1990). "*The History of Sexuality: An Introduction*". New York: Vintage.

Friedland R. (2018). "Moving Institutional Logics Forward: Emotion and Meaningful material Practice". *Organization Studies*, 39(4), 515-542.

Friedland R. and R.R. Alford (1991). "Bringing Society Back in: Symbols, Practices, and Institutional Contradictions" in *The New Institutionalism in Organizational Analysis*, Powell, Walter W., and Paul J. DiMaggio (eds), 232-263.

Friedland R. and D. Arjaliès (2019). "Institutional Logics: Out or In?" Available at SSRN: http://dx.doi.org/10.2139/ssrn.3403131.

Friedland R., J.W. Mohr, H. Roose and P. Gardinali (2014). "The Institutional Logics of Love: Measuring Intimate Life". *Theory and Society*, 43(3-4), 333-370.

Glick E. (2000). "Sex Positive: Feminism, Queer Theory, and the Politics of Transgression". *Feminist Review*, 64(1), 19-45.

Hardy S. (2001). "More black lace: Women, Eroticism and Subjecthood". *Sexualities*, 4(4), 435-453.

Holt D.B. and C.J. Thompson (2004). "Man-of-Action Heroes: The Pursuit of Heroic Masculinity in Everyday Consumption". *Journal of Consumer Research*, 31(2), 425-440.

Maclaran P. (2012). "Marketing and Feminism in Historic Perspective". *Journal of Historical Research in Marketing*, 4(3), 462-469.

Maclaran P. (2015). "Feminism's Fourth Wave: a Research Agenda for Marketing and Consumer Research". *Journal of Marketing Management*, 31(15-16), 1732-1738.

MacKinnon C.A. (1993). "*Only Words*". Cambridge, MA: Harvard University Press.

Manne K. (2018), "*Down Girl: The logic of mysogyny*". New York: Oxford University Press.

Matich M., R. Ashman and E. Parsons (2019). "#freethenipple Digital activism and embodiment in the contemporary feminist movement". *Consumption Markets & Culture*, 22(4): 337-362.

McCormack, M. and L. Wignall (2017). "Enjoyment, Exploration and Education: Understanding the Consumption of Pornography among Young Men with Non-Exclusive Sexual Orientations". *Sociology*, 51(5), 975-991.

McCracken G. (1988). "*The Long Interview*". London, UK: Sage.

Minowa Y., P. Maclaran and L. Stevens (2019). "The Femme Fatale in Vogue: Femininity Ideologies in Fin- de-siècle America". *Journal of Macromarketing*, 39(3), 270-286.

Munford R. and M.M. Waters (2013). "*Feminism and Popular Culture*: Investigating the Postfeminist Mystique". London: I.B. Tauris.

Neville L. (2018). "*Girls who Like Boys who like Boys*: Women and Gay Male Pornography and Erotica". Gewerbestrasse, Switzerland: Springer.

Patton M.Q. (2002). "*Qualitative Research & Evaluation Methods*". London: Sage.

Piha S., L. Hurmerinta, B. Sandberg and E. Järvinen (2018). "From filthy to healthy and beyond: finding the boundaries of taboo destruction in sex toy buying". *Journal of Marketing Management*, 34(13-14): 1078-1104.

Pirani, D., B. Cappellini and V. Harman (2018). "The Italian breakfast: Mulino Bianco and the advent of a family practice (1971-1995)". *European Journal of Marketing*, 52(12), 2478-2498.

Rao H., P. Monin and R. Durand (2003). "Institutional change in Toque Ville: Nouvelle Cuisine as an Identity Movement in French Gastronomy". *American Journal of Sociology*, 108(4), 795-843.

Scaraboto, D. and E. Fischer (2013). "Frustrated Fatshionistas: An Institutional Theory Perspective on Consumer Quests for Greater Choice in Mainstream Markets". *Journal of Consumer Research*, 39(6), 1234-1257.

Scaraboto, D. and M.C. Zanette (2020). "'Shapewear or nothing to wear' The ambiguity of shapewear in the plus-size fashion market". In *Women, Consumption and Paradox*, Timothy de Waal Malefyt, Maryann McCabe (eds). Oxton, UK and New York, USA: Routledge.

Smith C. (2007). "*One for the Girls*!: The Pleasures and Practices of Reading Women". Bristol, UK: Intellect Books.

Taormino T. (2013). "Calling the Shots: Feminist Porn in Theory and Practice". In: Taormino T, Parreñas Shimizu C, Penley C, Miller-Young M (eds) *The Feminist Porn Book*. New York: The Feminist Press, 255-264.

Thompson C. J. (1996). "Caring Consumers: Gendered Consumption Meanings and the Juggling Lifestyle". *Journal of Consumer Research*, 22(4), 388-407.

Thompson C. J. and T. Üstüner (2015). "Women Skating on the Edge: Marketplace Performances as Ideological Edgework", *Journal of Consumer Research*, 42(2), 235-265.

Thornton P.H. and W. Ocasio (2008). "Institutional logics". *The Sage Handbook of Organizational Institutionalism*, 840, 99-128.

Walther L. and J.W. Schouten (2016) "Next Stop, Pleasure Town: Identity Transformation and Women's Erotic Consumption". *Journal of Business Research*, 69(1), 273-283.

Wilner S.J.S. and A. Dinnin Huff (2017). "Objects of desire: the role of product design in revising contested cultural meanings". *Journal of Marketing Management*, 33(3-4): 244-271.

Zanette M.C. and E.P.Z. Brito (2019). "Fashionable subjects and complicity resistance: power, subjectification, and bounded resistance in the context of plus- size consumers". *Consumption Markets & Culture*, 22:4, 363-382.

Zanette, M.C. and D. Scaraboto (2019a). "To Spanx or not to Spanx: How Objects that Carry Contradictory Institutional Logics Trigger Identity Conflict for Consumers". *Journal of Business Research*, 105 (December): 443-453.

Zanette, M.C. and D. Scaraboto (2019b). "From the Corset to Spanx: Shapewear as a Marketplace Icon". *Consumption Markets & Culture* 22(2), 183-199.

Zhao E.Y. and T. Wry (2016) "Not all Inequality is Equal: Deconstructing the Societal Logic of Patriarchy to Understand Microfinance Lending to Women". *Academy of Management Journal*, 59(6), 1994-2020.

Beyond the Westernized Body: Constructing the Ideal Female Body Through Paradoxical Paradigms

Hela Zouaoui, Université de Tunis, Tunisia
Fatma Smaoui, Université de Tunis, Tunisia
Russell W. Belk, York University, Toronto, Canada

INTRODUCTION

Beauty has been recognized as a site of struggle over gender, race, social class and body. Formed, recycled and reproduced through the narratives and images of the body, the portrayed female imaginary is influenced by a number of social values and stereotypes (Salesses and Romain 2014). This is especially true in a contemporary economy characterized by a global capitalism. Here we find beauty hierarchies intertwined with ethnic and class inequalities.

Although the first decades of the 21st century have been proved a time of paradoxes (Jha 2007, 2015), contemporary society is still characterized by an aesthetic canon of female corporeity that has long propagated Euro-American norms and ideologies of sexuality, thinness and leanness discourses (Ponterotto 2016). These norms have largely triumphed over cultural ideologies with different ancestral beauty ideas (Banet-Weiser 1999). New consumer dynamics have challenged the promoted female body depicted as "only thin" (Scaraboto and Fischer 2013; Zanette and Brito 2018) and opened room for a more inclusive and multi-cultural model of the female body. The binary body imaginary translating ideal/rejected encoding distinctions into thin/large weight conditions is thus replaced by a "hybrid" socially and culturally constructed imaginary that broadens the channel of negotiations between more than two (opposite) entities (Bhabha 1994).

Today, transnational consumer culture seems to increasingly question the conventional body imaginary once again (Salesses and Romain 2014), from outside of the Western sphere. The myth of Westernized beauty is being challenged as not wholly oppressive once recontextualized in a particular culture (Wilk 1995). Several Latin American and African studies have contested the Euro-American norm of thinness with a preference for curvier bodies (Viladrich et al., 2009; Toselli, Natascia and Emanuela 2016). This research examines the subjectivity of constructing an ideal body in non-western contexts. In the Tunisian cultural context where traditional conservative Islamic and neoliberal liberated Western lifestyles co-exist (Hirschman and Touzani 2011), beauty ideals involve a combination of both Western and Eastern attributes (Feki et al., 2018). We join the growing conversation that acknowledges the co-existence of contradictory body ideals challenging the Euro-American paradigm and championing curvier body types (Viladrichet al., 2009; Serrano-Barquín and Serrano-Barquín 2016).

CONCEPTUAL FRAMEWORK

The body is both material and symbolic. It has been idealized and stylized since ancient times. In the late nineteenth century, a curvaceous large sized female body was favored and depicted as an indicator of fertility, desirability and sexuality (Almond 2015). Moreover, it was considered as a sign of health, endurance, wealth and a reflection of a higher social position (Brown and Konner 1987; Vigarello 2013). However, new interpretations of beauty, aesthetics and shapes occur over time as a result of complex interactions between symbolic and social imaginaries. Contemporary dominant social and cultural imaginaries reject the ancestral idea of voluptuous body as an ideal and replace it with a white, thin and heterosexual subject for females. As for males, ideal bodies were always imagined as "hunky": muscled ones testifying of male power, strength and superiority (Caldas-Coulthard and Moon 2010). Resulting inequalities have generated counter-ideologies (Scaraboto and Fischer 2013). By promoting a single dominant ideal female body, perceptions and descriptions of corporelity consider thinness as a normative condition and non-thinness as a deficit, drawing heavily on health discourses (Zanette and Brito 2018). Women became thus obliged to regulate their bodies accordingly.One result is a process of rationalized management interweaving individual self-control and several social constraints (Featherstone, 2016; Scaraboto and Fischer 2013).

The promoted canonical female body depicted as young, fit, unwrinkled, and especially thin is however very far from the natural human body whose genetic variety leads to different corporal forms. Moreover, it ignores the inevitable changes occurring across the life cycle as the body becomes older, lumpier, saggier, and more wrinkled (Ponterotto 2016). With the absence of representative body ideals for plump oversized women with other different shapes face negative consequences (Swami et al., 2012). New consumer dynamics to empower marginalized women and reposition them as active agents seek to make room for a more inclusive and multi-cultural beauty and body ideal (Zanette and Brito 2018). As a resistive reaction, plus size consumers have challenged the aesthetic canon of female corporeity with its dominant discourse of leanness (Ponterotto 2016). It seeks to create room for a "beauty in all size" model celebrating curves for females worldwide. Recently health and fitness ideologies have sought to supplant beauty as the ultimate goal of body management (Rashid 2019). The contemporary body project is depicted as the "the athletic ideal" characterized at the same time with low body fat and thin waistlines, along with abdominal muscles and well-rounded curves (Ferguson et al., 2020). This ideal is carefully crafted and constructed through consumption practices of healthiness, fitness, dieting and sports (Viotto, Zanette and Brito 2020).

The myth of Westernized body imaginary is also challenged culturally (Bhabha 1994). Research on beauty contests suggests a preference for curvier body types (Viladrichet al., 2009). In sub-Saharan Africa, such bodies are seen as a sign of female beauty and fertility (Mokhtar et al., 2001). Fuller bodies are also linked to prosperity and wealth since only those with greater economic capital can afford to eat and gain weight (Bush et al., 2001). Cultural acculturation and enculturation have a strong effect on weight status and perceptions of body size (Toselli et al., 2016). Since slimness is a Western ideal, the fear of fatness is believed is more likely among those with greater exposure to Western culture (Soh et al., 2008). Thinness aspirations also relate to modernity aspirations, but only when modernity is equated with Westerness (Gaonkar 2001).

In Tunisia, the beauty model swings between Western and Eastern ideals (Feki et al., 2018; Khalaf and Gagnon 2014). Traditional fattening techniques aim to achieve the traditional aesthetic ideal of dramatic weight gain and a corpulent body (Salamon and Juhasz 2011), while transformative processes promoting a Western ideal of thinness (Tlili et al., 2008) through dieting and sports practices backed by the healthiness and leanness discourses (Zanette and Brito 2018). The bodily imaginary has become an arena of conscious design, molded and altered by the power discourses contesting. Thus our research question is how this battle of paradoxical paradigms for the female body unfolds in the Tunisian context.

METHODOLOGY

This paper presents the preliminary results of an ongoing research project investigating the evolving ideal body imaginary as reproduced and recycled at individual, social and global levels. We conducted qualitative research relying on in-depth interviews with Tunisians of varying gender, age, previous/current body size and attitudes toward various body shapes. As the body is still considered a taboo subject in the Tunisian cultural context, we relied on open-ended questions and projective techniques. We collected data in Tunisian dialect, Arabic, French and English to make sure interviewees were at ease. Most interviews were audio recorded and transcribed and notes were also taken.

Because we are investigating the current ideal body shape, we relied on visual methods to collect our data as well. Interviews used associative methods (describing the shape through associating it with a particular image/celebrity) and respondent-generated visual data (Prosser and Loxley 2008) through sketching and drawings of the ideal/curvy body shapes. Because some participants feared having poor sketching skills, we sometimes used photographs and shape scales from previous academic works (Viladrich et al., 2009) to help identify the ideal shape. We used an integrated approach involving both visual and word-based data. These research methods helped us to explore the multiplicity and complexity of ideal female body shapes.

Data was collected, analyzed and interpreted following an abductive approach. This involved combined work over two years of back and forth between literature and the field. Besides focusing on idealized female body shape, we investigated the process of constructing personal as well as social ideals and perceptions of global differences.

FINDINGS & DISCUSSION

Our findings (see table1) demonstrate that constructing the female body imaginary displays a multilayered complexity. Identifying the female body ideal was challenging given the subjectivity of beauty and bodily ideals. Although there was no consensus in terms of body size, participants agree about several characteristics when it comes to body shape. Both females and males reject and stigmatize the extreme figures of thin/large bodies and attribute negative connotations to them (see figure 1). The more a "normal" size is approached, the more words became descriptive, neutral and positive. All participants agree that the ideal female shape should be curvy, and that this ideal is more about having "generous curves" emphasized by a tight skin regardless of the related size. An ideal (curvy) female body shape should highlight femininity and sexuality and could swing between both thin/large sized shapes within the bounds of a scope (see Figure). Although most male participants link having curves to sexuality, and sexuality to ideal body image, shapes that float within the scope identified are constructed differently by women. Females with extreme figures -being either too thin and too fat – were extremely uncomfortable with their body image and aspired to have curves through specific body parts and engage in dieting and exercising techniques with these goals in mind.

The ideal female body is considered to be "curvy"; however, this brings many controversies into the conversation about body imaginary. The paradoxical simultaneous presence of global corporal ideals and the curvy shape challenges the binary nature of perceptions of female bodies and broadens the conversation around constructing ideal body imaginary as an evolving and dynamic concept (Serrano-Barquín and Serrano-Barquín 2016).

Curves are thus seen as a site of unification displaying two different (paradoxical) kinds of femininity and beauty, a contest and negotiation between local and global body imaginary discourses. Having curves evokes and reinforces the cultural pride of the voluptuous and sexy (Viladrich et al., 2009). At the same time, it invokes a cosmopolitan vision of Tunisian femininity that adheres to global beauty standards of sexuality, leanness and youth. Thus, the cultural dialogue surrounding the ideal female body involves a set of ambivalences: firm but shapely, fit but sexy, strong but lean, with the size floating over the scope of curvy (see figure). These are not either/or binaries, but rather this **and** that complementarities.

Since curves are desired by men (mostly) and sought by women, a curvy shape can be seen as a metaphor for the Tunisian traditional bodily ideal. Tunisian women are expected to attain or approximate this body imaginary by molding, sculpturing, manipulating, and reshaping their bodies according to these culturally validated norms. This curvy shape is obtained through transformative processes and techniques (Featherstone 2016) such as dieting and (more recently) sports (Ferguson et al., 2020; Viotto, Zanette and Brito 2020). Participants adhere to leanness discourses and buy into the cult of fitness as control agents of their body size. Rejecting and stigmatizing extreme figures of both thinness and obesity is a proof that the construction of body imaginary is still disciplined by Westernized discourses of healthiness, leanness and thinness (Tlili et al., 2008; Toselli et al., 2016) and translating modernity and civilization aspirations (Bhogal-Nair and Lindridge 2017; Touzani, Hirshman and Smaoui 2016).

CONCLUSION

Constructing a contemporary version of the idealized female body is a controversial process surrounded by ambiguities, paradoxes and challenges. Depicted as a relatively healthy, feminine figure with an exaggerated emphasis on curves and sexuality, the ideal female body is found here to be a fashionable and aesthetic project constructed by active transformative processes and techniques involving power discourses. As these discourses are dynamic, subjective,

---

Table1. Findings

Findings
- The ideal female body is "curvy" (in Tunisia): No consensus in terms of size (both relatively thin/large), consensus in terms of shape: generous curves, tight waist line, athletic and sexy.
- Extreme figures of both thinness and fatness are rejected and stigmatized.
- "Curves" unify paradoxes and controversies in constructing the ideal female body: the thin westernized ideal along with the ancestral voluptuous.
- Challenging **and** adhering to the dominant Euro-American thin ideal.
- The ideal body is constructed through paradoxical paradigms → Body imaginary is an evolving and dynamic concept.
- Constructing this paradoxical ideal is done at the individual, the social and the global levels.
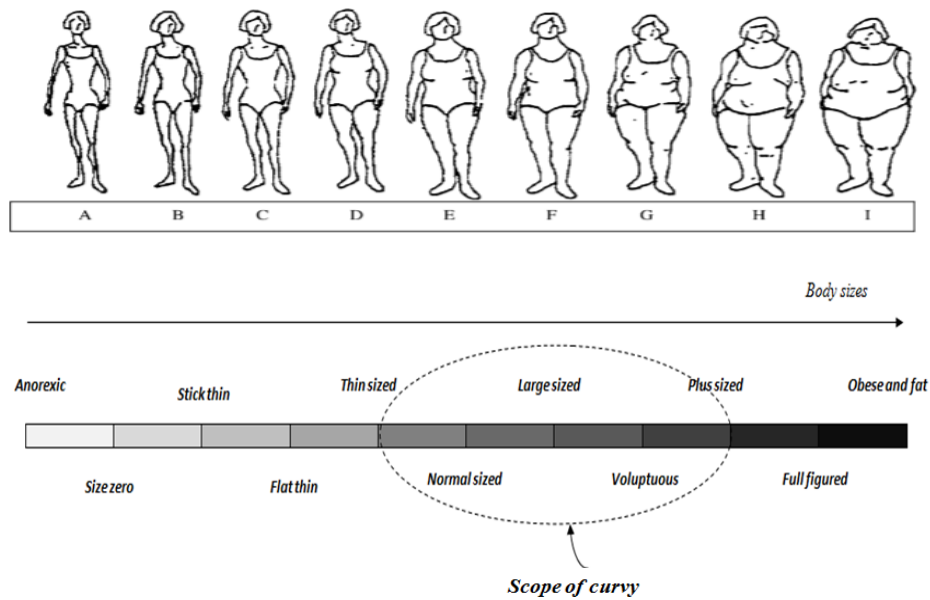
Figure 1. Unraveling the complexity of size: shapes of curvy

continuous, contextual and producers of tensions, the contemporary ideal body image is the result of paradoxical paradigms' interactions unified under "curves." Having curves and a curvy shape denotes beauty and delicacy, sexuality, fitness and athleticism. To conclude, the body imaginary can be analyzed and constructed as a dynamic evolving concept that has paradoxical meanings and works at many levels. On an individual level, narratives of the interviewees position the body as a site for subjective ambivalent tensions leading to a (dis)identification process. Placed within a broader social context, its narratives are transformed into a negotiation site involving femininity, sexuality and youth. On a national/global level, ideal female bodies are constructed as a dialogue between dominant modern Euro-American standards of thinness and sexuality, and traditional ancestral ideal of curvaceous bodies.

Our work contributes in studying the ideal body's construction as dynamic, acknowledging that body images are not static, leading to the birth of new body imaginaries (Gatens 1996; Serrano-Barquín and Serrano-Barquín 2016). We therefore study how these paradoxical paradigms interact to reproduce and construct body images. Our contribution to investigating the body imaginary outside of the abundant Western literature, in a non-Western cultural context, is also registered. Furthermore, through the understanding of the contemporary bodily ideal, the findings may be very beneficial to those who eager to understand body-centered marketplace interactions through consumption experiences aiming to construct the ideal (female) body such as fitness and gym industries. Future researches investigating the process of constructing the body imaginary in a consumer-fitness context are called for.

REFERENCES

Almond, Kevin (2015), "Fashionably Voluptuous: Repackaging the Fuller-sized Figure," *Fashion Theory*, 17 (2), 197-222.

AnoopBhogal-Nair and Andrew Lindridge (2017),"Ephemeral Consumerism: Crossing Territories of the Indian Female Body", *Association for Consumer Research*, 14, 394-396.

Banet-Weiser, Sarah (1999), *The Most Beautiful Girl in the World: Beauty Pageants and National Identity*, Berkeley, CA: University of California Press.

Bhabha, Homi K (1994). *The location of culture.* New York: Routledge.

Brown, Peter J, and Konner, Melvin (1987),"An anthropological perspective on obesity", *Annals of the New York Academy of Sciences*, 499, 29–46.

Bush, Helen M, Williams, Rory G A, Lean, Michael J, and Anderson, Annie S, (2001), "Body image and weight consciousness among South Asian", *Italian and general population women in Britain. Appetite*, 37(3), 207-215.

Caldas-Coulthard, Carmen Rosa, and Rosamund Moon. (2010). 'Curvy, hunky, kinky': Using corpora as tools for critical analysis. *Discourse & Society*, 21(2), 99-133.

Gaonkar, DilipParameshwar. (2001). "On Alternative Modernities." In *Alternative Modernities*, edited by DilipParameshwarGaonkar, 1–23. Durham, NC: Duke University Press.

Featherstone, Mike (2010), "Body, image and affect in consumer culture", *Body & society*, 16(1), 193-221.

Feki, Ines, Smaoui, Najeh, Sellami, Rim, Mnif, Leila, and Masmoudi, Jaweher (2018), "Effect of Body Image on Tunisian Women's Sexual Functioning". *Sexuality & Culture,* 22(4), 1290-1299.

Ferguson, Shelagh, Brace-Govan, Jan, and Welsh, Bridget (2020), "Complex contradictions in a contemporary idealized feminine body project" *Journal of Marketing Management*, 1-28.

Gatens, Moira. (1996). *Imaginary bodies: Ethics, power and corporeality.* Psychology Press.

Goankar, Dilip, ed. (2001), *Alternative Modernities,* Durham, NC: Duke University Press.

Hirschman, Elizabeth C., and Touzani, Mourad. (2011) "Consumer acculturation in situ: the continuing legacy of French colonization in North Africa". Sandikci, O., Rice, G., *Handbook of Islamic Marketing*, 114-128.

Jha, Meeta Rani. (2015). *The global beauty industry: Colorism, racism, and the national body*. Routledge.

Jha,MeetaRani (2007), "The Politics of Emotion in British Asian Experiences of Bombay Cinema". *Journal of Creative Communications*, 2(12): 10121

Khalaf, Samir., and Gagnon, John. (Eds.). (2014). *Sexuality in the Arab world*. Saqi.

Mokhtar, Najat, Elati, JalilaChabir, Rachida,Bour, Abdelatif, Elkari, Khalid, Schlossman, Nina P, Caballero, Benjamin and Aguenaou, Hassen (2001) "Diet culture and obesity in Northern Africa", *Journal of Nutrition*, 131, 887S–892S.

Ponterotto, Diane (2016), "Resisting the male gaze: feminist responses to the" normatization" of the female body in Western culture", *Journal of International Women's Studies*, 17(1), 133-151.

Prosser, Jon, and Andrew Loxley (2008), "ESRC National Centre for Research Methods review paper: Introducing visual methods." *Southampton: National Centre for Research Methods.*

Rashid, Arooj (2019) "The Media Effect: Implications for Manifesting Maintainable Body Image in the Context of Global Fashion Industry" In *Promotion and Marketing Communications*. DOI: 10.5772/intechopen.89239

Salamon, Hagar, and Juhasz, Esther (2011). " Goddesses of Flesh and Metal" Gazes on the Tradition of Fattening Jewish Brides in Tunisia", *Journal of Middle East Women's Studies,* 7(1), 1-38.

Salesses, Lucile, and Romain, Deborah, (2014), "The imaginary and social representations generated by fashion images in women's magazines", *Papers on Social Representations,* 23(2), 23-1.

Scaraboto, Daiane, and Eileen Fischer. (2013) "Frustrated Fatshionistas: An Institutional Theory Perspective on Consumer Quests for Greater Choice in Mainstream Markets." *Journal of Consumer Research* 39 (6): 1234–1257.

Serrano-Barquín, Carolina, and Serrano Barquín, Rocio Del Carmen (2016),"Beyond Eurocentric imaginary body", *American International journal of social science*, 5(3), 66-74.

Soh, Nerissa Li-Wey, Touyz Stephen, Dobbins, Timothy, Surgenor Lois, Clarke Simon, Kohn, Michael, Lee, Ee-Lian, Leow Vincent, Rieger Elizabeth, Ung Ken-EngKhean and Walter, Garry (2008) "Body image disturbance in young North European and East Asian women with and without eating disorders in Australia and in Singapore", European *Eating Disorders Review: The Professional Journal of the Eating Disorders Association,* 16(4), 287-296.

Swami, Viren, Mada, Rujeco, and Tovée, Martin J. (2012), "Weight discrepancy and body appreciation of Zimbabwean women in Zimbabwe and Britain", *Body Image*, 9(4), 559-562.

Tlili, Faten, Mahjoub, Abdelwahab, Lefevre, Pierre, Bellaj, Tarek, Ben Romdhane, Habiba, Eymard-Duvernay, Sabrina, and Holdsworth, Michelle, (2008), "Tunisian women's perceptions of desirable body size and chronic disease risk", *Ecology of food and nutrition,* 47(4), 399-414.

Toselli, Stefania, Rinaldo, Natascia, and Gualdi-Russo, Emanuela, (2016), "Body image perception of African immigrants in Europe", *Globalization and health*, 12(1), 48.

Touzani, Mourad., Hirschman, Elizabeth C, and Smaoui, Fatma (2016), "Marketing communications, acculturation in situ, and the legacy of colonialism in revolutionary times", *Journal of Macromarketing*, 36(2), 215-228.

Vigarello, Georges. (2013). *Les Métamorphoses du gras. Histoire de l'obésité. Du Moyen Age au XXe siècle.* Le Seuil.

Viladrich, Anahi, Yeh, Ming-Ching, Bruning, Nancy, and Weiss, Rachael, (2009), "Do real women have curves?" Paradoxical body images among Latinas in New York City", *Journal of immigrant and minority health*, 11(1), 20-28.

Viotto, Marina Henriques, Maria Carolina Zanette, and Eliane Pereira Zamith Brito. (2020) "Looking good or feeling good? The dual role of the body in the taste transformation process." *Consumption Markets & Culture* 1-21.

Wilk, Richard (1995), "The Local and the Global in the Political Economy of Beauty: From Miss Belize to Miss World, *"Review of International Political Economy*, 2 (1), 117-134.

Zanette, Maria. Carolina, and Pereira Zamith Brito, Eliane. (2019). "Fashionable subjects and complicity resistance: power, subjectification, and bounded resistance in the context of plus-size consumers", *Consumption Markets & Culture*, 22(4), 363-382.

Comment: Integrating this scale as a further step of the visual investigation also meant that we ask participants about their descriptions and perceptions of the presented figures. Coherently with the results, we found that extreme figures of thinness/fatness are rejected (e.g., Figure A/B and H/I). The shapes floating around the scope of curvy (namely Figures D, E and F) were mainly perceived as attractive by most participants, or at the very least, acceptable. Figures G and H were proposed as attractive/ideal by men fat fetishists while fattists proposed figure D as the ideal female shape.

Competitive Papers—Extended Abstracts

Sinnfluencers and A Collective Moral Identity

Aya Aboelenien, HEC Montréal, Canada
Alex Paul Baudet, HEC Montréal, Canada
Ai Ming Chow, University of Melbourne, Australia

EXTENDED ABSTRACT

Ethical consumerism has been on the rise in North America (Thompson and Coskuner-Balli 2007). Increasingly, consumers are concerned with the consequences of their consumption behavior (see Cherrier 2009). They are also holding companies accountable for negative and transgressive practices through boycotts (Kozinets and Handelman 2004), anti-consumption and consumer activism (Glickman 2009). These concerned citizens limit their day-to-day consumption practices in more than one ways. These practices include consumption of alterative green products, cutting or eliminating meat from their diets, taking shorter showers, not owning a car, and boycotting unethical businesses. This minimalization is driven by a social imaginary of a doomed planet, if current consumption practice remains the same (Harveston 2018).

To mimic their consumers, companies are struggling to forge ethical products and ethically conduct business. Studies have looked into the motivation of these ethical consumers (Newholm and Shaw 2007) and their influence on market dynamics (Beard 2008; Nicholls and Opal 2005). The focus of these papers mainly emphasized the role of collective action in driving consumer movements, yet overshadowing the role of the individual such as social media influencers in creating a sustainable future.

Parallel to the rise of ethical consumerism is the increasing use of social media in affecting consumer behavior (Brown and Hayes 2008). For example, Hughes, Swaminathan, and Brooks (2019) shed light on how online social influencers affect and facilitate online brand engagement. Within the marketing literature, Kozinets et al. (2010) unpacked the evolution of consumers' influence on consumption in the context of online communications such as online blogs. According to Kozinets et al. (2010, p. 74), social media influencers and their role in influencing the consumption of their followers have been identified to be "a part of a complex cultural process". Their studies revealed that communal interests shape consumers' motivations to communicate marketing messages to other consumers. Specifically, they explained how successful social media influencers engage in practices that transform marketing-related information to communally desirable and palatable social information.

However, while Kozinets et al. (2010) identified the communication strategies by focusing on influential consumers who are part of a "seeded" marketing campaign executed by firms to endorse certain products, it raises additional unexplored questions about the practices and roles of influencers who are individual advocates. Particularly, these influential individuals might even rally other consumers to boycott certain brands, organisations and consumptions practices. Therefore, this study asks: how do these individual influential consumers shape the consumption practices of other consumers? To be more precise, how do they influence the anti-consumption practices and sustainable practices of other consumers?

To answer these questions, we utilize practice theory. Practices routinized behaviors (Reckwitz 2002) that operate at two levels: the social level entails practices as an entity, and the individual level entails practices as performativity (Shove, Pantzar, and Watson 2012; Thomas and Epp 2019). The individual performance of the practice is guided by the social dimension to ensure its conformity to the social expectations (Shove and Pantzar 2005). It is through the continuous performance of a specific practice that it becomes embodied and routinized (Shove et al. 2012). Practices have three main components which are rules to regulate performance, understandings of how to behave and a teleology of the end goal of this performativity (Arsel and Bean 2013; Maciel and Wallendorf 2017; Schatzki 1996).

To answer our research questions, we focus on social media influencers and their approach in building their identity and a collective identity through their followers to stand against practices that they consider to be wrong or immoral. We label these moral influencers as "sinnfluencers" as in *sin*-influencer (Gross 2019). Sinnfluencers' mission is to influence public opinion to consume morally by considering the consequences of their consumption on others. Our sinnfluencers are vegans, ethical fashion designers, or environmentalists. They have self-identified on their profiles as belonging to one of these groups. Our paper utilizes archival data (e.g., newspaper articles, blogs, lectures, and books on and by the influencers and their respective movements) and netnographic analysis of key sinnfluencers' feed posts. We used these multiple online sources to cross-reference the prominence of the various influencers, the number of their followers, the frequency of their posts and their interactions with their communities. We identified top influencers who met the selection criteria. Then, using *Apify*, we downloaded publicly available data on Instagram.

Our analysis reveals that sinnfluencers are individuals who changed their consumption practices to adhere to a different morality. After successful habituation of the change in their practices, they decide to build an online platform to advocate for the same types of change among broader groups of individuals, their followers. The social practice of interest among these sinnfluencers is activism and behavior change. We investigate the entangled web of practice performativity to build their identity and mobilize the collective. Through our data analysis, we identified five performance strategies framing, validating, evangelizing, celebrating and advocating.

Framing refers to directing the blame and the negative emotions toward a specific villain to request behavior change. Validating takes place as sinnfluencers provide proof to support the requested behavior change. Third, they evangelize by building rapport with their followers. Forth, they celebrate the good news about their positive consequences of their modified practices. Finally, they advocate direct behavior change after establishing strong relations with their followers.

Our paper extends the literature on new social movements, by introducing the role of individual players in supporting a social movement. Our findings also add to the literature on individual and collective identity by showing their interplay in a contemporary research avenue of sustainable consumption. Finally, we extend theories of practice to show the relation between the social level practice (i.e., activism) and the different related strategies in its performativity.

REFERENCES

Arsel, Zeynep and Jonathan Bean (2013), "Taste Regimes and Market-Mediated Practice," *Journal of Consumer Research*, 39(5), 899–917.

Beard, Nathaniel Dafydd (2008), "The Branding of Ethical Fashion and the Consumer: A Luxury Niche or Mass-Market Reality?," *Fashion Theory*, 12(4), 447–467.

Brown, Duncan and Nick Hayes (2008), *Influencer Marketing: Who Really Influences Your Customers*, Amsterdam: Elsevier/Butterworth-Heinemann.

Buechler, Steven M. (1995), "New Social Movement Theories," *Sociological Quarterly*, 36(3), 441–464.

Cherrier, Hélène (2009), "Anti-Consumption Discourses and Consumer-Resistant Identities," *The Environmental Magazine, Journal of Business Research*, 62(2), 181–190.

Glickman, Lawrence B (2009), *Buying Power: A History of Consumer Activism in America*, University of Chicago Press.

Harveston, Kate (2018), "Can the Rising Trend of Minimalism Help the Environment?" *The Environmental Magazine,* February 15, 2018. Accessed March 1, 2020 from https://emagazine.com/can-the-rising-trend-of-minimalism-help-the-environment/.

Hughes, Christian, Vanitha Swaminathan, and Gillian Brooks (2019), "Driving Brand Engagement Through Online Social Influencers: An Empirical Investigation of Sponsored Blogging Campaigns," *Journal of Marketing*, 83(5), 78–96.

Kozinets, Robert V, Kristine De Valck, Andrea C Wojnicki, and Sarah JS Wilner (2010), "Networked Narratives: Understanding Word-of-Mouth Marketing in Online Communities," *Journal of Marketing*, 74(2), 71–89.

Kozinets, Robert V. and Jay M. Handelman (2004), "Adversaries of Consumption: Consumer Movements, Activism, and Ideology," *Journal of consumer research*, 31(3), 691–704.

Maciel, Andre F. and Melanie Wallendorf (2017), "Taste Engineering: An Extended Consumer Model of Cultural Competence Constitution," *Journal of Consumer Research*, 43(5), 726–46.

Newholm, Terry and Deirdre Shaw (2007), "Studying the Ethical Consumer: A Review of Research," *Journal of Consumer Behaviour: an international research review*, 6(5), 253–270.

Nicholls, Alex and Charlotte Opal (2005), *Fair Trade: Market-Driven Ethical Consumption*, Sage.

Offe, Claus (1990), "Reflections on the Institutional Self-Transformation of Movement Politics: A Tentative Stage Model," *Hitotsubashi Journal of Social Studies*, 21(1), 179–195.

Phipps, Marcus and Julie L. Ozanne (2017), "Routines Disrupted: Reestablishing Security through Practice Alignment," *Journal of Consumer Research*, 44(2), 361–80.

PSFK (2020), "Inside the 'Sinnfluencer' Phenomenon" (2020), *PSFK IQ*, Accessed March 1, 2020 from https://www.psfk.com/2020/02/what-is-a-sinnfluencer.html.

Reckwitz, Andreas (2002), "Toward a Theory of Social Practices: A Development in Culturalist Theorizing," *European journal of social theory*, 5(2), 243–63.

Scaraboto, Daiane and Eileen Fischer (2012), "Frustrated Fatshionistas: An Institutional Theory Perspective on Consumer Quests for Greater Choice in Mainstream Markets," *Journal of Consumer Research*, 39(6), 1234–57.

Schatzki, Theodore R. (1996), *Social Practices: A Wittgensteinian Approach to Human Activity and the Social*, New York: Cambridge University Press.

Shove, Elizabeth and Mika Pantzar (2005), "Consumers, Producers and Practices: Understanding the Invention and Reinvention of Nordic Walking," *Journal of Consumer Culture*, 5(1), 43–64.

Shove, Elizabeth, Mika Pantzar, and Matt Watson (2012), *The Dynamics of Social Practice: Everyday Life and How It Changes*, Sage.

Thomas, Tandy Chalmers and Amber M Epp (2019), "The Best Laid Plans: Why New Parents Fail to Habituate Practices," *Journal of Consumer Research*, 46(3), 564–89.

Thompson, Craig J. and Gokcen Coskuner-Balli (2007), "Enchanting Ethical Consumerism: The Case of Community Supported Agriculture," *Journal of Consumer Culture*, 7(3), 275–303.

Building a Bridge: How Immigrant Parents Strategically Build Dual-Habitus for their Children

Aya Aboelenien, HEC Montréal, Canada
Zeynep Arsel, Concordia University, Canada

EXTENDED ABSTRACT

Acculturation literature has discussed the identity projects of mature immigrants to navigate a new territory. Immigrants adopt one of four identity projects: separation, assimilation, integration, and marginalization (Berry 1992; Üstüner and Holt 2007). However, the acculturation of kids through family-led socialization and the resulting habitus of dual culture kids is not sufficiently covered in the literature. Our paper shows how immigrant parents engage in practices that cultivate a second-generation habitus.

We analyze our data through the lens of habitus (Bourdieu 1984) and practice theory (Hui, Schatzki, and Shove 2017; Schatzki 2001, 2002). Habitus is the enduring and subconscious patterns of thinking embodied since childhood (Bourdieu 1984). It operates through three main sources of capital: cultural, social, and economic. This capital is acquired during early socialization and equips individuals to operate according to a specific schema in their adult life. Habitus guides the performances of practices. Practices are a routinized behaviors (Reckwitz 2002) that are learned and shared with others (Shove, Pantzar, and Watson 2012). It is through the continuous performance of practice that it becomes embodied and routinized (Shove et al. 2012), eventually becoming part of the habitus. Each practice is governed by a teleology or an end goal that governs its practitioners' performativity. Practitioners of a specific practice become carriers through protecting their temporal and spatial performativity (Shove et al. 2012).

Mature individuals leverage their capital to draw distinction in social life (Bourdieu 1984; Lamont and Molnár 2002; Maciel and Wallendorf 2017; Saatcioglu and Ozanne 2013; Sherman 2018). Rather than treating habitus as a preexisting disposition, as in most literature, we take a step backward and investigate the parental practices that shape building the habitus of kids. Consequently, we distinguish between taste and moral practices and how parental socializing concurrently builds these two interrelated dimensions and how they are transferred in intergenerational situations.

We conduct our research in the context of immigrant families in Canada. We interviewed immigrant parents with at least one child. The interviews follow the convention of depth interviews in CCT research (Arsel 2017). Following the first interview, we asked the parents to keep a diary to reflect on some of their parenting techniques. Later, we re-interviewed them to hear their reflection on the diary, how they envision their kids, and what they do to achieve this vision. We also conducted ethnographic interviews with other immigrant parents during family activities and communal events. Finally, we collected archival data (e.g., books, blogs) to understand the resources parents build on to raise the kids.

Immigrant parents demonstrate a strong responsibility and agency in socializing their kids. Our findings demonstrate that parents build a hybrid identity project for their kids through the strategic adoption of practices through four teleological orientations: rooting, synthesizing, discovering, and incorporating. From their perspective, the kids' new lives need to integrate elements of their home countries. Having a second culture is seen as a resource for kids and a source of capital. Their parenting practices deploy elements of both cultures. Parents eventually want the kids to associate both with their home country identity (i.e., Chinese, Russian) and a Canadian one.

Our participants accumulated high to mid-level capital in their home countries that enable them to gather resources for acculturating their kids, consciously thinking about which resources are best for them, and making strategic choices in family practices. These strategies shape practice teleologies and the choices for the main carrier of the practice and the practitioners involved. The main carrier of the practice is the person designated by the family to transmit the focal practice to the kids; in our context, it can either be the parents or a reference group. Involved practitioner refers to the presence or absence of the parents in kids' new practices.

Practices adopted through a *rooting* teleology immerse the kids in activities from their home country. Examples involve cooking authentic food and learning the history of their native country. These practices ensure that the kids have sufficient cultural capital for their trips back home and to provide a sense of identity. Having a sense of identity is a moral position that immigrant parents care about. Parents are highly knowledgeable about these practices and they transfer them with ease. Thus, these activities also foster a sense of unity for the family.

Practices adopted for *synthesizing* include home country activities that kids participate in, however, parents do not possess enough expertise to pass it on. An entrusted practitioner becomes the main carrier. Parents here rely on communal support of home country immigrants to provide them with a recommendation for the best carriers. Enrolling the kids in cultural dance and language classes is a synthesizing practice. These synthesizing practices ensure that the kids have roots and enable a communal network of families with similar habitus.

Practices adopted to *incorporate* allow parents to register kids in host country experiences to better shape their life in Canada without them participating in it. Sending them to mainstream schools, putting them in hockey and skating trainings are examples of incorporating strategies. As parents do not have expertise in these activities and sometimes do not see a value nor have the time to learn them, they delegate the activities to an entrusted practitioner to ensure their kids' perform host culture practices appropriately.

Finally, *discovering* practices involve activities that allow the kids in cultivating a host culture experience. While the parents are themselves not carriers of the practice, they believe it is important for them to learn it themselves to facilitate their kids' performativities. Although the parents are not experts, they trust their ability to acquire enough skills to teach their kids. Watching hockey matches together is one example.

Our paper advances acculturation literature by demonstrating the parenting strategies involved in hybrid acculturation projects for kids. We show the strategies for building a dual culture habitus when both cultures are seen equally important for success in later life. Finally, we add to work on theories of practice by highlighting how practice teleologies are strategically deployed for adopting new practices.

REFERENCES

Arsel, Zeynep (2017), "Asking Questions with Reflexive Focus: A Tutorial on Designing and Conducting Interviews," *Journal of Consumer Research*, 44(4), 939–48.

Berry, John W. (1992), "Acculturation and Adaptation in a New Society," *International Migration*, 30, 69–85.

Bourdieu, Pierre (1984), *Distinction: A Social Critique of the Judgement of Taste*, Harvard university press.

Hui, Allison, Theodore Schatzki, and Elizabeth Shove (2017), *The Nexus of Practices: Connections, Constellations, Practitioners*, New York: Routledge.

Lamont, Michèle and Virág Molnár (2002), "The Study of Boundaries in the Social Sciences," *Annual review of sociology*, 28(1), 167–95.

Maciel, Andre F. and Melanie Wallendorf (2017), "Taste Engineering: An Extended Consumer Model of Cultural Competence Constitution," *Journal of Consumer Research*, 43(5), 726–46.

Reckwitz, Andreas (2002), "Toward a Theory of Social Practices: A Development in Culturalist Theorizing," *European Journal of Social Theory*, 5(2), 243–63.

Saatcioglu, Bige and Julie L. Ozanne (2013), "Moral Habitus and Status Negotiation in a Marginalized Working-Class Neighborhood," *Journal of Consumer Research*, 40(4), 692–710.

Schatzki, Theodore R. (2001), "Introduction: Practice Theory," *The Practice Turn in Contemporary Theory*, https://ci.nii.ac.jp/naid/10027435859/en/.

——— (2002), *The Site of the Social: A Philosophical Account of the Constitution of Social Life and Change*, University Park: Pennsylvania State University Press.

Sherman, Rachel (2018), "'A Very Expensive Ordinary Life': Consumption, Symbolic Boundaries and Moral Legitimacy among New York Elites," *Socio-Economic Review*, 16(2), 411–33.

Shove, Elizabeth, Mika Pantzar, and Matt Watson (2012), *The Dynamics of Social Practice: Everyday Life and How It Changes*, SAGE Publications.

Üstüner, Tuba and Douglas B. Holt (2007), "Dominated Consumer Acculturation: The Social Construction of Poor Migrant Women's Consumer Identity Projects in a Turkish Squatter," *Journal of consumer research*, 34(1), 41–56.

How Variety Influences Predicted Goal Conflict

Luis Abreu, Duke University, USA
Sarah A. Memmi, Duke University, USA
Jordan Etkin, Duke University, USA

EXTENDED ABSTRACT

While pursuing important everyday goals—a successful career, a healthy lifestyle, strong interpersonal relationships, or other personal pursuits—consumers often experience conflicts that may interfere with goal achievement (e.g., missing a workout when a meeting runs late or when an accident causes extra traffic on the way to the gym; Cavallo and Fitzsimons 2012; Etkin, Evangelidis, and Aaker 2015; Fishbach and Ferguson 2007). When consumers anticipate future conflict, they can proactively protect valued goals (e.g., by rearranging one's schedule; Duckworth, Gendler, and Gross 2016). Yet, consumers often neglect to take such actions (Ashraf, Karlan, and Yin 2006; Schwartz et al. 2014), suggesting they may underestimate future interference with their goals. Why might this occur? What aspects of conflicts encountered in the past might make consumers less likely to anticipate goal conflict in the future?

This research explores the role of variety (i.e., the degree of distinction or differentiation; Etkin and Sela 2016; Kahn and Wansink 2004) among past conflicting events. Missing three workouts due to work-related events (e.g., a meeting, a project, or a presentation), for instance, may seem less varied than three conflicts due to work, personal, and social events.

We propose that perceiving greater variety among a set of past conflicting events reduces expectations of conflict in the future. We predict this occurs because variety causes people to categorize past experiences as isolated, one-off events that are less likely to cause conflict in the future. By reducing expected future conflict, we further expect that greater variety reduces the likelihood of taking goal-protective actions. We test these predictions across six experiments.

Experiment 1 examines the basic effect and underlying process. Participants ($N = 233$) imagined having a goal to "get home by 6 p.m. every day after work" and read about past episodes of conflict that were either low variety (i.e., three work-related conflicts) or high variety (i.e., work-related, going to the gym, and helping a friend). Participants then indicated how much conflict they would expect with their goal in the future and the extent to which they categorized the conflicting events as isolated, one-off instances. As predicted, compared to the low-variety condition ($M = 5.70$), participants in the high-variety condition expected less goal conflict in the future ($M = 5.41$, $p = .037$), and this was mediated by categorizing conflicts as one-off events ($ab = -.19$, CI [-.33, -.09]).

Experiment 2 tests generalizability using participants' own personal goals and conflicts. Participants ($N = 208$) first identified a current personal goal and then described three instances when they experienced goal conflict (i.e., interference). In the high (vs. low) variety condition, participants then described how those conflicts were different (vs. similar). As predicted, compared to the low-variety condition ($M = 4.82$), participants prompted to perceive greater variety among past conflicts expected less goal conflict in the future ($M = 4.41$, $p = .024$).

Experiment 3 examines real experiences of conflicts in a controlled lab setting. Participants ($N = 136$) read they would complete two timed quizzes for a chance to win a bonus. During the first quiz, all participants experienced three episodes of conflict (i.e., tasks that interrupted the main quiz and consumed some of the limited time), and we manipulated variety among the conflicting tasks. We next measured how much goal conflict participants expected in the second quiz. As predicted, an ANCOVA (controlling for score on the first quiz) revealed that participants who experienced high (vs. low) variety conflicts expected less future conflict ($M_{low\text{-}variety} = 5.87$ vs. $M_{high\text{-}variety} = 5.40$; $p = .028$).

Experiment 4 examines the underlying process with moderation. Participants read they had a goal to exercise each day after work and had experienced three recent conflicts. In addition to the high and low variety conditions, we introduced a new high-variety/high-frequency condition, in which each conflicting event had occurred several times (i.e., to decrease the perception that high variety conflicts were isolated, one-off events). As before, participants in the high (vs. low) variety conditions expected less future conflict ($M_{low\text{-}variety} = 5.63$ vs. $M_{high\text{-}variety} = 5.31$; $p = .020$). Importantly, the effect of high variety was attenuated when conflicts were not perceived as one-off events ($M_{high\text{-}variety/high\text{-}frequency} = 5.72$; vs. high-variety $p = .003$; vs. low-variety $p = .538$).

Experiment 5 tests alternative explanations based on goal importance or controllability of events by using circumstantial conflicts (i.e., not pertaining to competing goals) that are beyond one's personal control. Participants ($N = 210$) read about having a goal to be home by 6 p.m. each evening. In the low variety condition, participants "had encountered extra traffic on their commute home" on three occasions, whereas in the high variety condition they had encountered extra traffic due to an accident, a broken traffic light, and a road closure. Consistent with previous results, participants in the high-variety condition expected less future goal conflict ($M_{low\text{-}variety} = 5.63$ vs. $M_{high\text{-}variety} = 4.95$, $p < .001$).

Experiment 6 explores downstream consequences. By decreasing expected future conflict, variety might also discourage interest in products or strategies that protect valued goals. Participants ($N = 232$) imagined having a goal to connect with friends regularly after work, read about three high (vs. low) variety episodes of past goal conflict, and then indicated interest in using a ridesharing app that would help them stick to their goal. As predicted, participants in the high-variety condition were less willing to pre-commit ($M_{low\text{-}variety} = 4.30$ vs. $M_{high\text{-}variety} = 3.83$; $p = .043$).

Across participants' own personal goals, laboratory tasks, and scenarios, we find that variety among past instances of goal conflict decreases expectations of future goal conflict. We find this occurs because variety encourages people to perceive past conflicting events as one-off, isolated occurrences. Notably, we find variety reduces expectations of future conflict in general (i.e., the effect is not limited to expectations for specific past conflicts). These findings further understanding of variety and categorization (Cohen and Basu 1987; Etkin and Sela 2016; Isaac and Brough 2014; Mogilner, Rudnick, and Iyengar 2008) and how past experiences shape expectations about the future. This research also has implications for consumer goal pursuit.

REFERENCES

Ashraf, Nava, Dean Karlan, and Wesley Yin (2006), "Tying Odysseus to the Mast: Evidence From a Commitment Savings Product in the Philippines," *The Quarterly Journal of Economics*, 121(2), 635–72.

Cavallo, Justin V. and Gráinne M. Fitzsimons (2012), "Goal Competition, Conflict, Coordination, and Completion: How Intergoal Dynamics Affect Self-Regulation.," in *Goal-Directed Behavior.*, New York, NY, US: Psychology Press, 267–99.

Cohen, Joel B. and Kunal Basu (1987), "Alternative Models of Categorization: Toward a Contingent Processing Framework," *Journal of Consumer Research*, 13(4), 455–72.

Duckworth, Angela L., Tamar Szabó Gendler, and James J. Gross (2016), "Situational Strategies for Self-Control," *Perspectives on Psychological Science*, 11(1), 35–55.

Etkin, Jordan, Ioannis Evangelidis, and Jennifer Aaker (2015), "Pressed for Time? Goal Conflict Shapes How Time Is Perceived, Spent, and Valued," *Journal of Marketing Research*, 52(3), 394–406.

Etkin, Jordan and Aner Sela (2016), "How Experience Variety Shapes Postpurchase Product Evaluation," *Journal of Marketing Research*, 53(1), 77–90.

Fishbach, Ayelet and Melissa J. Ferguson (2007), "The Goal Construct in Social Psychology.," in *Social Psychology: Handbook of Basic Principles, 2nd Ed.*, New York, NY, US: The Guilford Press, 490–515.

Isaac, Mathew S. and Aaron R. Brough (2014), "Judging a Part by the Size of Its Whole: The Category Size Bias in Probability Judgments," *Journal of Consumer Research*, 41(2), 310–25.

Kahn, Barbara E. and Brian Wansink (2004), "The Influence of Assortment Structure on Perceived Variety and Consumption Quantities," *Journal of Consumer Research*, 30(4), 519–33.

Mogilner, Cassie, Tamar Rudnick, and Sheena S. Iyengar (2008), "The Mere Categorization Effect: How the Presence of Categories Increases Choosers' Perceptions of Assortment Variety and Outcome Satisfaction," *Journal of Consumer Research*, 35(2), 202–15.

Schwartz, Janet, Daniel Mochon, Lauren Wyper, Josiase Maroba, Deepak Patel, and Dan Ariely (2014), "Healthier by Precommitment," *Psychological Science*, 25(2), 538–46.

What Are The Key Drivers Of Consumer Preference For Crowdfunded Products?

Oguz A. Acar, City University of London, UK
Darren Dahl, University of British Columbia, Canada
Christoph Fuchs, TU Munich, Germany
Martin Schreier, WU Vienna, Austria

EXTENDED ABSTRACT

Crowdfunding has emerged as an alternative means of financing new ventures. In this research, we ask whether and why having been crowdfunded carries any signal value for the broader market of observing consumers. Eight studies reveal that consumers demonstrate a preference for crowdfunded products over differently funded ones.

Crowdfunding is increasingly used as an alternative means of financing new ventures. Instead of asking venture capitalists, banks, or other professional financial service providers to invest in one's ideas, crowdfunding involves pitching those ideas directly to the general public, the potential customers of the resulting new product (Belleflamme, Lambert, and Schwienbacher 2014; Kuppuswamy and Bayus 2018; Mollick 2014). And this audience seems to be willing to invest: At Kickstarter, one of the leading crowdfunding platforms, about fifteen million individuals have been reported to have helped finance more than 146,000 projects since its launch in 2009 (Kickstarter 2018). More generally, crowdfunding platforms across the globe helped raise more than $ 30 billion in 2015 (Zvilichovsky, Danziger, and Steinhart 2018), a figure the World Bank estimated to triple by 2025 (WorldBank 2013).

The rise of crowdfunding in practice has sparked strong interest among scholars across disciplines such as finance, entrepreneurship, strategy, and marketing. Much of the recent attention has been dedicated to a better understanding of the consumers' motivations to participate in crowdfunding (e.g., Boudreau et al. 2015; Gerber, Hui, and Kuo 2012; Kuppuswamy and Bayus 2017; Ordanini et al. 2011; Zvilichovsky, Danziger, and Steinhart 2018), and the dynamics and success factors of the crowdfunding process (e.g., Agrawal, Catalini, and Goldfarb 2015; Burtch, Ghose, and Wattal 2013; Greenberg and Mollick 2017; Mollick 2014). In this paper, we build on this initial research and address the novel question of how crowdfunding is interpreted by the broader consumer market. Specifically, we ask whether non-involved consumers, that is, the entire market of a firm's potential future customers, differentially react to products as a function of the underlying product's venture funding history. On the one hand, crowdfunding has been portrayed as the last chance effort to bring a product to market (e.g., Belleflamme, Lambert, and Shwienbacher 2014; Brown, Boon, and Pitt 2017; Kuppuswamy and Bayus 2017). Financial analysts and conventional investors often interpret crowdfunding as a negative signal to the marketplace with respect to new product success (Carlozo 2017). On the other hand, we posit in this paper that firms will gain advantage by signaling that their product is crowdfunded. Similar to the enthusiasm identified in the investment decision for crowdfunded products, we contend that consumers will show a distinct interest in buying these types of products.

In Study 1, we test whether consumers prefer a crowdfunded product over alternatives using different experimental designs, manipulations, dependent variables, product contexts, and samples. Study 1A ($n = 1,512$, $M_{age} = 31$ years, 44% female, Prolific) examines whether consumers prefer a product that is described as crowdfunded compared to a baseline condition, which did not mention any funding source details, using an incentive compatible willingness to pay measure (a variant of the BDM procedure: Becker, DeGroot, and Marschak, 1964) as the dependent variable and digital notebooks as

the product category. In the crowdfunding condition, we discreetly implemented our manipulation using a statement about crowdfunding located as text above the product (which reads as follows Crowdfunded: The People spoke and put their money behind their words. Each of these products got its start as a successful crowdfunding campaign). In the baseline condition there was no respective information present. To maximize external validity, we took the crowdfunding signal from a real shopping website, Thegrommet.com, a website that sells crowdfunded products (including the ones shown to our study participants).

The results show a strong crowdfunding effect: participants are willing to pay about 21% more when the product was described as being crowdfunded compared to when no funding source information was present ($M_{crowdfunding} = 8.57$, $M_{baseline} = 7.11$; $F_{1,1510} = 14.81$, $p < .001$, $d = .20$). In a follow-up study (Study 1B: n = 100, $M_{age} = 38$ years, 35% female, Prolific), we replicate our focal effect using a more classic dependent variable, purchase intent, and, per consequence, by also including price information in the stimuli. An ANOVA on the purchase intention measure demonstrates that participants exhibit higher purchase intentions when the product was described as being crowdfunded ($M = 4.15$) compared to when no funding source information was provided ($M = 3.33$; $F_{1,98} = 5.17$, $p = .025$, $d = 0.46$).

Study 1C and 1D employed a direct comparison design following the recommendations of Meyvis and van Osselaer (2017). That is, participants were presented with two different products side by side with the only difference between conditions being the information regarding our independent variable – the funding source of the product. In Study 1C ($n = 390$, $M_{age} = 20.44$, 51% female, students), participants were introduced to two start-ups labeled Start-up A and Start-up B; one of which was described as having used crowdfunding whereas the other one as having used venture capital funding. Half of the participants were exposed to a condition in which Start-up A was described as crowdfunded and the backpack of Start-up B as venture capital funded; the other half was assigned to a condition where the backpack of Start-up A was described as venture capital funded and the backpack of Start-up B as crowdfunded. Product choice, our dependent variable, was captured by asking participants to indicate which of the two backpacks they would prefer. A logistic regression with actual product choice as the dependent variable and funding source as the independent variable demonstrates that consumers have a significantly stronger preference for the backpack when it is described as crowdfunded ($\chi^2 = 6.47$, $b = .52$, $SE = .20$, $p = .011$). For both backpacks, choice share for the crowdfunded alternative was higher than the venture capital funded alternative: 54% (backpack A) and 59% (backpack B).

In a follow-up study (Study 1D), we replicate the crowdfunding effect in another product category (cameras), using a relative preference measure as dependent variable (7- point scale), based on a different study population (MTurk, n = 302, $M_{age} = 37$, 57% female, MTurk), and, importantly, against a series of different control conditions (i.e., three alternative funding sources: venture capital, bank loan, or self-financing) to address the possibility that (nega-

tive) attitudes towards venture capitalists might, at least in part, have driven the effect obtained in Study 1C. When the Start-up B's camera was described as crowdfunded, participants reported a significantly stronger preference for it ($M = 4.42$) than when it was described as funded by venture capital, a bank loan, or self-financing ($M = 3.50$; $F_{1,296} = 15.37$, $p < .001$, $d = .45$). Critically, the 2(product flip) x 3(alternative funding source) interaction proved insignificant ($p > .20$), suggesting that the focal crowdfunding effect emerges strongly when pitted against all three control conditions.

In Study 2, we use in-depth interviews (28 in-depth interviews with informants from different backgrounds and socio-demographics; age range from 23 to 83 years, 11 female) as an exploratory approach to better understand what inferences consumers are making from the crowdsourcing signal, and seeing how these inferences are likely to motivate preferences for crowdfunded products. The qualitative study reveals that the crowdfunding effect we identify is driven by distinct inferences involving the quality of the crowdfunded product, the underdog status that often underlies crowdfunded firms, and the ability to bring equality to the marketplace by providing opportunity to crowdfunding initiatives.

In Study 3, we formally test these mediators using a direct comparison design.

Participants ($n = 200$, $M_{age} = 39$ years, 49% female, Prolific) were presented two cameras side by side – Luna and MySight – together with various product-related information that consumers are typically exposed to while shopping. They were randomly assigned to one of the two conditions (product Luna was described as being crowdfunded and the product MySight as being venture capital funded or vice versa). Everything else was identical between the two conditions. Purchase intention, the dependent variable, and the mediators were also captured using 3-item scales (αs ranged between .90 to .94). Participants demonstrate a significantly stronger purchase intention for the camera MySight when it was described as crowdfunded ($M = 4.47$) compared to when it was described as venture capital funded ($M = 3.36$; $F_{1,198} = 30.42$, $p < .001$, $d = .78$). A similar pattern of effects is obtained for each of the three process measures. First, perceived quality of MySight was significantly higher when it was described as crowdfunded ($M = 4.31$) compared to when it was described as venture capital funded ($M = 3.80$; $F_{1,198} = 6.95$, $p = .009$, $d = .38$). Second, participants perceived the start-up that developed MySight significantly more strongly as an underdog when it was described as crowdfunded ($M = 5.11$) compared to when it was described as venture capital funded ($M = 2.99$; $F_{1,198} = 151.97$, $p < .001$, $d = 1.75$). Finally, participants felt significantly more strongly that purchasing MySight will reduce inequality in the marketplace when it was described as crowdfunded ($M = 4.96$) compared to when it was described as venture capital funded ($M = 2.95$; $F_{1,198} = 131.64$, $p < .001$, $d = 1.62$). The results of mediation model using bootstrapping procedures (Hayes 2013) reveal that each of the three mediators (tested in isolation) yields a significant indirect effect of funding source on purchase intention (95% confidence intervals for perceived product quality [$CI_{95\%}$] = .09, .62; perceived underdog status [$CI_{95\%}$] = .04, 1.07; one's motivation to help reduce inequality in the market [$CI_{95\%}$] = .88, 1.52).

In our final two studies (4A and 4B), we focus on the equality mechanism by measuring and manipulating consumers' general preference for inequality, respectively, and testing whether this preference moderates the crowdfunding effect. In Study 4A ($N = 305$, $M_{age} = 35$ years, 48% female, MTurk), we again used direct comparison design (similar to Study 1D). We operationalize differences in preference for social inequality using social dominance orientation, which is conceptualized as an individual-level difference mea-

sure that represents preference for group-based dominance hierarchies in which dominant groups oppress subordinate groups (Ho et al. 2015; Jost et al. 2003; Pratto et al. 1994). Product preference on a 7-point item served as our dependent variable. We ran a hierarchical regression analysis with product preference as dependent variable, and preference for social inequality measure, dummy-coded funding source (0 = Start-up A crowdfunded and Start-up B venture capital funded, 1 = Start-up B crowdfunded and Start-up A venture capital funded), as well as the respective interaction term as the independent variables. Results reveal a significant main effect; participants indicated a stronger preference for the product of Start-up B when it was described as crowdfunded ($b = .86$, $SE = .21$, $p < .001$). As predicted, the analysis further revealed a significant interaction effect between funding source and preference for social inequality ($b = -.40$, $SE = .16$, $p = .012$), indicating that the preference for crowdfunded products is stronger for participants who are less accepting of social inequality. Indeed, a floodlight analysis, using the Johnson-Neyman technique (Hayes 2013), shows that the crowdfunding effect is only significant for participants who score low on the social dominance orientation scale (i.e., lower than or equal to 3.32). For participants who score higher on social dominance orientation, however, the crowdfunding effect was not significant (and, interestingly, directionally negative).

In Study 4B, we used a priming paradigm to manipulate preference for social equality.

Participants ($N = 406$, $M_{age} = 36$ years, 44% female, MTurk) were randomly assigned to conditions in a 2(funding source: Start-up A crowdfunded and Start-up B venture capital funded, or vice versa) x 2(acceptance of social inequality: high vs. low) between-subjects design experiment. They were asked to carefully read one of two different versions of an ostensible *New York Times* article which was designed to prime high versus low acceptance and support of social inequality. participants demonstrated a significantly stronger preference for the product of Start-up B when it was described as crowdfunded ($M = 4.59$) compared to when it was described as venture capital funded ($M = 3.64$; $F_{1,332} = 20.77$, $p < .001$, $d = .48$). Whereas the effect of the acceptance of social inequality factor on product preference was not significant ($F_{1,332} = .75$, $p = .39$, $d = .07$), we found, most critically, a significant interaction effect ($F_{1,332} = 5.79$, $p = .017$). In line with the equality mechanism, we found a positive and significant crowdfunding effect in the low acceptance of social inequality condition ($M_{start-up B crowdfunded} = 4.75$, $M_{start-up B venture capital funded} = 3.26$; $F_{1,332} = 23.38$, $p < .001$, $d = .77$). This effect, however, was not significant in the high acceptance of social inequality condition ($M_{start-up B crowdfunded} = 4.42$, $M_{start-up B venture capital funded} = 3.96$; $F_{1,332} = 2.39$, $p = .123$, $d = .23$).

Our study has several contributions. First, we clarify the signal that crowdfunding provides to the broader consumer market by demonstrating that having been crowdfunded can help differentiate products and ultimately increase demand for such products in the marketplace. Importantly, this effect materializes even after having controlled for a product's objective functional characteristics. Second, we explore the underlying causal reasons for this effect, finding three drivers that underlie consumer's preferences for crowdfunded products. Specifically, we see inferences regarding the quality of crowdfunded products, the underdog status underlying these products, and the ability of crowdfunding to drive out inequality in the marketplace motivate consumers to respond to this signaling. Third, we provide added insight to the inequality account by showing how robust this motivation is – i.e., defining it both through experimental manipulation and as a chronic trait belief of the consumer. This

identification broadens our understanding of where individuals see inequality by moving beyond race, gender, nationality, etc. to identify inequality in the marketplace as an important motivator in consumption. Indeed, our work shows that consumers will not only support activities that reduce social inequality among different kinds of people, but also in their consumption behaviors.

From a substantive standpoint, our findings highlight that under certain conditions start-ups and retailers alike might use "crowdfunded" as a differentiating attribute at the point of sale. Because it is currently a rarity to see crowdfunded labelling in the marketplace, we believe this finding provides a disruptive spark not only for crowdfunding thought but also for crowdfunding practice.

REFERENCES

Agrawal, Ajay, Christian Catalini, and Avi Goldfarb (2015), "Crowdfunding: Geography, Social Networks, and the Timing of Investment Decisions," *Journal of Economics and Management Strategy*, 24 (2), 253–74.

Belleflamme, Paul, Thomas Lambert, and Armin Schwienbacher (2014), "Crowdfunding: Tapping the right crowd," *Journal of Business Venturing*, 29 (5), 585–609.

Boudreau, Kevin J, Lars Bo Jeppesen, Kevin J Boudreau, and Lars Bo Jeppesen (2015), "Crowdfunding as ' Donations ': Theory & Evidence Crowdfunding as ' Donations ': Theory & Evidence," *Harvard Business School Working Paper*.

Burtch, Gordon, Anindya Ghose, and Sunil Wattal (2013), "An empirical examination of the antecedents and consequences of contribution patterns in crowd-funded markets," *Information Systems Research*, 24 (3), 499–519.

Carlozo, Lou (2017), "No TitleWhy Equity Crowdfunding Hasn't Taken Off," *US News*, (accessed September 19, 2017), [available at https://money.usnews.com/investing/articles/2017-06-06/why-equity-crowdfunding- hasnt-taken-off].

Gerber, Elizabeth M, Julie S Hui, and Pei-Yi Kuo (2012), "Crowdfunding: Why people are motivated to post and fund projects on crowdfunding platforms," in *Proceedings of the International Workshop on Design, Influence, and Social Technologies: Techniques, Impacts and Ethics*, ACM New York, NY.

Greenberg, Jason and Ethan Mollick (2017), "Activist Choice Homophily and the Crowdfunding of Female Founders," *Administrative Science Quarterly*, (Vc).

Hayes, Andrew F (2013), *Introduction to mediation, moderation, and conditional process analysis: A regression-based approach*, New York: Guilford Press.

Ho, Arnold K., Jim Sidanius, Nour Kteily, Jennifer Sheehy-Skeffington, Felicia Pratto, Kristin E. Henkel, Rob Foels, and Andrew L. Stewart (2015), "The nature of social dominance orientation: Theorizing and measuring preferences for intergroup inequality using the new SDO_7 scale.," *Journal of Personality and Social Psychology*, 109 (6), 1003–28.

Jost, John T., Jack Glaser, Arie W. Kruglanski, and Frank J. Sulloway (2003), "Political Conservatism as Motivated Social Cognition," *Psychological Bulletin*, 129 (3), 339–75.

Kickstarter (2018), "Stats."

Kuppuswamy, Venkat and Barry L Bayus (2017), "Does my contribution to your crowdfunding project matter?," *Journal of Business Venturing*, 32 (1), 72–89.

——— and ——— (2018), "Crowdfunding creative ideas: The dynamics of project backers," in *The Economics of Crowdfunding*, Springer, 151–82.

Meyvis, Tom and Stijn M.J. van Osselaer (2017), "Increasing the power of your study by increasing the effect size," *Journal of Consumer Research*, 44 (5), 1157–73.

Mollick, Ethan (2014), "The dynamics of crowdfunding: An exploratory study," *Journal of Business Venturing*, 29 (1), 1–16.

Ordanini, Andrea, Lucia Miceli, Marta Pizzetti, and Anantharanthan Parasuraman (2011), "Crowd-funding: transforming customers into investors through innovative service platforms," *Journal of service management*, 22 (4), 443–70.

Pratto, Felicia, Jim Sidanius, Lisa M. Stallworth, and Bertram F. Malle (1994), "Social Dominance Orientation: A Personality Variable Predicting Social and Political Attitudes," *Journal of Personality and Social Psychology*, 67 (4), 741–63.

WorldBank (2013), "Crowdfunding' s Potential for the Developing World," *World Bank*, (accessed October 17, 2018), [available at http://documents.worldbank.org/curated/en/409841468327411701/pdf/840000WP0Box380crowdfunding0study00.pdf].

Zvilichovsky, David, Shai Danziger, and Yael Steinhart (2018), "Making-the-Product- Happen: A Driver of Crowdfunding Participation," *Journal of Interactive Marketing*, 41, 81–93.

Identifying Topics and Trends in Research on Construal Level Theory

Susanne Adler, Otto-von-Guericke-University Magdeburg, Germany
Marko Sarstedt, Otto-von-Guericke-University Magdeburg, Germany

EXTENDED ABSTRACT

Construal Level Theory (CLT, Trope and Liberman 2003, 2010) proposes a positive and reciprocal relationship between psychological distance and the mental level of abstraction (construal level). According to this theory, distant times, spaces, persons and low probabilities relate to an abstract, high construal level way of thinking that entails focusing on gestalts rather than details, causes rather than effects, traits rather than states, and goals rather than means (Liberman and Trope 2014). CLT contributes greatly to various research fields by enhancing our understanding of human predictions, evaluations, and behaviors (Soderberg et al. 2015; Trope and Liberman 2010). In consumer research, CLT has gained a prominent place, for example by advancing knowledge on the formation of consumer's preferences and choices (Khan, Zhu, and Kalra 2011; Pizzi, Scarpi, and Marzocchi 2014; Trope and Liberman 2000).

Although research on CLT has produced several overview articles (Dhar and Kim 2007; Liberman and Trope 2014; Soderberg et al. 2015; Trope and Liberman 2010), a cross-cutting analysis overarching the breadth of research fields and themes related to CLT is missing. Following contemporary text analytic methods, we apply a Latent Dirichlet Allocation model (LDA, Blei 2012; Blei, Ng, and Jordan 2003) to extract latent research topics and identify relevant trends in CLT-related research. This procedure assumes that documents inherit different latent topics that are represented by specific terms. Following a probabilistic procedure, a LDA extracts the distribution of topics in each document and the distribution of terms per topic. Thereby, the analysis allows researchers to assess topic content (i.e. topics of CLT-research) and topic frequency among documents (i.e. the prevalence of each topic). To account for topic development, we assess the relative topic frequency over 10 years of CLT-research (2009-2018).

In order to apply the LDA, we obtained bibliometric data on CLT-research from the Web of Science. We included journal articles that correspond to search terms relating to CLT ("construal leve*," "mental construa*," "temporal construa*," and "psychological distan*"). Furthermore, articles had to be published in SCImago Q1 and Q2 ranked journals (SCImago n.d.). In a subsequent content analysis, we excluded a subset of articles that turned up as a sole result of the search term "psychological distan*" due to an insufficient proportion of relevant articles; furthermore, we excluded articles that were not sufficiently related to CLT. After preprocessing, our dataset included 576 documents by 1110 authors published in 195 journals. Starting from 1998, the number of CLT-related publications yielded up to 26 documents per year until 2010 and considerably increased thereafter ($n_{2009} = 26$, $n_{2010} = 25$, $n_{2011} = 43$, $n_{2012} = 44$, $n_{2013} = 50$, $n_{2014} = 51$, $n_{2015} = 70$, $n_{2016} = 69$, $n_{2017} = 73$, $n_{2018} = 77$).

For our topic modeling we used each article's keywords assigned by the authors or by the WoS (Keywords Plus™, Garfield and Sher 1993) and preprocessed the keyword list by merging similar keywords and excluding the most frequent and isolated keywords. This procedure resulted in a list of 635 terms, on which we performed the topic modeling by running the LDA 100 times and k-mediod clustering the results to ensure result stability (Mantyla, Claes, and Farooq 2018). After reviewing several solutions for stability and meaningfulness of the results, we extracted 20 topic clusters (TCs) with an average silhouette measure of cohesion and separation (Kaufman and Rousseeuw 2005) of .248, indicating an overall rather fuzzy solution.

Our results yield several growing TCs that refer to consumer research such as a TC on the public image of a company, including effects of advertising composition and corporate social responsibility. Other TCs relate to (online) communication among consumers (e.g. electronic word of mouth) and customer satisfaction, consumer decision-making and corresponding processes, or include research on prospect theory and related concepts. A TC with particularly growing prominence relates to climate change and energy production. A range of TCs can be linked to the different dimensions of psychological distance. Time-related TCs deal with future predictions, behavioral consequences of time-related thought, intertemporal choices, as well as with memory effects and time perceptions, while social distance related TCs include impression formation and pro-social behavior. Most of these distance-related TCs exhibit a relatively stable research interest, while the TCs on future predictions and impression formation seem to follow a decreasing trend. Hypothetical distance is represented by one slightly declining TC, while the spatial dimension is not clearly represented in any of the TCs. Our analysis further reveals a relative decrease in research interest in the TCs dealing with impulse control and automatic processes such as language use. The remaining TCs relate to organizational psychology and personality, while a number of internally quite heterogeneous TCs show relations to terror-management-theory and time considerations, cognition, and stimuli perception and processing.

To sum up, our results provide a valuable extension to existing review articles and meta-analyses on CLT by taking a broad text analytic approach. Our results underline the growing importance of consumer-related CLT-research ranging from 'classical' theories such as the prospect theory to emerging topics such as online communications and climate change. At the same time, we show that some classical areas of CLT-research like impulse control, impression formation, future predictions and probability are on the decline, which may point to notable shifts in research interest such as recent advances on metamotivation (Nguyen et al. 2019). Other valuable insights can be inferred from 'missing' TCs, for example, regarding spatial distance, emotion research, and sensory sciences.

REFERENCES

Blei, David M. (2012), "Probabilistic Topic Models," *Communications of the ACM*, 55 (4), 77.

Blei, David M., Andrew Y. Ng, and Michael I. Jordan (2003), "Latent Dirichlet Allocation," *Journal of Machine Learning Research*, 3 (January), 993–1022.

Dhar, Ravi and Eunice Y. Kim (2007), "Seeing the Forest or the Trees: Implications of Construal Level Theory for Consumer Choice," *Journal of Consumer Psychology*, 17 (2), 96–100.

Garfield, Eugene and Irving H. Sher (1993), "KeyWords Plus™- Algorithmic Derivative Indexing," *Journal of the American Society for Information Science and Technology*, 44 (5), 298–99.

Kaufman, Leonard and Peter J. Rousseeuw (2005), *Finding Groups in Data: An Introduction to Cluster Analysis,* Hoboken: John Wiley & Sons.

Khan, Uzma, Meng Zhu, and Ajay Kalra (2011), "When Trade-Offs Matter: The Effect of Choice Construal on Context Effects," *Journal of Marketing Research*, 48 (1), 62–71.

Liberman, Nira and Yaacov Trope (2014), "Traversing Psychological Distance," *Trends in Cognitive Sciences*, 18 (7), 364–69.

Mantyla, Mika V., Maelick Claes, and Umar Farooq (2018), "Measuring LDA Topic Stability from Clusters of Replicated Runs," in *Proceedings of the 12th ACMIEEE International Symposium on Empirical Software Engineering and Measurement*, ed. Markku Oivo, New York NY: ACM, 1–4.

Nguyen, Tina, Jessica J. Carnevale, Abigail A. Scholer, David B. Miele, and Kentaro Fujita (2019), "Metamotivational Knowledge of the Role of High-Level and Low-Level Construal in Goal-Relevant Task Performance," *Journal of Personality and Social Psychology*, 117 (5), 876–99.

Pizzi, Gabriele, Daniele Scarpi, and Gian L. Marzocchi (2014), "Showing a Tree to Sell the Forest: The Impact of Attribute- and Alternative-Based Information Presentation on Consumers' Choices," *Journal of Economic Psychology*, 42, 41–51.

SCImago (n.d.), "SJR — SCImago Journal and Country Rank [Portal]," http://www.scimagojr.com.

Soderberg, Courtney K., Shannon P. Callahan, Annie O. Kochersberger, Elinor Amit, and Alison Ledgerwood (2015), "The Effects of Psychological Distance on Abstraction: Two Meta-Analyses," *Psychological Bulletin*, 141 (3), 525–48.

Trope, Yaacov and Nira Liberman (2000), "Temporal Construal and Time-Dependent Changes in Preference," *Journal of Personality and Social Psychology*, 79 (6), 876–89.

_____ (2003), "Temporal Construal," *Psychological Review*, 110 (3), 403–21.

_____ (2010), "Construal-Level Theory of Psychological Distance," *Psychological Review*, 117 (2), 440–63.

New Media Technology Market Emergence: The Implication of Imagination Processes

Kelley Cours Anderson, Texas Tech University, USA

EXTENDED ABSTRACT

Today's media technology allows consumers unique ways to interact with both firms and other consumers (Zhang 2019). Yet, as new media technology emerges rapidly, this provides opportunities to fundamentally change the landscape beyond common imagination. This study investigates virtual reality (VR), a disruptive technology (Goldman Sachs 2016). Although the future of this technology is still unclear, this study hopes to add understanding of how media technology (i.e., VR-content) is mobilized in its early form and identify implications of the current and future market.

Market system dynamics research recognizes markets as complex social systems and investigates "how actors and institutions actively shape (and are shaped by) them" (Giesler and Fischer 2017, p. 3). Literature recognizes the important role different actors play to shape market systems (e.g., Dolbec and Fischer 2015; Giesler 2012; Humphreys 2010; Humphreys and Carpenter 2018; Karababa and Ger 2011; Martin and Schouten 2014). Technology can be disruptive to existing marketing systems (Giesler 2008)movies, software, and the written word; however, the exploration of how new media technology markets emerge is less explored.

As such, this study contributes to market systems dynamics literature by researching how media technology emerges and seeks legitimacy in multiple verticals, or industries, among a network of multiple actors. In particular, I explore: 1) what role do actors play to develop and mobilize VR-content into additional verticals, 2) what potential market futures are possible for VR-content, and, 3) what implications do these market futures hold for actors within the network?

Method

Using extended case method (ECM) approach (Burawoy 1998), I follow the early mobilization of VR-content among multiple actors within the market. ECM is a recommended approach (Arsel 2017), especially relevant for market studies wherein "the goal… is to construct fruitful extensions of theory rather than to subject alternatives" (Holt 2002, p. 73). This includes its inception from the start-up turned private firm and its interaction with the firms' internal actors and customers. VR-content technology investigated incorporates hardware (i.e., cameras) and software (i.e., artificial intelligence, platform) to generate the content to store and share the content. Data collection includes archival documents and semi-structured interviews with 38 informants who could speak to the mobilization of the technology. To analyze the data, I follow the multi-stage process used by Holt (2002).

Findings

I find that the technology mobilizes through imagination processes of firm-actors, customers, and consumers. Different forms of imagination processes among multiple actors drive the creation and growth of the VR-content market. Imagination in our literature commonly focuses on isolated forms of imagination, such as fantasy and sensory imagination (Philips 2017).

Market Emergence

The firms' actions in early development rely on recreative imagination processes, or the ability to envision the world differently than currently experienced, often resulting in foreseeing something that doesn't exist (Currie and Ravenscroft 2002). Initially, the develop-ers' goal of duplicating real-world spaces aimed to break down *"the barrier between the physical and digital worlds"* (press release)[1]. By envisioning an environment of digital duplicates, developers envisioned a world that did not exist. And while they were not able to imagine all functions and sensory elements related to the imagined world, it prompted the development of the VR-content technology.

Market Building

Actors participate in creative imagination (Currie and Ravenscroft 2002), where they combine ideas derived from past experience in unexpected ways. Creative imagination emerges when ideas are put together "in a way that leads to the creation of something valuable in art, science, or practical life" (Currie and Ravenscroft 2002, p.9). This stems from consumers' roles to build the market unexpectedly:

> *Every time you think you understand our customers, you find out about some guy in Zimbabwe that is using it to scan something you've never heard of before. We literally have people who are taking our camera and sticking it down manhole covers. Our camera was not designed to go down manhole covers.* (Andrew, firm-actor)

Many times, the roles of these actors are multiple and overlapping. For example, actors may come across the technology as a real estate consumer, but their imagination establishes new roles for themselves (i.e., customer) and the technology (e.g., innovative retail showroom). Through the imagination of multiple actors, the technology takes on new roles and is mobilized into multiple verticals, creating a wider network for the technology.

Market Futures

Further, I identify potential market futures envisioned by actors' recreative imagination. This reveals the opportunity for the content and its data derivatives to be used for further market expansion. This creates concerns for some forward-thinking customers:

> *I have almost 300 models in my account, and I would probably feel that somebody was taking advantage if they were using my content to create derivative work to license it…* (Roger, customer)

The tensions surrounding ownership of the content may hinder its continued mobilization and legitimization. The imagination of future market opportunities reveals several implications that may positively and negatively impact multiple actors in the network and may demand changes in the market's dynamics.

Discussion

This study contributes to the developing market system dynamics literature (Giesler and Fischer 2017). Specifically, this paper answers calls to understand market system dynamics when influenced by multiple contexts and views (Kjellberg et al. 2012). This study also responds to calls for a broader understanding of how imagination can influence innovative practices and overall markets (Akaka and Schau 2019; Jenkins and Molesworth 2018). This study also begins the exploration of potential power consequences of market

---

[1]   Note that all informant names are pseudonyms, and other actors and camera manufacturer names quoted are masked. Quotes are cleaned for clarity.

systems (Kjellberg et al. 2012), by revealing both positive and negative implications. Firms with a data surplus may result in significant scrutiny surrounding appropriate and ethical uses of this data (Zuboff 2019). Furthermore, tensions between actors' perspective of creative license may constrain potential market futures. With imagination comes responsibility (Brann 1991). This requires additional understanding by all stakeholders involved, and likely new actors (i.e., policy-makers) to be added to the system to facilitate this education process.

REFERENCES

Akaka, Melissa Archpru and Hope Jensen Schau (2019), "Value creation in consumption journeys: Recursive reflexivity and practice continuity," *Journal of the Academy of Marketing Science*, 47 (3), 499–515.

Arsel, Zeynep (2017), "Asking questions with reflexive focus: A tutorial on designing and conducting interviews," *Journal of Consumer Research*, 44 (February), 939–48.

Brann, Eva T.H. (1991), *The world of the imagination*, Savage, Maryland: Rowman & Littlefield Publishers, Inc.

Burawoy, Michael (1998), "The extended case method," *Sociological Theory*, 16 (1), 4–33.

Currie, G. and I. Ravenscroft (2002), *Recreative minds: Imagination in philosophy and psychology*, Oxford University Press.

Dolbec, Pierre-Yann and Eileen Fischer (2015), "Refashioning a field? Connected consumers and institutional dynamics in markets," *Journal of Consumer Research*, 41 (6), 1447–68.

Giesler, Markus (2008), "Conflict and compromise: Drama in marketplace evolution," *Journal of Consumer Research*, 34 (6), 739–53.

——— (2012), "How doppelgänger brand images influence the market creation process: Longitudinal insights from the rise of botox cosmetic," *Journal of Marketing*, 76 (6), 55–68.

——— and Eileen Fischer (2017), "Market system dynamics," *Marketing Theory*, 17 (1), 3–8.

Goldman Sachs (2016), "Virtual & augmented reality: Understanding the race for the next computing platform," *Goldman Sachs Group Inc.*

Holt, Douglas B. (2002), "Why Do Brands Cause Trouble? A Dialectical Theory of Consumer Culture and Branding," *Journal of Consumer Research*, 29 (1), 70–90.

Humphreys, Ashlee (2010), "Megamarketing: The creation of markets as a social process," *Journal of Marketing*, 74 (March), 1–19.

——— and Gregory S. Carpenter (2018), "Status Games: Market driving through social influence in the U.S. Wine industry," *Journal of Marketing*, 82 (5), 141–59.

Jenkins, Rebecca and Mike Molesworth (2018), "Conceptualizing consumption in the imagination: Relationships and movements between imaginative forms and the marketplace," *Marketing Theory*, 18 (3), 327–47.

Karababa, Emınegül and Gülız Ger (2011), "Early modern ottoman coffeehouse culture and the formation of the consumer subject," *Journal of Consumer Research*, 37 (5), 737–60.

Kjellberg, Hans, Kaj Storbacka, Melissa Akaka, Jennifer Chandler, John Finch, Sara Lindeman, Helge Löbler, Katy Mason, Janet McColl-Kennedy, and Suvi Nenonen (2012), "Market futures/ future markets: Research directions in the study of markets," *Marketing Theory*, 12 (2), 219–23.

Martin, Diane M. and John W. Schouten (2014), "Consumption-Driven Market Emergence," *Journal of Consumer Research*, 40 (5), 855–70.

Philips, Barbara J. (2017), "Consumer imagination in marketing: A theoretical framework," *European Journal of Marketing*, 51 (11–12), 2138–55.

Zhang, Jonathan Z. (2019), "Dynamic customer interdependence," *Journal of the Academy of Marketing Science*.

Zuboff (2019), *The age of surveillance capitalism: The fight for a human future at the new frontier of power*, New York NY: Hachette Book Group.

How Brand Conversations on Social Media Prompt Jealousy in Brand Relationships

Andria Andriuzzi, Université Jean Monnet, France
Géraldine Michel, IAE Paris-Sorbonne, France
Claudiu V. Dimofte, San Diego State University, USA

EXTENDED ABSTRACT

Prior research has shown that consumers develop feelings towards brands that are similar to those they have towards other individuals (Fournier and Alvarez 2012). One increasingly important avenue that practitioners employ in order to bring brands closer to consumers is social media and a wide range of online platforms (Voorveld 2019). A specific form of such interaction, *brand conversation*, is a particularly relevant construct consisting of a series of online messages exchanged between one or more consumers and a brand [representative]. The exchanges that brands and consumers have on social media are conceptually akin to social interactions, but happen to occur within new media types. Thus, research on social interaction is relevant to understanding the processes that may be at work.

In order to answers these questions, our research employs face-work theory (Goffman 1955), attachment theory (Park et al. 2010), and the interpersonal theory of love applied to consumer situations (Whang, Sahoury, and Zhang 2004). We propose that, similar to the case of personal relationships that involve affect, when a partner bestows flattery or compliments onto someone outside of the relationship there is the potential to threaten the other partner and produce jealousy, with potential deleterious effects on the relationship.

Developed by Goffman (1955), face-work theory explains how people behave when interacting with others. It assumes that during an exchange each participant commits to carrying out two simultaneous actions: maintaining their own face while ensuring the other participants do not lose face (Goffman 1955). To achieve this dual mission, they use a number of strategies aimed at avoiding face-threatening acts (FTAs) as well as producing face-flattering acts (FFAs) (Brown and Levinson 1987). In an online context, FFA can consist of flattering consumers, paying respect to them, or more generally of conveying appreciative expressions (Grossman 1998). FFAs have been shown to have a positive effect on consumers (Fombelle et al. 2016) and given that they are more efficient when produced publicly rather than privately one would expect face-work strategies to have an impact on consumers via social media. We thus expect that mimicking human interactions norms (e.g., using FFAs), will create consumer perceptions according to which brands have human characteristics. We also postulate that brand FFAs will be more or less well perceived depending on the degree of brand attachment. This is similar to social relationships, where those in stronger, closer ones are less likely to crave reinforcement than individuals who are part of weaker relationships.

Psychology research supports the existence of different flattery perceptions depending on context: we like better those who flatter us than those who flatter others (Vonk 2002). This occurs because most people have positive self-esteem and therefore are likely to think their ingratiator is sincere. Also, observers lack information on the target of ingratiation and thus will often question the ingratiated judgement. In a similar manner, consumers prefer being flattered by a favored brand to seeing strangers be flattered by it. If brand love (Batra et al. 2012) exists, then brand jealousy is sure to follow (Sarkar and Sreejesh 2014).

Previous research has addressed consumer brand perceptions along the warmth and competence dimensions (e.g., Fournier and Alvarez 2012; Kervyn, Fiske, and Malone 2012) and found that brand warmth (but not brand competence) is a key driver of consumers' online brand endorsements (Bernritter et al. 2016). This is in line with the intuition that personal relationships in which individuals invest the most tend to be affective in nature, as proposed by Berscheid's (1983) model of emotional interdependence in close relationships.

Formally stated:

Hypothesis 1:   *Brands are perceived as more human when they use FFAs addressed to consumers.*

Hypothesis 2:   *The use of FFAs addressed to other consumers produces higher brand humanization perceptions for consumers of low than for consumers of high brand attachment.*

Hypothesis 3:   *Consumers display jealousy after observing brand FFAs addressed to others.*

Hypothesis 4:   *Brand positioning moderates the focal effects, such that the links between the use of FFAs and (a) brand humanization and (b) jealousy is stronger for brands positioned on warmth relative to those positioned on competence.*

Study 1 ($N = 188$ adults from an online panel) addresses H1 and H2 in a 2 (brand FFA: absent vs. present) x 2 (brand attachment: low vs. high) between-subjects design. Participants imagined browsing their Facebook newsfeed and noticing a particular brand-consumer conversation. Brand FFAs were manipulated by including (or not) appreciative expressions into the brand's posts. Participants indicated the extent to which they anthropomorphized the brand on six 7-point semantic differential scales (adapted from Hudson et al. 2015; α = .89). A two-way ANOVA on perceptions of anthropomorphism with the two experimental factors as predictors uncovered a significant effect of brand attachment ($F(1, 182) = 26.57, p < .001$) and a significant interaction between the two factors ($F(1, 182) = 7.19, p < .01$). Consumers not particularly attached to the brand perceived the brand as more human when employing FFAs (vs. when not), but this effect was absent for consumers strongly attached to the brand.

Study 2 ($N = 397$ undergraduates) assesses the extent to which consumers would perceive the brand as more humanlike and express more positive brand perceptions and less jealousy when they (vs. another consumer and vs. control) would be the target of a brand's flattery (H3). The design was thus a three-cell (FFA target: self vs. other vs. control) between-subjects comparison. Participants were asked to provide a specific brand that they had a relationship with, which was subsequently employed by the software in the study's cover story. The subsequent procedure and measure were similar to Study 1. A one-way ANOVA on the brand anthropomorphism item revealed a significant main effect of FFA: $F(2, 389) = 5.65, p < .01$. Respondents perceived that a brand's use of FFAs, whether aimed at the self ($M = 5.05$) or another consumer ($M = 5.20$) appeared as more humanlike than the same brand not employing FFAs ($M = 4.60$). Furthermore, participants observing an FFA aimed at the self reported less jealousy ($M = 5.19$) than those observing the brand aiming the FFA at another consumer ($M = 4.57$) or those noting a brand conversation that did not include an FFA ($M = 4.53; F(2, 389) = 17.75, p < .001$).

Study 3 (N = 126 undergraduates) adds a brand positioning variable such that more jealousy was expected when the brand was positioned on warmth rather than competence (H4). The design was thus a 3 (FFA target: self vs. other vs. control) x 2 (brand positioning: on warmth vs. competence) between-subjects. The cover story and measures replicated Study 2. Participants assessed brand positioning on a 6-point semantic differential item anchored at 1 = *definitely warmth-based* and 6 = *definitely competence-based*. A two-way ANOVA with the two experimental factors as predictors and the brand feelings item as the dependent measure revealed a significant main effect of FFA: $F(2, 120)$ = 4.16, $p < .02$. Participants observing an FFA aimed at the self reported less jealousy (M = 5.43) than those observing the brand aiming the FFA at another consumer (M = 4.93) or those noting a brand conversation that did not include an FFA (M = 4.81). However, this effect did not vary significantly by brand positioning, potentially due to the study's low power.

While much research addresses the effects of social media in general, little is known about how brand flattery impact consumer response. This research identifies the relationships between brand flattery, brand humanization, and brand jealousy, thus contributing to literature on brand-consumer relationships.

REFERENCES

Abhigyan Sarkar, and S. Sreejesh (2014), "Examination of the Roles Played by Brand Love and Jealousy in Shaping Customer Engagement," *Journal of Product and Brand Management*, 23 (1), 24-32.

Batra, Rajeev, Aaron Ahuvia, and Richard P. Bagozzi (2012), "Brand Love," *Journal of Marketing*, 76 (2), 1-16.

Bernritter, Stefan F., Peeter W. J. Verlegh, and Edith G. Smit (2016), "Why Nonprofits Are Easier to Endorse on Social Media: The Roles of Warmth and Brand Symbolism," *Journal of Interactive Marketing*, 33 (1), 27-42.

Berscheid, Ellen (1983), "Emotion," *Close Relationships*, 110-168.

Brown, Penelope and Stephen C. Levinson (1987). *Politeness: Some Universals in Language Use. Studies in Interactional Sociolinguistics 4.* Cambridge: Cambridge University Press.

Fombelle, Paul W., Sterlign A. Bone, and Katherine N. Lemon (2016), "Responding to the 98%: Face-Enhancing Strategies for Dealing with Rejected Customer Ideas," *Journal of the Academy of Marketing Science*, 44 (6), 685-706.

Fournier, Susan, and Claudio Alvarez, C. (2012), "Brands as Relationship Partners: Warmth, Competence, and in-between," *Journal of Consumer Psychology*, 22 (2), 177-185.

Goffman, Erving (1955), "On Face-Work; An analysis of Ritual Elements in Social Interaction," *Psychiatry: Journal for the Study of Interpersonal Processes*, 18 (3), 213-231.

Grossman, Randi Priluck (1998), "Developing and Managing Effective Consumer Relationships," *Journal of Product & Brand Management*, 7 (1), 27-50.

Hudson, Simon, Li Huang, Martin S. Roth, and Thomas J. Madden (2015), "The Influence of Social Media Interactions on Consumer-Brand Relationships: A Three-Country Study of Brand Perceptions and Marketing Behaviors," *International Journal of Research in Marketing*, 1 (33), 27-41.

Kervyn, Nicolas, Susan T. Fiske, and Chris Malone (2012), "Brands as Intentional Agents Framework: How Perceived Intentions and Ability Can Map Brand Perception," *Journal of Consumer Psychology*, 22 (2), 166-176.

Park, C. Whan, Deborag J. MacInnis, Joseph Priester, Andreas B. Eisingerich, and Dawn Iacobucci (2010), "Brand Attachment and Brand Attitude Strength: Conceptual and Empirical Differentiation of Two Critical Brand Equity Drivers," *Journal of Marketing*, 74 (6), 1-17.

Vonk, Roos (2002), "Self-Serving Interpretations of Flattery: Why Ingratiation Works," *Journal of Personality and Social Psychology*, 82 (4), 515-526.

Voorveld, Hilde A. M. (2019), "Brand Communication in Social Media: A Research Agenda," *Journal of Advertising*, 48 (1), 14-26.

Whang, Yun-Oh, Jeff Allen, Niquelle Sahoury, and Haitao Zhang (2004), "Falling in Love with a Product: The Structure of a Romantic Consumer-Product Relationship," *Advances in Consumer Research*, 31, 320-327.

Food App-reciation : How Nutrition-related Apps Shape Food Choices and Consumer Wisdom ? A Case Study Approach.

Camille Anin, Université Grenoble-Alpes, France
Agnès Helme-Guizon, Université Grenoble-Alpes, France

EXTENDED ABSTRACT

Food is one of the cornerstone of well-being. But food and food-related decisions are complex choices often experienced as a source of stress and anxiety (Rozin, 1999). And health and sustainability are growingly valued by consumers when making food choices, increasing the number of guiding food values and subsequent need for trade-offs between them (Kriflik & Yeatman, 2010 ; Aschemann-Witzel, 2015). In this context, mobile apps are flourishing in order to help people make healthier food decisions. Although food purchasing is a key moment in the food consumption cycle, research paid little attention to the mobile apps dedicated to help consumers when purchasing food. Prior research on nutrition apps has focused on consumer attitude (Doub et al., 2015), engagement (Flaherty et al., 2019) and behavior change techniques (Flaherty et al., 2018; Gilliland et al., 2015). We argue more qualitative studies are required on the use of those food-related apps by consumers in order to investigate the impact of mobile app not only on app use and healthy behavior but, more largely, on consumer decision-making and consumer well-being.

This paper explores how nutrition apps guide consumer decision-making and affect consumer well-being, drawing on the food-choice process model (Connors, 2001) and consumer wisdom (Luchs & Mick, 2018). The food-choice process model (Furst et al., 1996; Connors et al., 2001) offers a comprehensive framework in which food choices are complex choices and lead people to rely on a personal food system that guides their food values and subsequent choices. Health, taste, cost, managing relationships, and convenience are major food values while other less prominent food values exist such as waste, ethics or symbolism (Connors et al., 2001). Consumer wisdom refers to consumer judgements aligned with "a synchronization of values, goals, and action" in the pursuit of well-being (Luchs & Mick, 2018) and enables us to further explore food values. According to Sternberg's (1998), wisdom is related to tacit knowledge, "*an action oriented, typically acquired without direct help from others, and allows individuals to achieve goals they personally value"*. We purposefully chose Sternberg's (1998) balance theory of wisdom to explore consumer wisdom as it offers a perspective on balance arising from person-context situation complementary to the value management system proposed within food-choice process model. The food-choice process model and the balance theory of wisdom enable to dig deeper into the complexity of food-related choices and associated consumer decision-making strategies.

In order to investigate the influence of food app use on consumer decision-making and well-being, we chose Yuka as a case-study. Yuka is a popular app in France which enables to scan food products and immediately have access to an overall product evaluation in order to make healthier choices and by having suggestions of healthier alternatives. The depth interviews with 18 users were conducted by the researchers and trained students. Participants were aged between 20 to 70 yo. Most of them (16 out of 18) were women. The interviews lasted 30 to 60 min and were fully transcribed. Content analysis included three *a priori* themes. The three first theme were based on Sternberg's (1998) balance theory of wisdom which defines tacit knowledge as: procedural and action-oriented (1), relevant to the attainment of goals people value (2) and acquired with little help from other (3). A fourth theme was created *a posteriori* to embrace participants' ambivalence regarding the ability of the app to enhanced their wisdom as consumers. An summary of results is available at Table 1.

Balancing Health with Other Food-related Values (Yuka as a Wisdom Manager). All interviewees declare using Yuka in order to make better and more informed food choices and to consume product good for their health (and, for some, for the environment). The knowledge provided by Yuka is considered relevant to the pursuit of health goals valued by consumers. Meanwhile, they display micro-strategies to ensure their personal pursuit of well-being. Yuka provides some information to make healthy choices. However people take in account other food-related values (Connors, 2001) than health, such as price, taste, convenience or managing relationships, acknowledging that food choices is not only a personal but also a social choice. The best ranked product is not always considered the best option and some participants reported to make their own personal ranking based on their appropriation of the information provided by Yuka.

Pursuing Personal and Collective Well-being (Yuka as a Source of Consumer Wisdom). The mobile app provides third-party information about properties and ingredients of food products, contributing to healthier food choices. Food knowledge provided by Yuka is both procedural and action-oriented. Yuka can contribute to consumer wisdom through its influence at both individual (consumers' conscientization about food products in order to adopt a healthier lifestyle) and more collective level (influencing the food industry toward the production of healthier food). To this regard, it can be considered as a source of consumer wisdom. Nevertheless, not all participants shared this optimistic perception of Yuka. For most of them, doubt and wisdom can be closely entangled.

Fostering Wisdom, Creating Doubt (Yuka as a Wisdom Enhancer). Yuka appears, for users, as a relatively credible option to help them make better choices with little help from others. Using Yuka both diminishes a feeling of uncertainty and fosters new forms of consumer skepticism. Critical thinking can be applied either to the food industry or both to the food industry and the app, considering that Yuka may be an extension of the food industry and may not entirely be reliable. Absence of more valuable alternative lead those consumers to use the app while they do not entirely trust it. Yuka can offer consumers opportunities to critically assess the information they receive.

Empowering People through Wisdom ? Yuka as an ambiguous source of tacit knowledge. A paradox lies in the interviewees' narratives. On the one hand, Yuka can be experienced by some participants as an empowering app as it can produce a higher sense of agency and perceived control. On the other end, some participants realized that their control over their food choices is limited for three main reasons. Firstly, they feel lost when the alternative product suggested by Yuka is not accessible. Secondly, they experience a feeling of a "health diktat" that somehow prevents them from valuing other food values than health, values that matter to them. Thirdly, when they are not able to use the app, they get anxious about making a good choice as they became dependent on it. The overreliance on the app as an exclusive source of information may have unexpected consequences on consumers' confidence to make appropriate choices on their own, undermining consumer well-being on the long run. Empowerment related to perceived control should be distinguished from

"effective" control on health behavior, which echoes the discussion on the different meaning of empowerment in marketing (Bachouche & Sabri, 2018; Fayn, 2019).

Our research highlighted that Yuka is an app that can be looked at as potential a source of consumer wisdom (by balancing different food values, helping consumers to have a great influence on their food choices and on the food industry, by fostering consumer's critical thinking). Yet, research calls for caution to consider it as an actual source of wisdom. Yuka is an ambivalent ressource: combinaison of above mentionned factors may lead people to make whether empowering or disempowering choices. Food app use may create feelings of loss of control, both threatening consumer well-being. Future research could pay attention to factors of (dis) empowerment such regarding food app use as level of food literacy should deserve more attention. This exploratory is not without limitations regarding the limited diversity of the sample and the exclusive use of depth interview. Nevertheless, this research provide valuable insights for future research, underlining the need to connect food-related apps use with literature on consumer empowerment but also to pay more attention to the experiences of anxiety and its consequences on consumer well-being.

REFERENCES

Aschemann-Witzel, J. (2015). Consumer perception and trends about health and sustainability : Trade-offs and synergies of two pivotal issues. *Current Opinion in Food Science*, *3*, 6-10.

Bachouche, H., & Sabri, O. (2019). Empowerment in marketing : Synthesis, critical review, and agenda for future research. *AMS Review*, *9*(3), 304-323.

Doub, A. E., Levin, A., Heath, C. E., & LeVangie, K. (2015). Mobile app-etite : Consumer attitudes towards and use of mobile technology in the context of eating behaviour. *Journal of Direct, Data and Digital Marketing Practice*, *17*(2), 114-129.

Fayn, M.-G., Garets, V. des, & Rivière, A. (2019). Mieux comprendre l'empowerment du consommateur. *Revue française de gestion*, *N° 278*(1), 121-145.

Flaherty, S. J., McCarthy, M. B., Collins, A. M., & McAuliffe, F. M. (2019). A different perspective on consumer engagement: Exploring the experience of using health apps to support healthier food purchasing. *Journal of Marketing Management*, *35*(3-4), 310-337.

Flaherty, S.-J., McCarthy, M., Collins, A., & McAuliffe, F. (2018). Can existing mobile apps support healthier food purchasing behaviour? Content analysis of nutrition content, behaviour change theory and user quality integration. *Public Health Nutrition*, *21*(2), 288-298.

Furst, T., Connors, M., Bisogni, C. A., Sobal, J., & Falk, L. W. (1996). Food choice : A conceptual model of the process. *Appetite*, *26*(3), 247-265.

Gilliland, J., Sadler, R., Clark, A., O'Connor, C., Milczarek, M., & Doherty, S. (2015). Using a Smartphone Application to Promote Healthy Dietary Behaviours and Local Food Consumption. *BioMed research international*, *2015*, 841368.

Kriflik, L. S., & Yeatman, H. (2005). Food scares and sustainability : A consumer perspective. *Health, Risk & Society*, *7*(1), 11-24.

Luchs, M. G., & Mick, D. G. (2018). Consumer Wisdom : A Theoretical Framework of Five Integrated Facets. *Journal of Consumer Psychology*, *28*(3), 365-392.

Rozin, P., Fischler, C., Imada, S., Sarubin, A., & Wrzesniewski, A. (1999). Attitudes to Food and the Role of Food in Life in the U.S.A., Japan, Flemish Belgium and France : Possible Implications for the Diet–Health Debate. *Appetite*, *33*, 163-180.

Sternberg, R. J. (1998). A Balance Theory of Wisdom: *Review of General Psychology*.

Strategic Product Displays on Social Media Through Proactive Nostalgia

Eda Anlamlier, University of Nevada, Las Vegas, USA
Sevincgul Ulu, New Jersey City University, USA

EXTENDED ABSTRACT

Nostalgia is a commonly felt longing for the past and usually associated with positive feelings such as warmth, joy and gratitude (Holak and Havlena, 1998; Sedikides at al., 2008; Wildschut et al., 2006). Recently, nostalgia on social media become so prevalent that about 520 million posts have been shared with the hashtag of #tbt (Throw-Back-Thursday; as of March 1, 2020). While some social media platforms (e.g., SnapChat and Instagram) let users create temporary posts, i.e., sharing pictures and videos that disappear soon, sharing posts permanently has been the default function for many social media outlets (Sheldon and Bryant, 2016). The present research uncovers how and why consumers decide to publicly document current consumption experiences on social media, which is different from savoring past experiences or future experiences (Chun, Diehl, and MacInnis, 2017).

When products are included in social media posts, the intention to remember them in the future can impact the duration of posting. Particularly, one can keep a post of a possession for a day (temporary/ephemeral posting) or years (permanent posting). The present research explores how consumers strategize the social media display of two types of products: (1) experiential products, through which consumers wish to gain life experiences and (2) material products, through which consumers intend to receive physical benefits (Van Boven and Gilovich, 2003). Previous research show experiential products deliver more, longer-lasting satisfaction and happiness compared to material products (Van Boven and Gilovich, 2003). Therefore, we predict consumers post experiential products permanently on social media more often than material products as reminders of valuable moments they wish to remember later. We define this phenomenon as *proactive nostalgia* referring to the realization that one would wish to remember and cherish a current consumption experience in the future.

The present research investigates whether consumers strategize display duration of products on social media based on product type and whether it is due to elevated proactive nostalgia, the goal of savoring a specific consumption experience to remember and relive it later.

Hypothesis 1: Consumers share experiential products on social media for long-term more often than they share material products.

Hypothesis 2: Proactive nostalgia increases the tendency to share consumption experiences on social media for long-term.

Hypothesis 3: Consumers share experiential products on social media for long-term due to proactive nostalgia motivation.

Study 1a

Study 1a explored how social media users shared material vs. experiential products. MTurk workers (N=192; 47% female; 50% between age 35-44) imagined either having a good picture/video of something they experienced (experiential product) or a product they have (material product). Next, they reported whether they would want to share a short-term vs. long-term post about it on social media.

A chi-square test of independence showed the relation between product-type (experiential vs. material) and display duration (long-term vs. short-term post) was significant (X^2 (1, N= 192)=12.92, p< 0.01). Participants tended to share more long-term posts about their experiences (80%) than material products (55%) supporting H1.

Study 1b

Study 1b aimed to replicate Study 1a findings utilizing a similar design but examining real life behaviors. College students (N= 149; 42% female; M_{age} = 21) reported how they shared their products and experiences on social media in the past. The result of the chi-square test of independence demonstrated participants created long-term posts about their experiences on social media more frequently than material products (X^2 (1, N=149)= 3.68, p= 0.055). Findings suggest people strategize product displays on social media based on product type.

Study 2

Study 2 investigated the relationship between product type and social media display duration utilizing a between-subjects design (3D TV: as an object vs. an experience; Mann and Gilovich, 2016). College students (N=231; 55.84% female; M_{age}=23) reported how much they would share this 3D-TV as a temporary vs. permanent post on a 7-point scale.

ANOVA results showed participants in the experiential (vs. material) product condition reported significantly greater tendency to post the 3D-TV permanently (F(1, 229)= 4.71, *p*= .03). Participants in the experiential product condition were more likely to share their 3D TV as a permanent post ($M_{Experiential}$= 2.28) than ones in the material product condition ($M_{Material}$= 1.79).

Study 3

Study 3 examined whether people share experiential products for long-term due to proactive nostalgia. College students (N= 221; 43% female; M_{age}= 20) reported their proactive nostalgia level using the Proactive Nostalgia Scale (Alpha=0.87; "I want to remember my post in the future"; "My post will maintain its value over time"). Regression results revealed proactive nostalgia significantly elevated the tendency to post for long-term (b= .50, t(1, 220)= 6.76, p< 0.01) supporting H2.

Study 4

Study 4 investigated whether proactive nostalgia mediated the relationship between consumers' product type perception and posting duration. MTurk workers (N=202, 67% female, Mage=36) were requested to imagine buying a new 3D-TV (Mann and Gilovich, 2016) and sharing a post about it. They stated how they would share the post (temporary vs. permanent) and answered the Proactive Nostalgia Scale (as used in Study3). Lastly, they answered how much they viewed the 3D-TV as an experiential product.

Mediation results with 5000 bootstrapping (Model 4; Hayes, 2017) show the effect of perceived experience level on posting tendency was fully mediated by proactive nostalgia (indirect= 0.17, SE= 0.05 95% CI (0.0686 - 0.2670)). Both the effect of perceived experience level on proactive nostalgia (b= 0.20, t(198)=3.48, p< 0.01) and the effect of proactive nostalgia on posting tendency (b= 0.85, t(197)=12.78, p< 0.01) were significant. Thus, confirming H3, the ef-

fect of perceived experience level on posting tendency was mediated by the proactive nostalgia level.

GENERAL DISCUSSION

Findings of five studies suggest when consumers perceive their possessions as experiential, they experience proactive nostalgia, which motivates them to increase product display duration on social media. The emergence of proactive nostalgia suggests the utility of social media has expanded from sharing current activities and remembering past to creating positive memories for the future. Current findings illuminate how experiential products help consumers create valuable memories to cherish later, which could boost inspiration and goal pursuit (Stephan et al. 2015) and reveal product valuation differences based on product type.

REFERENCES

Chun, HaeEun Helen, Kristin Diehl, and Deborah J. MacInnis. "Savoring an upcoming experience affects ongoing and remembered consumption enjoyment," *Journal of Marketing* 81, no. 3 (2017): 96-110.

Hayes, Andrew F. (2017), "*Introduction to mediation, moderation, and conditional process analysis: A regression-based approach,*" *Guilford Press, New York.*

Holak, Susan L., and William J. Havlena. "Feelings, fantasies, and memories: An examination of the emotional components of nostalgia," *Journal of Business Research* 42, no. 3 (1998): 217-26.

Mann, Thomas C., and Thomas Gilovich. (2016). "The asymmetric connection between money and material vs. experiential purchases," *The Journal of Positive Psychology*, 11(6), 647-58.

Sedikides, Constantine, Tim Wildschut, Jamie Arndt, and Clay Routledge. (2008). "Nostalgia: Past, present, and future," *Current Directions in Psychological Science*, 17(5), 304-07.

Sheldon, Pavica, and Katherine Bryant. (2016). "Instagram: Motives for its use and relationship to narcissism and contextual age," *Computers in Human Behavior*, 58, 89-97.

Stephan, Elena, Constantine Sedikides, Tim Wildschut, Wing-Yee Cheung, Clay Routledge, and Jamie Arndt. (2015). "Nostalgia-evoked inspiration: Mediating mechanisms and motivational implications," *Personality and Social Psychology Bulletin*, *41*(10), 1395-410.

Van Boven, Leaf, and Thomas Gilovich. (2003). "To do or to have? That is the question," *Journal of Personality and Social Psychology*, 85(6), 1193.

Wiking, Meik (2019). "The Art of Making Memories," William Morrow.

Wildschut, Tim, Constantine Sedikides, Jamie Arndt, and Clay Routledge.. (2006). "Nostalgia: Content, triggers, functions," *Journal of Personality and Social Psychology*, 91(5), 975–93.

Ontography and Sustainable Consumption
Eric J Arnould, Aalto University School of Business, Finland

EXTENDED ABSTRACT

This paper investigates the possibility of neo-animistic renewal and offers a glimpse of a sustainable consumption system against the ecological precarity consumer capitalism produces. Neo-animism addresses the challenges imposed by the Dominant Social Paradigm (DSP) identified in micromarketing (Kilbourne, McDonagh, and Prothero 1997), the enduring attitude-behavior gap identified in green consumer research (Tarfaoui and Zkim 2017), the partitioning found in consumer practice research, and the limitations of marketing's social exchange paradigm (Bagozzi 1978; Brinberg and Wood 1983; Pandya and Dholakia 1992).

From animist ontography (Costa and Fausto 2010; Descola 2012), critical and transformative marketing and consumer research can find fresh insight and guidance for diagnosis of successful and flawed experiments in sustainable consumption. Tsing's (2015) account gives glimpses of an eco-economy structured by the neo-animist governance mechanisms Descola identifies in his comparative ontography of human foraging/horticultural cultures. Tsing defines a contemporary neo-animistic consumption system that matsutake, an aromatic mushroom symbolic of Japanese identity, and consequently prized as a gift, organizes. Reinterpreting Tsing's ethnographic material, I suggest structuring moments in the system entail relations of complementary predation between pine forests, pine forest soils, matsutake spores and hyphae, and the matsutake foraging communities. Tsing shows each feeds off the other, allowing all to thrive together in degraded environmental conditions. Humans cannot control matsutake only foster it (p.259) much as Amazonian foragers nurture that environment (Kohn 2013; Levis, et al. 2017; Rival 2012). In the US, matsutake foragers are caste-offs, comprised of homeless, unemployed veterans, former hippies, out of work loggers, and Southeast Asian refugees. Matsutake foragers predate the mushrooms; they procure through forest access.

The bulking and exporting process translates the matsutake foragers' unalienated "freedom trophies" into commodities with exchange value. However, gifting structures each of the human links in the value chain. For example, foragers "make" bulkers buy "baby" matsutake with no market value down the value chain but which cement relations between foragers and bulkers (p.130). In rural Yunnan, small town bosses and foragers do not negotiate prices, reciprocal social entanglements mean the bosses give the pickers "their best price" and foragers "trust" the buyers (p.275). In Japan, wholesalers and retailers translate the matsutake commodity definitively back into the gift economy, "matchmaking" specific customers to specific mushrooms. Almost no one buys a fine matsutake just to sell or eat (p.124). Wholesalers, retailers, and final customers gift mushrooms to particular partners to build relational ties; commodification diminishes with each successive transfer.

A multispecies partnership, in which human and nonhumans associate primarily through transitive relations of complementary predation, exchange and gifting in "patterns of unintentional coordination" (p. 23), is instrumental to the emergence of a global matsutake trade, supplying the Japanese gift economy. Tsing (2015, 4) says, "To follow matsutake guides us to possibilities of coexistence with environmental disturbance," which has become, the general condition of existence today. The matsutake system signifies the possibility of neo-animistic ontological renewal and offers a glimpse of a sustainable eco-conomy amid the increasing precarity a naturalist ontology harnessed to consumer capitalism inevitably reproduces. With a shift from a naturalist regime of governmentality to a neo-animist one similar to what Tsing describes, a sustainable future is possible.

Research on "green" consumerism whether undertaken from predominantly managerialist, ethical, or practice-theoretical perspective, shows that consumers have neither the institutional autonomy to identify sustainable behaviors from unsustainable ones or the cognitive, institutional, or moral capacity to consistently "choose" to practice the former rather than the latter (Bartiaux 2008; Cherrier, Szuba and Özçağlar-Toulouse 2012; Cluley and Dunne 2012; Shove 2003). Even theories like Service-Dominant Logic has not overcome implicit premises that privilege human agency and naturalize the market economy within the DSP (Bagozzi 1978; Campbell, O'Driscoll and Saren 2013; Hietanen, Andéhn and Bradshaw 2018; Vargo and Lusch (2016). Further, principles of environmental protectionism built into environmental certifications (e.g., brands like Marine Stewardship Certified, or Forest Stewardship Certified) and ecotourist services simply reproduce the paradigmatic binary that divides active human subjects from passive natural objects (Argyrou 2005; Bradshaw and Zwick 2016; Sullivan 2009), and codifies the exploitation of the latter by the former (Goldman 1997; Muraca 2016). However, based on an anthropological ontography that aligns with post-humanist feminism (Åsberg and Braidotti 2018; Koistinen and Karkulehto 2018), this paper argues for a neo-animist ontology as a solution to paradigmatic barriers to a sustainable economy.

A return to a fully animist ontology after the historical encounter with the benefits of natural science seems idealistic. However, recognition of ecosystems and the species within them as evolutionary units (Migliano, et al. 2020) and all biological entities as communicative (Descola 2012; Kohn 2013: Sprenger 2016) is consistent with contemporary natural science. Consequently, a neo-animistic consumer subjectivity could recognize the mutual dependence of all entities in the global biome and attend to their communicative intentions and resource requirements. Neo-animism could sanction predation but insist on preserving the conditions that make it possible (Descola 2012; Hill 2011). Neo-animism could sanction exchange but recognize the sterile futility of private hoarding (Petersen 1993). Neo-animism could sanction gift giving but recognize that the biome is the source and destiny of all value. Neo-animist consumerism represents enriched material relationships between people and other entities, is not anti-materialist. As an eco-economic system, neo-animism could challenge the DSP, build attitude behavior gaps out of economic relationships, and through foregrounding gifting, reciprocal exchange and complementary predation, enhance reciprocally fruitful practice between human and other living communities. By extending and elaborating on our communicative experiences with non-human entities, a new social imaginary replacing scientific modernity (Fox and Allred 2020; Taylor 2002), that is, an "ecological ontology is a possible outcome" (Feenberg 2001, 8).

REFERENCES

Argyrou, Vassos (2005), The Logic of Environmentalism: Anthropology, Ecology and Postcoloniality, New York: Oxford: Berghahn Books.

Åsberg, Cecilia and Rosi Braidotti (2018), "Feminist Posthumanities: An Introduction," In Cecilia Åsberg& Rosi Braidotti, eds, A Feminist Companion to the Posthumanities, Cham: Springer, 1–22.

Bagozzi, Richard P. (1978), "Marketing as Exchange," American Behavioral Scientist, 21 (March/April), 535-557.

Bartiaux, Francoise (2008), "Does Environmental Information Overcome Practice Compartmentalisation and Change Consumers' Behaviours?" Journal of Cleaner Production, 16(11), 1170–80.

Bradshaw, Alan and Detlev Zwick (2016), "The Field of Business Sustainability and the Death Drive: A Radical Intervention," Journal of Business Ethics, 136 (June), 267-279.

Brinberg, David; Wood, Ronald (1983), "A Resource Exchange Theory Analysis of Consumer Behavior," Journal of Consumer Research, 10 (December), 330-338.

Campbell, Norah, Aidan O'Driscoll and Michael Saren (2013), "Reconceptualizing Resources: A Critique of Service-Dominant Logic, Journal of Macromarketing, 33(4), 306-321.

Cherrier, Helene, M. Szuba and Nil Özçağlar-Toulouse (2012), "Barriers to Downward Carbon Emission: Exploring Sustainable Consumption in the Face of the Glass Floor," Journal of Marketing Management, 28 (3-4), 397-419.

Cluley, Robert and Stephen Dunne (2012), "From commodity fetishism to commodity narcissism," Marketing Theory, 12(3) 251–265.

Costa, Luiz and Carlos Fausto (2010), "The Return of the Animists: Recent Studies of Amazonian Ontologies," Religion and Society: Advances in Research, 1, 89–109.

Descola, Philippe (2012), Beyond Nature and Culture, Chicago: University of Chicago Press.

Feenberg, Andrew (2011), "Reflections on L'écologie des autres. L'anthropologie et la question de la nature, by Philippe Descola (Editions Quae)," Revue du MAUSS permanente, 16 May 2011 [on line] ; http://www.journaldumauss.net/spip.php?article810.

Fox, Nick J., and Pam Alldred (2020), "Sustainability, feminist posthumanism and the unusual capacities of (post) humans," Environmental Sociology, 6 (2), 121-131.

Goldman, Michael, ed (1997), Privatizing Nature, New Brunswick: Rutgers University Press.

Hietanen, Joel, Mikael Andéhn and Alan Bradshaw, (2018), "Against the implicit politics of service-dominant logic," Marketing Theory, 18 (March), 101-119.

Hill, Erica (2011), "Animals as Agents: Hunting Ritual and Relational Ontologies in Prehistoric Alaska and Chukotka," Cambridge Archaeological Journal, 21 (3), 407–426.

Kilbourne, William, Pierre McDonagh, and Andrea Prothero (1997), "Sustainable Consumption and the Quality of Life: A Macromarketing Challenge to the Dominant Social Paradigm," Journal of Macromarketing, 17(1), 4–24.

Kohn, Eduardo (2013), How Forest Think, Toward an Anthropology beyond the Human, Los Angeles and London: University of California Press.

Koistinen, Aino-Kaisa and Sanna Karkulehto (2018), "Feminism," Critical Posthumanism, https://criticalposthumanism.net/feminism/#_ftnref7

Levis, C., F. R. C. Costa, F. Bongers, M. Peña-Claros, C. R. Clement, A. B. Junqueira, E. G. Neves, E. K. Tamanaha, et al. (2017), "Persistent effects of pre-Columbian plant domestication on Amazonian forest composition," Science, 355 (6328), 925-931.

Migliano, Andrea B., Federico Battiston, Sylvain Viguier, Abigail E. Page, Mark Dyble, Rodolph Schlaepfer, Daniel Smith, Leonora Astete, Marilyn Ngales, Jesus Gomez-Gardenes, Vito Latora and Lucio Vinicius (2020), "Hunter-gatherer multilevel sociality accelerates cumulative cultural evolution," Science Advances, 6 (9, eaax5913), DOI: 10.1126/sciadv.aax5913.

Muraca, Barbara (2016), "Re-appropriating the Ecosystem Services concept for a decolonization of 'nature,'" In Bryan E. Bannon, ed., Nature and Experience - Phenomenology and the Environment, London and New York: Rowman & Littlefield, 143-156.

Pandya, Anil and Nikhilesh Dholakia (1992), "An Institutional Theory of Exchange in Marketing," European Journal of Marketing, 26 (12), 19-42.

Petersen, Nicholas (1993), "Demand sharing: Reciprocity and the pressure for generosity among foragers," American Anthropologist, 95(4), 860–874.

Rival, Laura (2011), "Animism and the Meanings of Life: Reflections from Amazonia," in Marc Brightman, Vanessa Elisa Grotti, and Olga Ulturgasheva, eds. Animism in Rainforest and Tundra: Personhood, Animals, Plants and Things in Contemporary Amazonia and Siberia, New York and Oxford: Berghahn Books, 69-81.

Rival, Laura (2012), "The materiality of life: Revisiting the anthropology of nature in Amazonia," Indiana (03418642), 29, 127-143.

Scheurenbrand, Klara, Elizabeth Parsons, Benedetta Cappellini, and Anthony Patterson (2018), "Cycling into Headwinds: Analyzing Practices That Inhibit Sustainability," Journal of Public Policy & Marketing, 37(2), 227-244.

Shove, Elizabeth (2003), "Converging Conventions of Comfort, Cleanliness and Convenience," Journal of Consumer Policy, 26 (December), 395-418.

Slater, Don and Fran Tonkiss (2001), Market Society: Markets and Modern Social Theory, London and New York: SAGE.

Sprenger, Guido (2017), "Communicated into being: Systems theory and the shifting of ontological status," Anthropological Theory, 17(1) 108–132.

Sullivan, Sian (2009), "'Ecosystem Service Commodities' - A New Imperial Ecology? Implications for Animist Immanent Ecologies, with Deleuze and Guattari," New Formations, 69(6): 111-128.

Tarfaoui, Dalal and Salah Zkim (2017), "Ecological Attitude-Behavior Gap: A Theoretical Analysis," International Journal of Economics & Strategic Management of Business Process (ESMB), 8(1), 33-38.

Taylor, Charles (2002), "Modern Social Imaginaries," *Public Culture*, 14 (1), 91-124.

Tsing, Anna (2015), *The Mushroom at the End of the World*, Princeton: Princeton University Press.

Vargo, Stephen L. & Robert F. Lusch (2016), "Institutions and axioms: an extension and update of service-dominant logic," Journal of the Academy of Marketing Science, 44, 5-23.

The Influence of the Short-term Installment Payment Method on Consumer Purchase Decisions

Rhys Ashby, Macquarie University, Australia
Yi Li, Macquarie University, Australia
Shahin Sharifi, Macquarie University, Australia
Jun Yao, Macquarie University, Australia

EXTENDED ABSTRACT

An emerging and rapidly growing type of short-term interest-free installment payment method is claimed to increase consumer spending compared to cash and credit cards. Unlike personal loans, installment payments are generally paid in full in less than two months, with no interest and fees. Klarna and Afterpay, leading installment payment providers, split consumer's purchases into four equal installments without charging any interest or fees (Andriotis and Rudegeair 2019). Consumers receive their purchase upfront, followed by automatic payments every two weeks to complete payment in 6 weeks when the first installment payment is made at purchase. The installment payment method has grown rapidly; during 2019 in the U.S. 6 million consumers joined Klarna for the first time (Lindberg 2019) and 3 million used Afterpay for the first time (Afterpay 2019a). Consumers surveyed indicated that installment payment services "allowed them to buy more expensive items …(81%), spend more than they normally would (64%), and make more spontaneous purchases (70%)" (ASIC 2018, p.11). However, whether and why installment payments influence spending, as reported by consumers, has not been researched. This research provides empirical evidence and an explanation of the psychological process underlying the effects of installment payments on consumer spending.

Payment methods impact consumer spending by influencing the pain of payment, which is the negative affect of parting with money (Prelec and Loewenstein 1998). The extant literature finds that decreasing the objective payment magnitude reduces the pain of payment (Shah et al. 2016; Zellermayer 1996). In this research, we argue that the *subjective* price magnitude is influenced by installment payments, which also reduce the pain of payment. This account is supported by the numerosity heuristic; magnitude is inferred from the number more than the unit used to represent a quantity. Hence, a large number of small units is perceived as larger in magnitude than a small number of large units, e.g., 12 months are perceived as longer than 1 year (Lembregts and Van Den Bergh 2018; Pandelaere, Briers, and Lembregts 2011; Pelham, Sumarta, and Myaskovsky 1994). By extension, this research posits that installment payments function as a pricing unit which has lower numerosity than the total purchase price. For instance, a single purchase payment of $160 is more numerous and feels more expensive than four installments of $40, which in turn is more numerous and feels more expensive than eight installments of $20. Prior research shows that by reducing the pain of payment, credit cards (vs. cash) increase purchase intention and consumer spending (Raghubir and Srivastava 2008; Soman 2001; Thomas, Desai, and Seenivasan 2011). Extending this research, we predict that compared to other payment methods (e.g., cash and credit cards), installment payments are perceived by consumers as less expensive than the full price, which in turn lowers the pain of payment experienced, and subsequently increases consumer purchase intention and spending.

Study 1 (n=104) tested the effect of the installment payment method on the amount spent compared to cash. Participants randomly assigned to either a cash or installment payment condition chose clothes to purchase from a range varying in design and price. Participants in the cash condition saw only the full price (e.g., "$80"), and those in the installment payment condition read a brief description of Afterpay and saw both the full price and the installment price (e.g., "4 installments of $20"). The results suggested that installment payments prompted participants to spend more by choosing more expensive items (versus a greater number of items). This finding supports the numerosity account whereby lower installment prices increased the propensity to spend more.

Study 2 (n=187) tested the effects of installment payments on purchase intention compared to credit cards and the proposed underlying psychological process. MTurk participants were assigned to either an installment payment or a credit card condition in an online shopping scenario when buying a new fridge. Participants saw an image of a fridge and those in the installment payment condition saw the additional text of "$150 x 4 by PayLater" and a short description of the fictitious third-party "PayLater" installment payment service. As predicted, compared to participants in the credit card condition, those in the installment payment condition expressed greater purchase intention, lower perceived expensiveness, and lower pain of payment. A significant serial mediation test supported the proposed process. Compared to credit cards, installment payments decreased the perceived purchase expensiveness, which in turn decreased the pain of payment and subsequently increased purchase intention.

Study 3 (n=301), instead of comparing installment payments to other payment methods, manipulated the number of installments to test the effect of the numerosity of installment prices on the pain of payment, and its subsequent effect on the amount spent. Participants were provided with a brief description of the installment payment service and a choice between two hotel rooms. Participants viewed the cheap or expensive hotel room in either more numerous installment payment prices (4 payments of $54.00 versus 4 payments of $72.00) or less numerous installment payment (8 payments of $27.00 versus 8 payments of $36.00). Study 3 revealed that more individuals chose the more expensive item when presented with less numerous installment payment prices. Serial mediation analysis confirmed that exposure to less numerous prices lowered perceived expensiveness and elicited less pain of payment, resulting in more individuals choosing the more expensive item. This result confirms that differences in spending behavior using installment prices are separate from any other known payment method differences.

This research makes several important contributions. This research provides empirical evidence of the effects of installment payments on consumer spending and an explanation of the psychological process underlying the effects. The effects of installment payments to increase spending in this research mirror both self-reported consumer data (ASIC 2018) and the claims of installment payment providers (Afterpay 2019b). We extend the numerosity literature to the domain of payment methods by uncovering that less numerous installment payment prices increase spending. We also contribute to the payment method literature by revealing that the pain of payment is influenced not just by price, but also by how the price is perceived.

REFERENCES

Afterpay (2019a), "Afterpay Achieves Record Sale Performance for Month of November and Black Friday / Cyber Monday Trading," https://www.asx.com.au/asxpdf/20191205/pdf/44c9swx6yblt8t.pdf.

--- (2019b), "FY2019 Results Announcement," https://www.afterpaytouch.com/images/28082019-FY2019-Results-Presentation.pdf.

Andriotis, AnnaMaria and Peter Rudegeair (2019), "Eyeing That Sweater? It's Yours in Four Easy Payments," *Wall Street Journal*, 29 September.

ASIC (2018), "Report 600 - Review of Buy Now Pay Later Arrangements," Australian Securities and Investments Commission

Hayes, Andrew F (2018), *Introduction to Mediation, Moderation, and Conditional Process Analysis: A Regression-Based Approach*, New York, NY: Guilford Press.

Lembregts, Christophe and Bram Van Den Bergh (2018), "Making Each Unit Count: The Role of Discretizing Units in Quantity Expressions," *Journal of Consumer Research*, 45 (5), 1051-67.

Lindberg, Louise (2019), "How Klarna Won over 80 Million Shoppers' Hearts," https://www.klarna.com/knowledge/articles/how-klarna-won-over-80-million-shoppers-hearts/.

Pandelaere, Mario, Barbara Briers, and Christophe Lembregts (2011), "How to Make a 29% Increase Look Bigger: The Unit Effect in Option Comparisons," *Journal of Consumer Research*, 38 (2), 308-22.

Pelham, Brett W., Tin T. Sumarta, and Laura Myaskovsky (1994), "The Easy Path from Many to Much: The Numerosity Heuristic," *Cognitive Psychology*, 26 (2), 103-33.

Prelec, Drazen and George Loewenstein (1998), "The Red and the Black: Mental Accounting of Savings and Debt," *Marketing Science*, 17 (1), 4-28.

Raghubir, Priya and Joydeep Srivastava (2008), "Monopoly Money: The Effect of Payment Coupling and Form on Spending Behavior," *Journal of Experimental Psychology: Applied*, 14 (3), 213-25.

Shah, Avni M., Noah Eisenkraft, James R. Bettman, and Tanya L. Chartrand (2016), ""Paper or Plastic?": How We Pay Influences Post-Transaction Connection," *Journal of Consumer Research*, 42 (5), 688-708.

Soman, Dilip (2001), "Effects of Payment Mechanism on Spending Behavior: The Role of Rehearsal and Immediacy of Payments," *Journal of Consumer Research*, 27 (4), 460-74.

Thomas, Manoj, Kalpesh Kaushik Desai, and Satheeshkumar Seenivasan (2011), "How Credit Card Payments Increase Unhealthy Food Purchases: Visceral Regulation of Vices," *Journal of Consumer Research*, 38 (1), 126-39.

Zellermayer, Ofer (1996), "The Pain of Paying," Vol. Unpublished dissertation, Pittsburgh, PA: Carnegie Mellon University.

The Process of Enacting Consumer Utopias: An Ethnography of Digital Nomadism

Aleksandrina Atanasova, Royal Holloway, University of London, UK
Giana Eckhardt, Royal Holloway, University of London, UK
Katharina C. Husemann, Royal Holloway, University of London, UK

EXTENDED ABSTRACT

Our contemporary times are characterized by constant mobility, increasing dematerialization and digitalization of life, shifting social norms, and omnipresence of change. Aptly labeled "liquid modernity," this modern context is a source of both unprecedented freedom and uncertainty (Bauman 2000). Liquidity can be challenging for many consumers (Bardhi and Eckhardt 2017; Bauman 2007) who may be facing the inherent effects of late modernity—professional and economic precarity, acceleration (Rosa 2013), generational anxieties and burn-out (Petersen 2020). As such, liquidity can trigger "fresh start mindsets" (Price et al. 2018) and energize urges for betterment and reinvention (Giddens 1991; McCracken 2008) where a different way of being in the world is imagined possible. This human propensity to continuously "measure the life 'as it is' by a life 'as it might or should be'" (Bauman 2003, p.11) has for centuries converged within the notion of utopia—an ambivalent construct at the juncture between hope and desire for something other than what is presently had (Levitas 2011). While colloquially understood to denote an impossibility or a vision for an ideal society, as an analytical construct utopia is not merely a depiction of an ideal life, but a practice that draws on the issues of its contemporary times—a lens used by actors for understanding and transforming their particular circumstances (Gordin et al. 2010). In consumer research, however, how such transformative utopias are constructed and enacted in the context of liquidity is not well understood.

Although a plethora of consumption contexts and performances have been identified as utopian or holding utopian potential—from retail malls (Maclaran and Brown 2005; Murtola 2010), to festivals and fandoms (Kozinets 2001, 2002), to neighborhoods (Chatzidakis et al. 2012) and even social media (Kozinets 2019)—in these studies, utopian visions have typically been seen as residing in solid spaces, facilitated by solid ownership and consumption, or being shared in character, enacted collectively. However, with the dematerialization and digitalization of consumption across contexts and consumption-scapes, many consumers' utopian imaginaries are becoming deterritorialized and disembedded from the solid (Bauman, 2007). It has been suggested that, in the context of liquidity, consumers' urges to transform reality are increasingly shaped by a new type of liquid utopian thinking, where utopian praxis is framed not within the collective or the solid, but within a realm of hyper-individualization, quick access and instant-gratification (Bauman 2007). In this research, we therefore ask, how do consumers construct and materialize such liquid utopian visions for betterment and transformation, and what are the implications of these processes for consumption?

We explore this question through a multi-sited ethnography of digital nomadism—a global counter-movement where large cohorts of demographically diverse consumers choose to dispose of most of their possessions and serially relocate, working from their laptops and building lifestyles outside of the margins of the traditional societal structures of 9-5 work life, home-ownership and predictable career trajectories (O'Reilly and Benson 2016). Digital nomads deliberately design and construct ideal "liquid" lives, where tensions that ensue from liquid modernity are suspended and counteracted with short-term pursuits of happiness via global mobility and rejection of normative lifestyles (Atanasova and Eckhardt 2020). While data collection is currently ongoing, early analysis draws on an ethnographic study of one the largest events for digital nomads—a bi-annual community gathering known as The Nomad Cruise, which attracts hundreds of digital nomads from around the world in a single space, a cruise boat taking passengers to various destinations around the world. We attended Nomad Cruise 8, a one-week cruise in April 2019 from Las Palmas, Spain to Lisbon, Portugal, where we also stayed in a co-living hub for digital nomads for additional days of after-cruise events. Embodied participation in nomadic gatherings, workshops, and social events, alongside participant observation, depth interviews, video and audio diaries, extensive field notes, and photographs comprise the primary pool of data from which we draw analytical interpretation.

Our findings speak to a process through which digital nomads enact liquid utopian practices for betterment and transformation in an increasingly precarious context. To frame our analysis, we draw on the Cruise's program where each day focused on a certain phase of transformation: Day 1: Setting sail; Day 2: Get out of the cubicle; Day 3: Scale your business; Day 4: Deep dive in nomading; Day 5: Hack yourself; Day 6: "It's just a beginning." This sequence emerged as an emic structuring device of our findings. We demonstrate that digital nomads' utopian practice for reinvention and transformation in liquidity is experienced as a lived process of three main stages: (1) breaking the chains of solidity by unrooting and disembedding from 9-5 work/life structures and future planning; (2) engaging in reflexive self-hacking and emancipatory reinvention, facilitated by letting go of possessions and past life narratives, and shifting consumption orientations toward liquid consumption, experiences and self-transformational practices; and (3) disseminating utopian visions through commercialization and marketization of know-how for "hacking life," offering to others blueprints for speedy escape and reinvention through liquidity. Our findings suggest that through immersing themselves in a form of hyper-liquid living and consumption, digital nomads engage in strategic pursuits of utopian desire, where their critique of rigid, solid structures propels an urge for a perpetual escape from the constraints of societal expectations.

We contribute to utopian consumer research (Kozinets 2019; Maclaran and Brown 2005), by mapping out the role of liquid consumption in enabling transformative utopian visions in an era of digitalization and dematerialization. We also extend the domain of extraordinary experience research, highlighting that, in liquidity, consumers eschew postponing consumption of experiences for an imagined future and decidedly focus on the present; and that, in contrast to Weinberger et al. (2017), previously idealized future goals of being married, having a family and owning a home are social norms that for many are losing appeal in liquidity. Further, we contribute to lifestyle design and self-optimization research by showing how consumers' aversion from future-planning in liquidity redirects their motivations away from extended projects of identity building through solid consumption, and toward adaptive, commoditized blueprints for instant utopian selves.

REFERENCES

Atanasova, Aleksandrina and Giana M. Eckhardt (2020), "Strategic Intentionality: An Emergent Logic of Materialism," manuscript submitted for publication, Royal Holloway, University of London, UK.

Bardhi, Fleura and Giana M. Eckhardt (2017), "Liquid Consumption," *Journal of Consumer Research*, 44 (3), 582–97.

Bauman, Zygmunt (2000), *Liquid Modernity,* Cambridge: Polity.

Bauman, Zygmunt (2003), "Utopia with No Topos," *History of the Human Sciences*, 16 (1), 11–25.

Bauman, Zygmunt (2007), *Liquid times: Living in an Age of Uncertainty,* Cambridge: Polity.

Chatzidakis, Andreas, Pauline Maclaran, and Alan Bradshaw (2012), "Heterotopian Space and the Utopics of Ethical and Green Consumption," *Journal of Marketing Management,* 28 (3–4), 494–515.

Giddens, Anthony (1991). *Modernity and Self-identity: Self and Society in the Late Modern Age.* Stanford University Press.

Gordin, Michael, Helen Tilley, and Gyan Prakash (2010), "Introduction: Utopia and dystopia beyond space and time," in *Utopia/Dystopia: Conditions of Historical Possibility*. Princeton University Press.

Kozinets, Robert V. (2001), "Utopian Enterprise: Articulating the Meanings of Star Trek 's Culture of Consumption," *Journal of Consumer Research*, 28 (June), 67–88.

Kozinets, Robert V. (2002) "Can Consumers Escape the Market? Emancipatory Illuminations from Burning Man," *Journal of Consumer Research*, 29 (1), 20–38.

Kozinets, Robert V. (2019) "YouTube utopianism: Social Media Profanation and the Clicktivism of Capitalist Critique," *Journal of Business Research*, 98, 65–81.

Levitas, Ruth (2011), *The Concept of Utopia,* New York, Philip Allan.

Maclaran, Pauline, and Stephen Brown (2005), "The Center Cannot Hold: Consuming the Utopian Marketplace," *Journal of Consumer Research*, 32 (2), 311–323.

Murtola, Anna-Maria (2010) "Commodification of Utopia: The Lotus Eaters Revisited," *Culture and Organization,* 16 (1), 37–54.

McCracken, Grant (2008), *Transformations: Identity Construction in Contemporary Culture,* Bloomington: Indiana University Press.

O'Reilly, Karen, and Michaela Benson (2016), "Lifestyle Migration: Escaping To The Good Life?" in *Lifestyle Migration*, 11–24. Routledge.

Petersen, Anne Hellen (2020), *Can't Even: How Millennials Became the Burnout Generation,* Houghton Mifflin Harcourt.

Price, Linda L., Robin A. Coulter, Yuliya Strizhakova, and Ainslie E. Schultz (2018), "The Fresh Start Mindset: Transforming Consumers' Lives*," Journal of Consumer Research,* 45 (1), 21–48.

Rosa, Hartmut (2013), *Social Acceleration: A New Theory of Modernity,* New York: Columbia University Press.

Weinberger, Michelle F., Jane R. Zavisca, and Jennifer M. Silva (2017), "Consuming for an Imagined Future: Middle-Class Consumer Lifestyle and Exploratory Experiences in the Transition to Adulthood," *Journal of Consumer Research,* 44 (2), 332–360.

Loyalty Point Spending and Stockpiling – A Construal Perspective

Charan K Bagga, University of Calgary, Canada
Alina Nastasoiu, Booking.com
Neil Bendle, University of Georgia, USA
Mark Vandenbosch, Western University, Canada

EXTENDED ABSTRACT

Loyalty points stockpiling (i.e., delaying redemption of points when an opportunity presents) is a pervasive phenomenon (Stourm, Bradlow, and Fader 2015). We adopt construal level theory (CLT) (Liberman and Trope 1998) to study how points are construed vis-à-vis money: either concretely (low construal) or abstractly (high construal), and how such construals affect loyalty points spending and stockpiling behavior.

We propose that money and loyalty points vary in how consumers construe them. As the level of direct experience with money (vs. points) is high (vs. low); money is (vs. points are) viewed concretely (vs. abstractly).

Prediction 1. CLT research demonstrates that when people construe targets at a high (vs. low) level, greater weight is given to desirability (vs. feasibility) aspects of the target (Liberman and Trope 1998). Given that points are construed at a higher abstract level, people should prefer to spend points on more desirable products. Conversely, people should prefer to spend the low construal concrete money on more feasible products.

Prediction 2. Given that, loyalty points evoke abstract construals and such construals drive an emphasis on desirability, when spending points, the preference should be to redeem points on a highly desirable version of the product that points can buy. In the pursuit of a highly desirable version of a product, it is likely, that people will procrastinate spending points to a later date, if the redemption available later is more desirable, thus causing stockpiling.

Prediction 3. Loyalty-points currencies may be relatively concrete (money-like) in nature or abstract (non-money) like. It logically follows that people will spend loyalty points that are similar to (different from) money similarly (differently). Integrating this argument with the argument preceding prediction 2, we should expect that all else equal, when spending concrete (vs. abstract) loyalty points, people will be less (vs. more) focused on spending the loyalty points on a highly desirable product and thus less (vs. more) likely to stockpile.

We present three studies that empirically tested these predictions.

Study 1 was an (Mturk) experiment with a two (redemption variation attribute: desirability vs. feasibility) x two (level: high vs. low) mixed design with ten product replicates. The dependent variable was whether participants preferred to use their loyalty points or money for purchasing the product. Analysis based on a linear mixed effects model revealed a significant attribute x level interaction. The interaction was such that participants preferred to spend loyalty points on more desirable products vis-à-vis less desirable products. Conversely, people preferred to spend money on more feasible products relative to less feasible products.

Study 2 was an (Prolific) experiment with two between-subjects conditions (money and loyalty points). In each condition, participants evaluated ten redemption two-option choice sets. For each trial, Option A represented a basic object or experience. Option B represented a more desirable version of the same object or experience, but available after a delay. The dependent variable was how likely participants were to choose Option B over Option A. Analysis shows that people were more likely to *delay* spending for a more desirable redemption in the points condition than in the money condition.

Finally, Study 3 (Qualtrics panel) tested whether the tendency to stockpile loyalty points will be lower for concrete (vs. abstract) loyalty points. Participants imagined that they had an opportunity to spend their concrete (vs. abstract) loyalty points to acquire ten products. Analysis revealed that participants in the concrete (vs. abstract) currency condition were more likely to spend their loyalty points.

To conclude, we find that consumers prefer to spend loyalty points (vs. money) on products that are more desirable (vs. feasible). In addition, unlike when spending money, consumers tend to stockpile points to acquire a more desirable redemption in the future. We also show that the tendency to stockpile points can be overcome by manipulating the properties of the loyalty points currency that render it abstract or concrete.

REFERENCES

Allard, Thomas and Dale Griffin (2017), "Comparative price and the design of effective product Communications," *Journal of Marketing*, 81(5), 16-29.

Castaño, Raquel, Mita Sujan, Manish Kacker and Harish Sujan (2008), "Managing consumer uncertainty in the adoption of new products: Temporal distance and mental simulation," *Journal of Marketing Research*, 45(3), 320-336.

Han, DaHee, Adam Duhachek and Nidhi Agrawal (2016), "Coping and construal level matching drives health message effectiveness via response efficacy or self-efficacy enhancement," *Journal of Consumer Research*, 43(3), 429-447.

Kim, Hakkyun, Akshay R. Rao and Angela Y. Lee (2009), "It's time to vote: The effect of matching message orientation and temporal frame on political persuasion," *Journal of Consumer Research*, 35(6), 877-889.

Liberman, Nira and Yaacov Trope (1998), "The role of feasibility and desirability considerations in near and distant future decisions: A test of temporal construal theory," *Journal of Personality and Social Psychology*, 75(1), 5.

Stourm, Valeria, Eric T. Bradlow and Peter S. Fader (2015), "Stockpiling points in linear loyalty Programs," *Journal of Marketing Research*, 52(2), 253-267.

Trope, Yaacov, Nira Liberman and Cheryl Wakslak (2007), "Construal levels and psychological distance: Effects on representation, prediction, evaluation, and behavior," *Journal of Consumer Psychology*, 17(2), 83-95.

Would a Mature Person Share Their Attitudes?
Cultural Differences in Attitude Expression

Aaron J. Barnes, University of Louisville, USA
Hao Shen, Chinese University of Hong Kong, China
Sharon Shavitt, University of Illinois at Urbana-Champaign, USA

EXTENDED ABSTRACT

Is sharing your personal attitudes considered a hallmark of maturity, or a sign of immaturity? Marketers strive to understand what shapes consumer attitude expression. We propose that one driver is whether one sees attitude expression as a *mature* thing to do.

Maturity reflects greater adaptiveness to others as well as increased confidence in one's abilities (Helson and Wink 1987; Hunt 1941). In the context of differences of opinion, one's dominant perception of maturity can lead to different outcomes. If maturity emphasizes adaptiveness to others, then a mature individual should resist expressing their own opinions when others disagree with their position. Suppressing personal opinions in this setting could allow the group to continue functioning harmoniously and avoid potential conflict. In contrast, if maturity emphasizes confidence in one's abilities, then a mature individual should express their opinions when others disagree with their position. Expressing personal opinions in this setting could showcase the individual's ability to be independent and influence others.

We suggest that cultural differences provide a basis to predict different patterns of opinion expression as a function of maturity (Markus and Kitayama 1991; Riemer et al. 2014). In Eastern cultural contexts (e.g., China), people emphasize conformity (Kim and Markus 1999) and adjustment to others' needs (Morling, Kitayama, and Miyamoto 2002; Savani, Morris, and Naidu 2012). People in Eastern cultural contexts may therefore perceive a mature individual as one who resists self-expression when others disagree with their personal views. In contrast, in Western cultural contexts (e.g., the United States), people emphasize self-expression (Kim and Sherman 2007; Savani, Markus, and Conner 2008) influencing others (Morling et al. 2002), and personal agency (Savani et al. 2010). People in Western cultural contexts may therefore perceive a mature individual as one who can express themselves when others disagree with their personal views.

In Study 1 (N=169), Chinese and U.S. online panelists indicated whether they preferred Apple or Samsung cell phones, or had no preference between the two. Next, they imagined a dinner where their classmates expressed a preference for the other, dispreferred phone brand. Participants were randomly assigned to think about whether a mature (vs. immature) person would state their preference in such a situation (1 = *definitely no*, 7 = *definitely yes*). As expected, the analysis revealed a maturity × culture interaction on the predicted reaction to the situation. ($F(1, 165) = 12.42$, $p < .001$). In particular, American participants predicted a mature (vs. immature) person is more likely to express their own preference. In contrast, Chinese participants predicted a mature (vs. immature) person is less likely to express their own preference.

In Study 2 (N=203), Chinese and U.S. participants were randomly assigned to either compare their level of maturity to new students (vs. alumni) at their university. Then, they indicated the extent to which they would express or inhibit (reverse-coded) their true self in public. Both items were measured along a scale from 1 (not at all) to 7 (very much), and were averaged to create a self-expression index ($r = .42$). As expected, we observed a culture × maturity interaction on rated likelihood of self-expression ($F(1, 176) = 7.85$, $p < .01$). American participants were marginally more likely to self-express when they were primed to feel more (vs. less) mature. In contrast, Chinese participants were significantly less likely to self-express when they were primed to feel more (vs. less) mature.

In Study 3 (N=208), undergraduates from the same U.S. university participated in a 2 (ethnicity: European American vs. Asian) × 2 (primed maturity: high vs. control; between-subjects) × 2 (preference incongruity: incongruent vs. control; within-subjects) experiment. Participants indicated their preference between cell phones as in study 1 and also, as a control preference, between GE and Phillips light bulbs. For each category, participants then wrote a short paragraph about the brand they preferred. Then, participants in the maturity prime condition read that we were interested in what a mature person would say when they meet one of their peers, whereas those in the control condition did not see this information. Participants were then assigned to communicate with a partner who preferred their dispreferred cell phone brand. We measured participants' desire to share their preferences by asking them how much they wanted to share each of their phone and bulb paragraphs they wrote before, rated separately from 1 (definitely do not share this paragraph) to 7 (definitely share this paragraph). We computed a relative preference expression index by subtracting the control preference rating (bulbs) from the incongruent preference rating (phones). As expected, an ethnicity × maturity ANOVA on relative preference expression revealed a 2-way interaction ($F(1, 204) = 7.61$, $p = .006$). European Americans were directionally, but not significantly, more willing to share an incongruent preference when maturity was primed (vs. not). In contrast, Asians were significantly less willing to share an incongruent preference when maturity was primed (vs. not).

In Study 4 (N=254), online panelists participated in a 2 (culture: U.S. vs. Hong Kong) × 2 (primed maturity vs. immaturity) between-subjects design. Participants considered two people. Person A was 40 years old (maturity prime) and person B was 20 years old (immaturity prime); age order was counterbalanced. Then, participants predicted which person was more likely to express or inhibit (reverse-coded) their true self in public. These items were measured on 11-point scales (-5 = *definitely person A*, 5 = *definitely person B*). As expected, a culture × primed maturity interaction emerged on perceived self-expression ($F(1, 250) = 14.38$, $p < .001$). American participants reported that the more (vs. less) mature person would express their true self. In contrast, Chinese participants reported that the more (vs. less) mature person would inhibit their true self.

Our research contributes to the understanding of culture, attitudes, social influence, and word of mouth by providing insights into how culture shapes the meaning of maturity and how culturally distinct concepts of maturity influence consumers' attitude expression when others disagree.

REFERENCES

Helson, Ravenna and Paul Wink (1987), "Two Conceptions of Maturity Examined in the Findings of a Longitudinal Study," *Journal of Personality and Social Psychology*, 53(3), 531–41.
Hunt, William A (1941), "Recent Developments in the Field of Emotion.," *Psychological Bulletin*, 38(5), 249.

Kim, Heejung S and Hazel R Markus (1999), "Deviance or Uniqueness, Harmony or Conformity? A Cultural Analysis," *Journal of personality and social psychology*, 77(4), 785–800.

Kim, Heejung S and David K Sherman (2007), "'Express Yourself': Culture and the Effect of Self-Expression on Choice.," *Journal of personality and social psychology*, 92(1), 1–11.

Markus, Hazel R and Shinobu Kitayama (1991), "Culture and the Self: Implications for Cognition, Emotion, and Motivation," *Psychological Review*, 98(2), 224–53.

Morling, Beth, Shinobu Kitayama, and Yuri Miyamoto (2002), "Cultural Practices Emphasize Influence in the United States and Adjustment in Japan," *Personality and Social Psychology Bulletin*, 28(3), 311–23.

Riemer, Hila, Sharon Shavitt, Minkyung Koo, and Hazel R Markus (2014), "Preferences Don't Have to Be Personal: Expanding Attitude Theorizing With a Cross-Cultural Perspective," *Psychological Review*, 121(4), 619–48.

Savani, Krishna, Hazel R Markus, and Alana L Conner (2008), "Let Your Preference Be Your Guide? Preferences and Choices Are More Tightly Linked for North Americans than for Indians.," *Journal of Personality and Social Psychology*, 95(4), 861–76.

Savani, Krishna, Hazel R Markus, N.V.R. Naidu, S. Kumar, and N. Berlia (2010), "What Counts as a Choice?: U.S. Americans Are More Likely Than Indians to Construe Actions as Choices," *Psychological Science*, 21(3), 391–98, http://pss.sagepub.com/lookup/doi/10.1177/0956797609359908.

Savani, Krishna, Michael W. Morris, and N. V. R. Naidu (2012), "Deference in Indians' Decision Making: Introjected Goals or Injunctive Norms?," *Journal of Personality and Social Psychology*, 102(4), 685–99.

Consumer Responsibility and Organizational Ethical Behavior:
The Normalization of Abusive Sales Practices in Financial Institutions

Roberta Gabriela Basílio, ESPM, Brazil
Rafaela Almeida Cordeiro, ESPM, Brazil
Mateus Canniatti Ponchio, ESPM, Brazil

EXTENDED ABSTRACT

In this study, we use a transformative service research perspective to investigate financial services according to both consumers' and bank employees' perceptions. Our analyses are based on the concepts of consumer responsibility (freedom of choice in the marketplace and the ability to exert that choice; Bhattacharjee, Berger, and Menon 2014) and ethical behavior in organizations (a pattern of behaviors following an organization's code of conduct or business principles; Fichter 2018). We shed light on the following questions: (1) How do bank employees apply consumer responsibility discourse to justify self-interested sales practices? (2) What kind of tension is there in the arguments presented by consumers and bank employees? (3) How is it possible to enhance consumer agency and develop a culture of ethical behavior and sales practices in financial services?

We conducted interviews with 12 bank employees and six bank customers. The bank employees held different positions prior to or at the moment of their interview for this study (frontline, middle and upper management, and organizational ombudsman) in three out of the five largest Brazilian retail banks. The consumers interviewed were customers of the five largest banks in the country. All interviews were conducted individually, recorded, and transcribed verbatim, and ranged from 15 to 99 minutes in length, comprising a data set of 76,634 words.

Our analysis followed a hermeneutic framework (Thompson 1997) to explore the meanings that the informants ascribed to their experiences with financial services. First, the interviews were separated into groups of bank employees and bank customers; each interview was read individually so that the authors could familiarize themselves with the data and obtain the first insights. Next, the interviews of each group were analyzed together with the objective of identifying themes and response patterns for bank employees and bank customers. Thereafter, a comparative analysis was conducted between the interviews of the two groups of informants, identifying tensions in their perceptions about financial services. The process was interactive and was repeated several times by the authors.

Our findings have indicated that banks sell the idea of ideal solutions and better benefits for their customers, yet in practice, employees follow the culture of selling the best product to make profit. Self-interested sales practices are encouraged by managers and are rewarded for the financial results they bring in the short term. Punishments for unethical behavior are rare, and there is no reward for ethical behavior, eliminating the possibility of reflecting on the ethical dilemmas experienced in organizations (Hill and Rapp 2014; Nicol 2018). Thereby, the vicious circle of self-interested practices is reinforced in financial institutions.

We have demonstrated that normalizing self-interested sales practices causes employees to blame customers for financial decisions and their consequences, especially when they bring negative results. When they realize that they have failed the customer, they blame the "system," something abstract and impersonal. Thus, we have noted that employees do not feel responsible for building a context in which consumers can safely exercise their freedom of choice (Anderson et al. 2016; Sirgy, Lee and Yu 2011). This perception is shared by consumers, who say that the big villain is "the bank" and not "the people who work in it," as the latter merely follow the rules of the game.

Our analysis has also revealed that a relationship based on trust is fundamental to a service that offers benefits to both customers and banks. We have noted that employees who answer questions and provide accurate and transparent information establish relationships of trust with their customers. Through such behavior, employees are viewed as experts, and customers trust their guidance, increasing customer trust. The customer who trusts the employee rewards good service through new transactions, contributing to the bank's financial results. However, although opportunistic behavior is not expected from the trusted salesperson (Guenzi and Georges 2010), there is the possibility of using consumer trust to work in the bank's interests over those of their customers.

We present practical ideas concerning how to enhance consumer agency and develop a culture of ethical behavior and sales practices in financial services, specifically by: providing accurate and transparent information to customers; guiding consumers on how to use the benefits that the purchased products offer; promoting financial education programs adapted to customers' realities; applying a bottom-up approach when developing codes of ethical conduct; rewarding ethical behavior; and promoting empathy for the customer through financial education for employees.

This study makes novel contributions. First, we present both consumers' and bank employees' perspectives toward financial services and their consequences, in response to recent calls for research focusing on contextual factors (such as market aspects) that affect consumers' financial well-being and collective attitudes regarding financial services (e.g., Brüggen et al. 2017; O'Connor et al. 2019). Second, by demonstrating how self-interested sales practices are normalized in financial institutions, we shed new light on how employees shape and are shaped by their environment and contribute knowledge to the literature on expert services and consumer responsibility. Third, we offer insights for actions to enhance consumer agency and develop a culture of ethical behavior in financial institutions, thereby responding to the call for investigations into how consumer sovereignty might be enhanced.

Future research should investigate consumer agency in the context of financial technology and digital financial services. In the context of financial services, does technology minimize or accentuate self-interested sales practices? Does the consumer feel more confident making his or her decisions without human intermediation? We also encourage new research to identify the underlying conditions that enhance consumer agency in financial services in diverse cultural contexts, as it is known that financial decisions are also influenced by socio-cultural aspects (Cordeiro, Wong, and Ponchio 2019; Peñaloza and Barnhart 2011).

REFERENCES

Anderson, Laurel, Jelena Spanjol, Josephine Go Jefferies, Amy L. Ostrom, Courtney Nations Baker, Sterling A. Bone, Hilary Downey, Martin Mende, and Justine M. Rapp (2016), "Responsibility and Well-Being: Resource Integration Under Responsibilization in Expert Services," *Journal of Public Policy & Marketing*, 35 (2), 262-279.

Bhattacharjee, Amit, Jonah Berger, and Geeta Menon (2014), "When Identity Marketing Backfires: Consumer Agency in Identity Expression," *Journal of Consumer Research*, 41 (2), 294-309.

Brüggen, Elisabeth C., Jens Hogreve, Maria Holmlund, Sertan Kabadayi, and Martin Löfgren (2017), "Financial Well-Being: A Conceptualization and Research Agenda," *Journal of Business Research*, 79 (October), 228-237.

Cordeiro, Rafaela Almeida, Nancy Wong, and Mateus Canniatti Ponchio (2019), "A Gift Economy Perspective on the Cycle of Financial Vulnerability," *Journal of Macromarketing*, 39 (1), 25-36.

Fichter, Rachel (2018), "Do the Right Thing! Developing Ethical Behavior in Financial Institutions," *Journal Business Ethics*, 151 (1), 69-84.

Guenzi, Paolo and Laurent Georges (2010), "Interpersonal Trust in Commercial Relationships: Antecedents and Consequences of Customer Trust in the Salesperson," *European Journal of Marketing*, 44 (1/2), 114-138.

Hill, Ronald Paul and Justine M. Rapp (2014), "Codes of Ethical Conduct: A Bottom-Up Approach," *Journal of Business Ethics*, 123 (4), 621-630.

Nicol, Olivia (2018), "No Body to Kick, No Soul to Damn: Responsibility and Accountability for the Financial Crisis (2007–2010)," *Journal of Business Ethics*, 151 (1), 101-114.

O'Connor, Genevieve E., Casey E. Newmeyer, Nancy Yee Ching Wong, Julia B. Bayuk, Laurel A. Cook, Yuliya Komarova, Cazilla Loibl, L. Lin Ong, and Dee Warmath (2019), "Conceptualizing the Multiple Dimensions of Consumer Financial Vulnerability," *Journal of Business Research*, 100 (July), 421-430.

Peñaloza, Lisa and Michelle Barnhart (2011), "Living U.S. Capitalism: The Normalization of Credit/Debt," *Journal of Consumer Research*, 38 (4), 743-762.

Sirgy, M. Joseph, Dong-Jin Lee, and Grace B. Yu (2011), "Consumer Sovereignty in Healthcare: Fact or Fiction?," *Journal of Business Ethics*, 101 (3), 459-474.

Thompson, Craig J. (1997), "Interpreting Consumers: A Hermeneutical Framework for Deriving Marketing Insights from the Texts of Consumers' Consumption Stories," *Journal of Marketing Research*, 34 (4), 438-455.

Can Brands be Sarcastic? The Effect of Sarcastic Responses on Attitudes Towards Activist Messages

Juliana M. Batista, FGV/EAESP, Brazil
Lucia S. G. Barros, FGV/EAESP, Brazil
Fabricia V. Peixoto, FGV/EAESP, Brazil
Delane Botelho, FGV/EAESP, Brazil

EXTENDED ABSTRACT

Companies have been increasingly taking steps to address relevant societal concerns through brand activism, a business effort to promote, impede, or direct social, political, economic, and/or environmental issues in society (Sarkar and Kotler 2018). For example, Adidas used a same-sex couple in its Valentine day's ad, and Diesel's ad message says "Make love, not walls." Those issues are mostly controversial, which may make some consumers feel dissatisfied or offended, responding on social media platforms using uncivil comments (Ziegele and Jost 2016). Some brands, such as Avon, have reacted to these consumers by using a formal and explanatory tone, while others, such as Adidas, have used sarcasm, a type of aggressive humor in which statements carry a meaning that differs to its literal version to criticize someone (Filik et al. 2016). However, because of sarcasm's dubious characteristic (aggressive and humorous), it is unclear whether a sarcastic response is likely to elicit positive affect, regardless of the situation. The literature is dubious on that: while in some circumstances individuals see sarcastic insults as funnier (Dews et al.1995), more unexpected (Lagerwerf 2007), more memorable (Gibbs 1986), and more polite than direct insults (Filik et al. 2016), there is evidence that people dislike a message when it is aggressive (Cann et al. 2016).

Although some brands are using a sarcastic tone in social media, we posit that activist brands should not respond sarcastically to consumers due to the following reasons. First, most studies that found positive evaluations for sarcasm have compared it to direct insults, not to non-insulting forms of communication (Filik et al. 2016, Pexman and Olineck 2002). When the alternative option is a constructive language, the aggressiveness characteristic of sarcasm may harm consumers' attitude towards the brand (hereafter ATB). Second, controversial issues are those not well settled in society (Levinson 2006), so opinions in favor or against them are appropriate, making aggressiveness against any side perceived as offensive (Kuipers 2015). Finally, individuals, in general, do not like aggressive humor when it is targeted to a specific person instead of people in general (Warren and McGraw 2016).

We designed six online experiments to test our rationale. Study 1A examined whether a type of response (sarcastic vs. explanatory) of an anonymous brand to an uncivil comment would be perceived as aggressive, and negatively influence ATB. Participants (n=1027) from an online panel saw an anonymous internet user's comment replying to a brand's opinion against LGBT phobia, in the brand's Facebook page. Participants in the sarcastic condition significantly perceived the response as higher in aggressiveness than participants in the explanatory condition, and participants' ATB was more positive when they saw the explanatory response than when they saw the sarcastic one. The effect of the type of response on the ATB is fully mediated by the perceived aggressiveness of the brand response (indirect effect= -0.2432; CI [-0.3729, -0.1224]). Study 1B replicated 1A with a fictitious brand (n=156), with similar results. Study 1C extends the investigation to another brand activism context: sexism. Participants (n=229) perceived the sarcastic response as more aggressive than the explanatory response, and their ATB was less positive when they saw the sarcastic response when compared to the explanatory one. The indirect effect 0.2277 (CI [.0847, .4387]) indicated full mediation of perceived aggressiveness of the brand response on the effect of the type of response on the ATB. Those studies provide evidence, in different contexts, that sarcasm makes consumers see brands in a less favorable light when compared to an explanatory tone. The underlying mechanism is, at least in part, the perceived aggressiveness of the message.

Study 2 examined whether the perception of aggressiveness in the consumer comment moderates the effect of each type of brand response on customer ATB. Participants (n=614) were randomly assigned to one of the four conditions: response type (sarcastic vs. explanatory) and internet user's aggressiveness (high vs. low). We used the same procedures as previous studies. ATB was more positive when participants saw the explanatory responses, as compared to the sarcastic ones. Participants also better evaluated the brand message when the Internet User's response was aggressive than when it was neutral, but we did not find any interaction effect.

Study 3 examined whether a less aggressive sarcastic response would result in customer ATB similar to that evoked by the explanatory response. Procedures were similar to the experiment 1A (n=216). When responses (sarcastic or explanatory) are less aggressive ATB was not significant. Results provided additional evidence that aggressiveness is a key mechanism in making individuals discontent with brands that reply to customers sarcastically.

Study 4 investigates whether aggressiveness is the causal mechanism for the higher ATB of the explanatory over the sarcastic response (n=394). We found a significant interaction (F(1, 390)= 4.32, p= 0.038), in a way that participants saw the brand in a more positive light when the sarcastic response was less aggressive, while no differences appeared for the explanatory response, suggesting that aggressiveness per se cannot explain why explanatory messages have better outputs. If a message is aggressive, but not humorous, participants see it as equally positive than if it is not aggressive, but equally not humorous. However, if a message is humorous, then participants see it in a more positive light when it is less aggressive. So, humor and aggression, which define sarcasm, should not come together in brand communication.

Our findings contribute to the literature by shedding light on the impact of message tones brands use to respond to uncivil consumer comments in the context of brand activism. Moreover, we contribute to the humor literature by showing a new situation in which the use of humor hurts brands instead of helping them. We show that sarcasm should be avoided in online communication not only because people expect factual information from some sources but also because they see sarcasm as inappropriate, hurting positive ATB. Finally, we show that sarcasm backfires activist actions: when communicating about a controversial issue, brands should evaluate messages tone even when interacting with consumers who agree with the brand's opinion on the issue.

REFERENCES

Cann, Arnie, Adam T. Cann, and Jennifer A. Jordan (2016), "Understanding the Effects of Exposure to Humor Expressing Affiliative and Aggressive Motivations," *Motivation and Emotion*, 40 (April), 258-267.

Dews, Shelly, Joan Kaplan, and Ellen Winner (1995), "Why Not Say It Directly? The Social Functions of Irony," *Discourse Processes*, 19 (3), 347-367.

Filik, Ruth, Alexandra Țurcan, Dominic Thompson, Nicole Harvey, Harriet Davies and Amelia Turner (2016), "Sarcasm and Emoticons: Comprehension and Emotional Impact," *The Quarterly Journal of Experimental Psychology*, 69 (11), 2130-2146.

Gibbs, Raymond W. (1986), "On the Psycholinguistics of Sarcasm," *Journal of Experimental Psychology: General*, 115 (1), 3-15.

Kuipers, Giselinde (2015), "Good Humor, Bad Taste: A Sociology of the Joke," Berlin: De Gruyter.

Lagerwerf, Luuk (2007), "Irony and Sarcasm in Advertisements: Effects of Relevant Inappropriateness," *Journal of Pragmatics*, 39, 1702-1721.

Levinson, Ralph (2006), "Towards a Theoretical Framework for Teaching Controversial Socio-Scientific Issues," *International Journal of Science Education*, 28 (10), 1201-1224.

Pexman, Penny M., and Kara M. Olineck (2002), "Does Sarcasm Always Sting? Investigating the Impact of Ironic Insults and Ironic Compliments," *Discourse Processes*, 33 (3), 199-217.

Sarkar, Christian, and Philip Kotler (2018), "Brand Activism: From Purpose to Action," https://www.amazon.com/Brand-Activism-Purpose-Christian-Sarkar-ebook/dp/B07K71B413 Accessed 10 January 2019.

Warren, Caleb, and A. Peter McGraw (2016), "When Does Humorous Marketing Hurt Brands?" *Journal of Marketing Behavior*, 2 (1), 39-67.

Ziegele, M., & Jost, P. B. (2020). Not funny? The effects of factual versus sarcastic journalistic responses to uncivil user comments. *Communication Research*, 47(6), 891-920.

Interpersonal Relationships as "Self-otherhood": A Conceptualization and Demonstration in the Context of the P2P Sharing Economy

Russell W. Belk, York University, Canada
Jashim Khan, University of Surrey. UK

EXTENDED ABSTRACT

Encounters with others may produce meaningful relationships or may create disparities in the meanings derived by the individuals involved. Our focus is on the relationships formed on peer-to-peer accommodation platforms, such as those for Couchsurfing and Airbnb. Potential hosts and guests pursue self-presentations on these platforms. The motivation for self-presentation involves a desire to please through a version of the presenter's ideal self (Baumeister 1982), social self, or anticipatory self (Hearn 2017).

Peer-to-peer accommodations present opportunities for self-fulfilment, enjoyment, monetary benefits, accommodation, amenities and the need for socialization (Tussyadiah 2016). These benefits are intricately intermeshed. But initially the host and guest meet on an internet website. Here their self-presentations take the form of personal profiles – conveying information about jobs, demographics, hobbies, and heroes. They often include visuals: photos of self, family, pets, and homes. Host and guest design their self-presentations independently. Studies have explored the topic of self-marketing on personal web pages and various social media platforms (e.g., Kim and Tussyadiah 2013; Hearn 2017; Kim and Lee 2011; Schau and Gilly 2003). While these studies are beneficial in understanding self-branding, dating and hook-up apps, and web pages, they may be less useful for understanding host-guest interactions on P2P accommodation-sharing sites.

Drawing on the Ronald Laing's *Knots* (1970) and Goffman's presentation of self (1956), this research challenges the view of shared cognition and feelings of consistency/inconsistency between individuals. It is likely that hosts and guests create their own individual imagined relationships construed as friends, commercial partners, or even adversaries.

Relational Self-Otherhood

We study Couchsurfing self-presentations online as a "dance" between camaraderie, marketplace exchange, and conflict. In order to understand this dance, we develop the concept of relational self-otherhood. This involves *the bundle of memories, emotions, cognitions, and bodily sensations regarding the relationship*. Both the host and guest have such construals of their relationship and they are necessarily at least somewhat incongruent. Often, they are predicated on an imagination of the other's relational self-otherhood. This is perhaps best illustrated an excerpt from Laing's (1970, 48) *Knots*:

> *She wants him to want her*
> *He wants her to want him To get him to want her*
> *She pretends she wants him To get her to want him*
> *He pretends he wants her*

First Impressions and Prejudices

Camaraderie, whether sincere or insincere, is the preferred mode of relationship on Couchsurfing. Online profiles provide a basis for first impressions and the dance begins in subsequent online exchanges. In technology-mediated relations of peer-to-peer accommodations, the construals of the relational self-other image are interdependent, but strongly guided by first impressions. These impressions may be influenced by personality, occupation, nationality, age, ethnicity, gender, attractiveness, and apparent income and social class. There is ample opportunity for racism, sexism, ageism and other forms of bias and prejudice to enter into these first impressions. But the host's and guest's imagined self-otherhood is more likely to proceed beyond this first impression if there is anticipated comradery.

Masks and Selves

We are comprised of all the "masks" we wear on different occasion (Brissett and Edgley 2005; Goffman 1956). Peer-to-peer accommodation platforms function to help each party design self-presentations or "masks." The mask helps us to project our best self in a given situation like interacting on the Couchsurfing platform. For potential hosts, having formulated an attractive profile self-presentation, we continue to put our best face forward in sending messages in response to potential guest inquiries. Mutual self-disclosures can help to build pre-visit comradery or may raise flags of conflict. Aesthetic, political, ethical or other differences may either be ignored, challenged, or sabotage the relationship and bring it to an end.

When host's and guest's self-otherhoods are dissimilar, but the difference is ignored this involves what we call a subdued self. Subdued self an alternative self to avoid conflict. It is achieved by hiding or subduing aspects of self that are likely to provoke or expose a conflict situation. Either or both members of the dyad may do this. The relationship between host and guest is likely to be more passive, professional and pro-forma in nature than it might otherwise be if the participants were truly the friends they are pretending to be. If, for example, they perceive a likely ideological difference, they try to avoid conversations that would surface the conflict. Some might even appear to go along with beliefs that they would normally oppose.

Face-to-Face Interactions and their Aftermath

Experiences during the stay continue the dance and influence both actors, Host and guest post-visit activity takes the form of posting comments, pictures, likes and dislikes as part of a mutual reputation rating system. With the greater distance they may be more forthright, especially if the experience was positive. They may however continue to portray a negative experience as positive, with a subdued self and a lack of candor about differences with the other. In this case they jointly co-create a surface-level, often fictional, image of a co-constructed shared self-otherhood. We often do this in person as well through through polite fictions, civil inattention, and studied non-observance (Goffman 1967).

Peer-to-peer social media platforms for Airbnb or Couchsurfing often act as repositories for selfie culture (Goss 2019; Gorichanaz 2019) as a way to communicate self-otherhood among platform members, specifically when they portray the host and guest in a recent stay. When the imagined self-otherhoods are similar between host and guest, this results in co-created relational self-otherhood. Similar perceptions should heighten the

perceived warmth of the relationship and the feeling of camaraderie. On the other hand, dissimilar self-other experiences will lead to felt conflict, frustration and perhaps a subdued self for either one or both of the agents in order not to provoke a confrontation in person or later online.

We find that these relationships are most likely to be implicitly negotiated between members of the pair. We explore this topography through a series of encounters involving both disputes and harmony. In this exploration we consider self-presentations (before) and self-re-presentations (after) host-guest contact using ethnographic and netnographic research.

Ronald Laing's Knots

As noted above, Ronald Laing's *Knots* outlines how two persons develop their relationship in a potentially conflicting situation. The idea that people tend to assume what other people are thinking about them may be the root to misunderstanding in a relationship. This is most likely be the case when two strangers meet and try to develop a relationship with each other. In order to pursue a relationship one or both parties may recognize initial insincerity but still persevere to realize co-orientation. Their initial interaction takes place within the larger rubric of a game:

They are playing a game. They are playing at not playing a game. If I show them I see they are, I shall break the rules and they will punish me.

I must play their game, of not seeing I see the game. (Laing 1970, 1) Misunderstandings, by one or both agents, may interrupt bonding in a relationship. The relational self between guest and host is disrupted if either one or both misunderstand that the relationship is a fictive pretence. The premise is that people may knowingly or unknowingly participate in building relationships based on falsehoods. Laing focuses on the knots people tie themselves into through preconceptions and misunderstandings. He calls them "*knots, tangles, fankles, impasses, disjunctions, whirligogs, binds*" (Laing 1970, i). The relationships he deals with are those of parent and child, lovers, or peers. The bonds can be of love, dependency, uncertainty or jealousy. These sort of knots in relationships are also likely when two strangers meet online to determine whether they will pursue a further relationship. Even when insincerity or falsehood in a relationship is known to both parties, they may decide to play their role knowing that the relationship will end when the contractual stay is over. Such is the logic of "knots."

By expressly theorising self-otherhood in cases of dissimilarity, we allow for deeper reflection on the nature of peer-to-peer home-stays. We use separate interviews with both participants in Couchsurfing to focus on the subdued self.

A Priori and Logical Extension of Self Otherhood

The GUEST self-other and HOST self-other in relational self-otherhood are imagined separately. For example, both guest and host like drinking wine but one likes red wine and the other likes white wine. One may feign indifference in order to defer to the other's preference. In this simple case, one would perceive congruent preferences and the other incongruent preferences. Therefore, we focus on *imagined* rather than actual similarity/dissimilarity. Sometimes it is like mutually saluting a flag or two people both saying "I love you" to each other. These are things that should be taken at face value and not questioned. Otherwise the partners may discover that they mean quite different things to them and that they have different levels of sincerity in their relational self-otherhood. If the parties assume mutual sincerity, 'me' and 'you' transforms as 'we' and 'us.' This magical transmogrification results in an imagined 'self-otherhood' that two people in a relationship exemplify a shared self-otherhood. Peer-to-peer accommodations present a special case because the face-to-face encounter is for a fixed period of time. Departure does not entail a breakup or divorce.

Conclusion

In this on-going project, we propose that platform-mediated interactions create a 'relational' self-otherhood. A good positive experience for both host and guest entails harmony in the relationship providing the self-other of host and the self-other of guest with corresponding sentiments, emotions, thoughts and feelings. Like a ballroom dance, where male and female are in synchrony and lost within the moment, this can be an exalted flow state. This is an ideal outcome, but it does not occur most of the time; there are times when dissimilarity dominates expectations and experiences in either the host or guest domain. The relational self-other manifests in both host's and guest's minds. It is not just predicated on the shared experience of a visit, but also depends on their perceptions and imaginations of each other's performance and thoughts.

The relational self-otherhood concept differs from the simpler formulation of co-orientation. Laing's (1970) *Knots* insights highlight the need for a deeper understanding of the temporary or lasting merging of selves that takes place when strangers come together. We began our study online because of the digital affordances available on general and specialized social media. The behavioural phase currently underway examines actual Couchsurfing pairs and interviews them separately. Unlike other platforms like Airbnb, Couchsurfing has the advantage of being less mediated. Airbnb employs professional photographers, coaches, and local host coordinators, whereas Couchsurfing is largely free of such management. Furthermore, whereas Airbnb often involves couples and families as both hosts and guests, Couchsurfing most often involves two individuals. And the fact that no money changes hand in Couchsurfing takes away the possible ulterior motives of profit-seeking and bargain-hunting. This does not rule out other ulterior motives like learning, sex, or putting a guest to work on the host's home projects. But the absence of monetary considerations removes some obvious alternate explanations of cordial-seeming behaviors. This makes for a clearer opportunity for testing our a priori model.

Our study focuses on the intimacy of sharing a home or couch, but the model potentially applies to a variety of interpersonal encounters, including those between merchants and customers, business colleagues, friendship networks, and family members. The construct of self-otherhood offers a way to account for B2B, B2C and P2P relationships and hopes to broaden the field of relationship marketing. The concept of the subdued self is potentially relevant in all fields of consumer behavior studies.

What our perspective introduces to theoretical and methodological conversations is the issue of sincerity of performance. It recognizes that we are both performers and audience in our interactions with others. We also play the role of critic in that we evaluate the success and sincerity of the other's performance. We hope that we are opening a theoretical and methodological door for consumer researchers that will result in new insights and understandings.

REFERENCES

Baumeister, Roy (1982), "Self-esteem, Self-presentation, and Future Interaction: A Dilemma of Reputation," *Journal of Personality*, 50 (1), 29-45.

Brissett, Dennis, and Charles Edgley (2005), *Life as Theater: A Dramaturgical Sourcebook*, New Brunswick.

Goffman, Erving (1956), "Embarrassment and Social Organization," *American Journal of Sociology*, *62*(3), 264-271.

Goffman, Erving (1967), *Interaction Ritual: Essays on Face-to-face Behavior,* New York: Pantheon.

Goss, Phil (2019), "Selfies, Self-Definition, Therapy and the Trans-Relational Quest for Meaningful Connection," in *Extending Horizons in Helping and Caring Therapies: Beyond the Liminal in the Healing Encounter*, London: Routledge, 52-62

Gorichanaz, Tim (2019), "Self-Portrait, Selfie, Self: Notes on Identity and Documentation in the Digital Age," *Information*, 10 (10), 297.

Hearn, Alison (2017), "Confidence Man: Breaking the Spell of Trump the Brand," *Soundings*, 66, 79–89.

Jensen Schau, Hope, and Mary C. Gilly (2003), "We are What We Post? Self-presentation in Personal Web Space," *Journal of Consumer Research*, 30 (3), 385-404.

Kim, Jeongmi, and Iis Tussyadiah (2013), "Social Networking and Social Support in Tourism Experience: The Moderating Role of Online Self-presentation Strategies", *Journal of Travel and Tourism Marketing*, 30 (1-2), 78-92.

Kim, Junghyun, and Jong-Eun Lee (2011), "The Facebook Paths to Happiness: Effects of the Number of Facebook Friends and Self-presentation on Subjective Well-being," *Cyberpsychology, Behavior and Social Networking*, 14 (6), 359-364.

Laing, Ronald (1970), "*Knots,*" London: Penguin.

Tussyadiah, Iis (2016), "Factors of Satisfaction and Intention to Use Peer-to-Peer Accommodation," *International Journal of Hospitality Management*, *55*, 70-80.

What is Street Cred? An Exploration of Street Credibility in the Marketplace

Delancy Bennett, Clemson University, USA
Geraldo Matos, Roger Williams University, USA
Mitchell Hamilton, Loyola Marymount University, USA
Nicholas Pendarvis, California State University Los Angeles, USA

EXTENDED ABSTRACT

Introduction

Street cred is ubiquitous, and marketers leverage it to promote a wide array of products from music and Disney characters to cars, tea, candy and snacks. Indeed, Podoshen (2008) suggests that street credible celebrities influence mainstream purchases, and Bennett et al. (2020) predicts that such celebrities will eventually replace athletes as the most influential product endorsers. Thus, for the general populous, street cred is real, salient, influential, and sought. But what exactly is street cred?

Webster's dictionary has loosely defined street cred as "the acceptance and respect of people who live in poor city neighborhoods," yet as we have demonstrated, it is used by populations beyond this culture. While anthropology, education, and sociology research suggests that street cred originates in the inner city, the social sciences have yet to define the construct or investigate its mainstream relevance. To bridge this gap, we offer an empirically based definition of street cred, an explanation of its uses, and an agenda for future research.

Methodology and Procedure

To define street cred, the primary investigator interviewed 60 students (age 18 to 22) from two U.S. communities. Subculture "members" (inner-city minority, n = 31, 16 male) were interviewed in Harlem, NY, an inner-city where street cred originates. To represent the broader population, subculture "nonmembers" (non-inner-city majority, n = 24, 9 male; and non-inner-city minorities, n = 5, 3 males) were interviewed at a college in New England. All interviews followed a semi-structured script focusing on what street cred is and why it is important. The interviews averaged an hour and fifteen minutes. After transcription, the primary investigator created a seven-page codebook. Using the codebook, interviews were coded in NVivo 10 by the primary investigator and two research assistants.

Results and Analysis

In aggregate, our findings result in the following empirically grounded definition:

Street credibility (street cred) is the cultural capital given to individuals from socioeconomically disadvantaged and dangerous origins who, through authentic experiences unique to these environments, have acquired street smarts and a tough persona. In their pursuit of independence and success, these individuals have navigated encounters and obstacles unique to street life that may include exposure to violence, the underground economy, and adherence to street codes.

Both traditionally defined credibility and cool belong to street cred's nomological network. Although street cred is not grounded in the traditional operationalization of expertise, trustworthiness, or attractiveness which reflect credibility (see Ohanian 1990), it still falls within the same nomological network as it illustrates a useful and desired yet distant and distinct form of credibility. We find that street cred and cool are not mutually inclusive as respondents from both groups identified celebrities who were both cool and had street cred (e.g., Snoop Dogg), did not have street cred but were cool (e.g., Drake), or had street cred but were not cool (e.g., Suge Knight). While street cred is expressly determined by where one comes from and what one has seen and understands, cool has morphed over time to reflect a multitude of meanings, including the ability of an individual to maintain a state of detachment or nonchalance (Moore 2004). Still cool and street cred have some overlap: notably cool also has inner-city roots (Nancarrow and Nancarrow 2002), and it reflects a sense of "knowingness," insider access to information that one is, in some sense, privileged to have (Moore 2004). We find that for nonmembers, holding a knowingness of what street cred is and who has it signals that they are in the know of what is current and trending and adds to one's coolness and popular culture capital.

Discussion

Street cred can be conceptualized as representing a unique form of embodied cultural capital. From a theory of practice perspective, we argue that it represents a set of interrelated capabilities, understandings, and discourses that emerge from the poor inner-city neighborhoods where resources are scarce and employment in the underground economy is prevalent (Bennett et al. 2020). Our respondents indicated a perceived criminal history might authenticate such origins, providing a testament to one's street smarts and toughness. Thus, what is often stigmatized may instead serve as proof of authenticity here. As poor and dangerous neighborhoods and the pursuit of independence and success are not restricted to the United States, street cred, and its importance within and outside of the subculture may be universal.

In its true, pure, and highest form, this cultural capital cannot be readily obtained by nonnatives of the street culture that produces it. Instead, it is reserved for people of specific origins and accomplishments. One cannot easily break into the caste system that has created street cred without falsifying one's credentials, which, in turn, illegitimizes the credibility being sought. From this perspective, individuals who acquire forms of cultural capital derive value by properly deploying it as they navigate social life in consumer subcultures where it is most relevant (Schau et al. 2009). In these spaces, the ability to embody street cred allows for the pursuit of status and enables one to identify both their position within the field's social hierarchy and that of others. Still street cred, as stated earlier, is used by populations well beyond that of the inner city. For example, a recent twitter search shows 78 million uses of the terms street credibility and street cred a six-month span.

The widespread use of the term as a consumer colloquialism (e.g., "this look enhances my street cred") may be employed ironically as a tongue-in-cheek expression, mimicking capital owned by others (e.g., Eminem's) or sardonically positioning one as street cred's polar opposite. Such use further suggest a "knowingness" of what street cred is among nonmembers. Nonmembers also use the term to reflect credibility without reference to the street subculture (i.e., "earning CPA will increase your street cred"). This misuse violates the knowingness, may be seen as "lame" by the subcultures members and nonmembers who are "in the know." Such use in advertisements may be harmful and should be avoided by marketers.

REFERENCES

Bennett, D., Diamond, W., Miller, E., & Williams, J. (2020). Understanding bad-boy celebrity endorser effectiveness: The fantasy-based relationship, hedonic consumption, and congruency model. *Journal of Current Issues & Research in Advertising*, *41*(1), 1-19.

McCracken, G. (1989). Who is the celebrity endorser? Cultural foundations of the endorsement process. *Journal of Consumer Research*, *16*(3), 310-321.

Moore, R. L. (2004). We're cool, mom and dad are swell: Basic slang and generational shifts in values. *American Speech*, *79*(1), 59-86.

Nancarrow, C., Nancarrow, P., & Page, J. (2002). An analysis of the concept of cool and its marketing implications. *Journal of Consumer Behaviour: An International Research Review*, *1*(4), 311-322.

Naison, M. (2018). Flavor and Soul: Italian America at Its African American Edge. Champaign, Il.

Ohanian, R. (1990). Construction and validation of a scale to measure celebrity endorsers' perceived expertise, trustworthiness, and attractiveness. *Journal of Advertising*, *19*(3), 39-52.

Podoshen, J. S. (2008). The African American consumer revisited brand loyalty, word-of-mouth and the effects of the black experience. *Journal of Consumer Marketing*.

Reid, R. A., & Curry, T. A. (2019). Are We There Yet? Addressing Diversity in Political Science Subfields. *PS: Political Science & Politics*, *52*(2), 281-286.

Schau, H. J., Muñiz Jr, A. M., & Arnould, E. J. (2009). How brand community practices create value. *Journal of Marketing*, *73*(5), 30-51.

Schouten, J. W., & McAlexander, J. H. (1995). Subcultures of consumption: An ethnography of the new bikers. *Journal of Consumer Research*, *22*(1), 43-61.

Conferring Minds to Machines: A Deep Learning Approach
to Mind Perception, Technology Attachment, and Trust

Anouk Bergner, University of St. Gallen, Switzerland
Jochen Hartmann, University of Hamburg, Germany
Christian Hildebrand, University of St. Gallen, Switzerland

EXTENDED ABSTRACT

Perceiving a mind in others is paramount to navigating the world around us. Thinking whether other entities possess a mind inspired research from interpersonal perception in humans (Gray, Gray, and Wegner 2007; Waytz et al. 2010)however, always ascribe minds to other people, and sometimes ascribe minds to non-people (e.g. God, gadgets to seminal court cases on human rights for animals (Premack and Woodruff 1978) and even to theological beliefs (Barrett and Keil 1996). The proliferation of AI-enabled technologies that appear increasingly more human-like, raises fundamental questions about the role and impact of mind perception in the consumer technology landscape. Anecdotal evidence suggests that consumer-object relationships may vary dramatically among consumers interacting with these devices (Hoffman and Novak 2018; Novak and Hoffman 2018). Uncovering this variability in mind perception and understanding the extent to which these differences in perceiving a mind reflects the underlying relationships between consumers and technology, as well as the downstream consequences of mind perception in non-human agents, are unanswered and fundamental questions.

The current work builds on theory of mind literature to classify the extent of mind consumers perceive in their smart objects. In this research, we explore the link between mind perception in cutting-edge humanized AI and downstream consequences on consumer attachment to, trust in, and evaluation of smart objects from unstructured customer review data. Using a large-scale panel of smart object users, we demonstrate that perceiving a mind in an AI-enabled object, such as a voice assistant, predicts customer product ratings, trust perceptions, and consumers' attachment to technology. Furthermore, in order to identify the extent of mind perception from unsolicited customer reviews, we leverage state-of-the-art transfer learning models (Devlin et al. 2019) to extract subtle cues from unstructured text. We develop an automated text classifier and demonstrate the accurate prediction of mind perception from unsolicited, unstructured customer reviews.

The study was designed to establish the importance of mind perception as a critical predictor of consumers' attachment to, trust in, and overall evaluation of a smart object, and to test whether an automated text classifier is able to predict mind perception unobtrusively from these unstructured customer reviews. A total of 810 active smart home assistant users were recruited from an online consumer panel (M_{age} = 36; 57.9% female). Participants were instructed to write an online review about their smart home assistant (e.g., on Amazon.com). After they completed the review, we assessed mind perception on 8 dimensions (adapted from Gray et al. 2007 α=.89). Furthermore, we assessed consumers' evaluation of, trust in, and attachment to their smart object as follows: First, participants were asked to assign a star rating to the smart assistant. Second, we assessed privacy concerns with a 3-item measure (Dinev and Hart 2004; α=.95). Third, we measured consumers' object attachment using a behavioral measure by asking consumers to indicate a value (in USD) to forgo using their assistant for one month (log-transformed due to skewed distribution).

In line with our hypothesis, a regression analysis confirms that greater mind perception leads to an increase in customer ratings (β=.58, *p*<.001), object attachment (β=.51, *p*<.001) and a decrease of consumer privacy concerns (β=-.34, *p*<.01). To quantify the effect sizes of the coefficients reported in the regression analysis, we ran a post-estimation analysis, predicting each dimension for customers who attribute higher vs. lower mind perception to their smart home assistant (using a median-split for illustrative purposes). Star ratings are 11% higher for customers with high mind perception (5.22 vs. 5.79), privacy concerns 7% lower, and customers with low mind perception expected lower compensation to forgo the use of their smart assistant $37.69 USD, while customers with high mind perception demanded $62.54 USD, an increase of 66%.

Based on the findings of this study, we build an automated text classifier to detect and predict consumers' degree of mind perception of their smart home assistants. We employ a transfer learning model to leverage knowledge outside the training data. Specifically, we fine-tune DistilBERT, a pre-trained state-of-the-art language model (Sanh et al. 2019). We formulate the mind perception prediction as a binary classification problem by median-splitting the data. Hence, the baseline accuracy is 50%. We train the language model for 10 runs, which yields and average accuracy of 62.60%, highlighting that unsolicited consumer reviews contain signals that can be used to understand a consumers' level of mind perception in an unobtrusive way and that goes beyond mere measures of consumer sentiment.

In this paper, we established a relationship between mind perception, consumer attachment to, trust in, and consumers' overall evaluation of smart objects. Specifically, we discovered a positive relationship between conferring minds to machines and customer ratings, a negative relationship to privacy concerns, and a greater extent of attachment to their smart objects. We used unstructured customer review data to train a state-of-the-art text classifier to accurately predict mind perception from these customer reviews. To the best of our knowledge, this is the first research developing a state-of-the-art text classifier to unobtrusively detect customers' perception of mental capacities in a non-human agent from unstructured text data and how differences in mind perception predict consumers' attachment to, trust in, and evaluation of consumers' smart objects.

REFERENCES

Barrett, Justin L. and Frank C. Keil (1996), "Conceptualizing a Nonnatural Entity: Anthropomorphism in God Concepts," *Cognitive Psychology*, 31(3), 219–47.

Devlin, Jacob, Ming-Wei Chang, Kenton Lee, and Kristina Toutanova (2019), "BERT: Pre-Training of Deep Bidirectional Transformers for Language Understanding," http://arxiv.org/abs/1810.04805.

Dinev, Tamara and Paul Hart (2004), "Internet Privacy Concerns and Their Antecedents - Measurement Validity and a Regression Model," *Behaviour & Information Technology*, 23(6), 413–22, https://doi.org/10.1080/0144929041000171572 3.

Gray, Heather M., Kurt Gray, and Daniel M. Wegner (2007), "Dimensions of Mind Perception," *Science*, 315(5812), 619.

Hoffman, Donna L and Thomas P Novak (2018), "Consumer and Object Experience in the Internet of Things : An Assemblage Theory Approach," *Journal of Consumer Research*, 44, 1178–1204.

Novak, Thomas and Donna L. Hoffman (2018), "Relationship Journeys in the Internet of Things: A New Framework for Understanding Interactions Between Consumers and Smart Objects," *Journal of the Academy of Marketing Science*, 216–37.

Premack, David and Guy Wooclryff (1978), "Does the Chimpanzee Have a Theory of Mind," *The Behavioral and Brain Sciences*, 4, 515–26.

Sanh, Victor, Lysandre Debut, Julien Chaumond, and Thomas Wolf (2019), "DistilBERT, a Distilled Version of BERT: Smaller, Faster, Cheaper and Lighter," *arXiv*, 2–6, http://arxiv.org/abs/1910.01108.

Waytz, Adam, Kurt Gray, Nicholas Epley, and Daniel M. Wegner (2010), "Causes and Consequences of Mind Perception," *Trends in Cognitive Sciences*, 14(8), 383–88, http://dx.doi.org/10.1016/j.tics.2010.05.006.

Essence Slows the Rate of Hedonic Decline by Adding Meaning

Baler Bilgin, Koç University, Turkey
Cammy Crolic, University of Oxford, UK

EXTENDED ABSTRACT

Imagine buying a new painting for your office wall; you will enjoy it less as you are repeatedly exposed to it. Yet, periodically switching paintings is a costly solution. Hence, it is important for marketers to know whether certain factors can slow down hedonic decline, increasing the enjoyment consumers derive from experiences.

Hedonic decline is a decrease in responsiveness to hedonic stimuli meaning that positive experiences become less enjoyable with repeated exposure (Coombs and Avrunin 1977; Frederick and Loewenstein 1999; Galak and Redden 2018). It decreases when perceived variety increases (Epstein et al. 2009; Galak, Redden, and Kruger 2009), rate of consumption is slowed (Galak, Kruger, and Loewenstein 2013), and when consumption episodes are categorized more specifically (Redden 2008). Yet, hedonic decline is not physiological; it can be constructed in the moment (Galak and Redden 2018). Research has suggested that meaning making influences this construction process (O'Brien 2019; Yang and Galak 2015). Hedonic decline slows when each exposure provides an opportunity to make meaning. For example, when people see the same movie many times, they notice new things, form theories, and speculate, which are all acts of making more meaning with each consumption episode.

Importantly, we propose that essence can slow hedonic decline by enabling meaning making. People believe that objects acquire a special aura or "essence" from their past which affects the valuation of consumer products (Argo et al. 2008; Morales and Fitzsimons 2007; Newman and Dhar 2014) and original artworks (Newman and Bloom 2012). Perceived essence layers on non-physical elements and can add to the meaning of an object. This increases the potential meaning that can be extracted with each exposure. Accordingly, we hypothesize that hedonic decline will slow when people can use essence to make meaning. We further hypothesize that perceived essence will slow down hedonic decline when people use it to construct their own meaning of an object but not when they believe meaning is fixed. This is because while people can use perceived essence to construct meaning, it is irrelevant without a meaning construction process (i.e., belief that meaning is predetermined). In sum, we hypothesize that:

Hypothesis 1: *(a) Perceived essence slows hedonic decline (b) when people believe they can construct their own meaning but not when meaning is fixed*

Three studies support our predictions. Study 1 showed that greater perceived essence (i.e., an earlier serial number of an art print (2/30) versus a later serial number (27/30); Smith, Newman, and Dhar 2015) led to slower hedonic decline. 120 MTurkers were randomly assigned to either early or later serial number conditions. All participants looked at an art print labeled no. 02/30 or 27/30 for 15 seconds and then rated their enjoyment of the print (*0=Not at all, 100=Very much*). They viewed and rated it eight total times. A repeated-measures ANOVA revealed a significant interaction ($F(7, 826)=2.04$, $p=.047$). Two planned contrasts confirmed that the pattern of the interaction matched our theory. The first enjoyment rating did not differ between the two label number conditions ($M_{2/30}=60.15$ vs. $M_{27/30}=56.21$; $F<1$). However, the contrast on the final enjoyment rating indicated a significant difference ($M_{2/30}=48.97$ vs. $M_{27/30}=36.83$; $F(1, 118)=3.72$, $p=.05$), as predicted. Thus, greater perceived essence

from an earlier serial number led to a slower hedonic decline (i.e., a less steep slope) and supports H1a.

Study 2 replicated the key effect of essence slowing hedonic decline using a different manipulation of essence (i.e., geographic proximity: original production location versus new production location; Smith et al. 2015) of a song recording. It also showed that greater perceived essence slows hedonic decline by enhancing the meaning of the experience. 127 MTurkers were randomly assigned to either production in the original location condition or production in a newer location condition. All participants listened to a Beatles song produced in the original location in London or in a newer location in China for 30 seconds and then rated their enjoyment of the song eight times. Next, they indicated how much the song expressed something for them (*1=not much at all; 7=very much*), which measured meaning and served as the mediator. A repeated-measures ANOVA revealed a significant interaction ($F(7,875)=2.49$, $p=.016$). Two planned contrasts confirmed that the first enjoyment rating did not differ between conditions ($M_{original}=77.81$ vs. $M_{newer}=70.78$; $F(1,125)=2.34$, $p=.13$) but there was a significant difference on the final enjoyment rating ($M_{original}=61.10$ vs. $M_{newer}=40.38$; $F(1,125)=11.16$, $p=.001$). This result supports that greater essence (i.e., the original location) led to a slower rate of hedonic decline further supporting H1a. A one-factor ANOVA revealed that the original (vs. newer production) location expressed more meaning ($M_{original}=4.18$ vs. $M_{newer}=3.20$; $F(1,125)=7.14$, $p=.009$) and a mediation analysis (Model 4 with 10,000 resamples; Hayes 2018) revealed the indirect effect of production location through meaning was significant [-.35; *CI 95%*: -.71, -.08].

Study 3 replicated the key effect when participants were led to believe that meaning can be constructed but the effect disappeared when led to believe that meaning is fixed. We used the method from study 1 except prior to viewing the art, participants either read a blurb about how meaning is either constructed or fixed. 140 MTurkers were randomly assigned to one of four conditions of a 2 (number: 2/30 vs. 27/30) x 2 (meaning: fixed vs. constructed) x 8 (viewings) design. There was an overall interaction ($F(7,928)=2.28$, $p=.026$). When participants believed meaning is constructed by the perceiver, the results replicated the previous studies. There was a significant interaction ($F(7,482)=3.77$, $p=.0005$) and planned contrasts confirmed the first enjoyment rating did not differ ($M_{2/30}=64.93$ vs. $M_{27/30}=57.55$; $F(1,70)=1.95$, $p=.17$) but the final enjoyment did ($M_{2/30}=57.40$ vs. $M_{27/30}=33.21$; $F(1,70)=11.88$, $p=.001$) between conditions. Yet when meaning is fixed, the results support our theory that meaning making underlies our effects. The interaction was not significant ($F<1$). The lack of an interaction shows that limiting the opportunity to make meaning reduced the impact of perceived essence on hedonic decline. Thus, when people are led to believe that they can construct their own meaning essence slows hedonic decline but not when it is fixed, consistent with H1b.

REFERENCES

Argo, Jennifer J., Darren W. Dahl, and Andrea Morales (2008), "Positive Consumer Contagion: Responses to Attractive Others in a Retail Context," *Journal of Marketing Research*, 45 (6), 690-701.

Coombs, Clyde H. and George S. Avrunin (1977), "Single-Peaked Functions and the Theory of Preference," *Psychological Review*, 84 (2), 216-30.

Frederick, Shane and George Loewenstein (1999), "Hedonic Adaptation," in Well-Being: The Foundations of Hedonic Psychology, ed. Daniel Kahneman, Ed Diener, and Norbert Schwarz, New York: Russell Sage, 302-29.

Galak, Jeff and Joseph P. Redden (2018), "The Properties and Antecedents of Hedonic Decline," *Annual Review of Psychology, 69,* 1-25.

Galak, Jeff, Justin Kruger and George Loewenstein (2013), "Slow Down! Insensitivity to Rate of Consumption Leads to Avoidable Satiation," *Journal of Consumer Research*, 39 (5), 993-1009.

Galak, Jeff, Joseph P. Redden, and Justin Kruger (2009), "Variety amnesia: Recalling past variety can accelerate recovery from satiation," *Journal of Consumer Research*, 36, 575-84.

Morales, Andrea C., and Fitzsimons, Gavan J. (2007), "Product Contagion: Changing Consumer Evaluations Through Physical Contact with 'Disgusting' Products," *Journal of Marketing Research*, 44 (April), 272-83.

Newman, George E. and Paul Bloom (2012), "Art and authenticity: The importance of originals in judgments of value," *Journal of Experimental Psychology: General*, 141 (3), 558-69.

Newman, George E. and Ravi Dhar (2014), "Authenticity Is Contagious: Brand Essence and the Original Source of Production," *Journal of Marketing Research*, 51 (3), 371-86.

O'Brien, Ed (2019), "Enjoy It Again: Repeat Experiences Are Less Repetitive Than People Think," *Journal of Personality and Social Psychology*, 116 (4), 519-540.

Redden, Joseph P. (2008), "Reducing Satiation: The Role of Categorization Level," *Journal of Consumer Research*, 34 (5), 624-34.

Smith, Rosanna K., George E. Newman, and Ravi Dhar (2016), "Closer to the Creator: Temporal Contagion Explains the Preference for Earlier Serial Numbers," *Journal of Consumer Research*, 42 (5), 653-68.

Yang, Yang and Joseph Galak (2015), "Sentimental Value and Its Influence on Hedonic Adaptation," *Journal of Personality and Social Psychology*, 109(5), 767-90.

Perceived Social Presence of Anthropomorphized Chatbots

Miriam Biller, University of Mannheim, Germany
Elisa Konya-Baumbach, University of Mannheim, Germany
Sabine Kuester, University of Mannheim, Germany
Sergej von Janda, University of Mannheim, Germany

EXTENDED ABSTRACT

More and more companies use chatbots instead of human employees as a more time and cost efficient way to interact with customers (Kannan and Bernoff 2019). Chatbots are computer programs based on natural language designed to approximate written or oral human speech in an interaction mediated by a digital interface (Thomaz et al. 2020). The design of a chatbot can impact the customer experience during an interaction (Huang and Rust 2018). For example, chatbots can be equipped with human-like characteristics. Imbuing non-human entities "with human-like characteristics, motivations, intentions and emotions" is defined as anthropomorphism (Epley, Waytz, and Cacioppo 2007, p. 864). While prior research has generated some understanding of the effectiveness of product and brand anthropomorphism, there is a lack of research on the effectiveness of chatbot anthropomorphism. Even if no other real person is present, human-like attributes might spark feelings of social presence (Van Doorn et al. 2017). Social presence refers to an individual's subjective perception that another person or entity is present (Biocca 1997).

The present research proposes that chatbot anthropomorphism positively influences customers' perceived social presence in customer-chatbot interactions. Social presence, in turn, is assumed to positively influence customer-related outcomes, hence, mediating the effect of chatbot anthropomorphism on customer-related outcomes. Additionally, this research assesses whether these assumptions hold in both a pre-purchase and a post-purchase context. Furthermore, this research explores whether the effect of social presence on customer-related outcomes is contingent on whether customers have a hedonic or utilitarian shopping motivation and on whether the shopping situation involves sensitive information or not.

The present research comprises four individual studies. Studies 1, 2 and 3 were set up in a pre-purchase context whereas Study 4 took place in a post-purchase context. Study 1 is a 2 (chatbot anthropomorphism: no vs. yes) x 1 experiment in the context of online wine shopping with 275 individuals from a commercial consumer panel. In line with prior research (e.g., Aggarwal and McGill 2007), anthropomorphism was manipulated by using first vs. third person descriptions in the chatbot introduction. First, participants were introduced to the scenario experiment and subsequently saw an interaction with the chatbot in the form of screenshots. Study 2 (N=247) used the same procedure as in study 1, with three differences. We changed the scenario to the context of book shopping, additionally manipulated the shopping context (i.e., utilitarian versus hedonic book shopping) and analyzed two additional outcomes – word of mouth and satisfaction with the shopping experience. Study 3 (N=510) is a 2 (chatbot anthropomorphism: no vs. yes) x 2 (shopping information: non-sensitive vs. sensitive) experiment. Participants in the non-sensitive shopping information condition were instructed to shop for a remedy for colds while participants in the sensitive shopping information condition were instructed to shop for a libido increase drug.

The results of study 1 indicate that chatbot anthropomorphism positively influences trust and purchase intention. The analyses of study 2 and study 3 validate the findings of study 1 for the additional customer-related outcomes word of mouth and satisfaction with the shopping experience. We conducted mediation analyses for the two outcomes in study 1 and moderated mediation analyses (Preacher and Hayes 2004) for the four outcome variables trust, purchase intention, word of mouth, and satisfaction with the shopping experience in study 2 and 3. All analyses yielded the same pattern of results. First, the total effects of chatbot anthropomorphism on the outcome variables are significant and turn non-significant when social presence is added to the equation as a mediator. Second, the indirect effects of chatbot anthropomorphism on the respective customer-related outcomes via social presence are positive and significant. Thus, the mediation analyses provide evidence for a full mediation (Zhao, Lynch, and Chen 2010). The results of study 2 indicate no significant differences between the effectiveness of chatbot anthropomorphism in utilitarian versus hedonic shopping contexts. Further, the results of study 3 indicate no significant differences between the effectiveness of chatbot anthropomorphism in sensitive versus non-sensitive shopping information contexts. Hence, the positive effect of chatbot anthropomorphism on customer-related outcomes seems to be robust and does not seem to be contingent on neither the shopping context (utilitarian versus hedonic) nor the shopping information (non-sensitive vs. sensitive).

In study 4 (N=283) we adapted the scenario to the post-purchase context and applied a similar chatbot anthropomorphism manipulation as in the preceding studies. Participants were told that they already bought a case of wine after having been advised by the winebot. However, upon delivery they had to detect that four of the six bottles of wine had a cork taint. Therefore, they were angry and approached the winebot again with a complaint. We included the same customer-related outcomes as in Studies 2 and 3. The results indicate that chatbot anthropomorphism does not influence customer-related outcomes in the context of a post-purchase complaint. All indirect effects of chatbot anthropomorphism on the respective customer-related outcomes via social presence are non-significant. Furthermore, the total effects of chatbot anthropomorphism on the outcome variables are non-significant. Additionally, except for trust, there is no significant direct effect of anthropomorphism on the outcome variables. Hence, the findings illustrate a boundary condition of the positive effect of chatbot anthropomorphism on customer-related outcomes, which calls for further research.

Our research contributes to the literature on anthropomorphism, social presence, and chatbots. We extend the anthropomorphism research to the context of chatbots and provide evidence for a variety of important customer-related outcomes in customer-chatbot interactions. Furthermore, we add to the literature on antecedents and consequences of social presence by demonstrating that social presence is the underlying mechanism that accounts for the effectiveness of chatbot anthropomorphism. Additionally, we extend prior research by showing that social presence of chatbots positively influences customers' trust, purchase intention, word of mouth, and satisfaction with the shopping experience while not being contingent on hedonic versus utilitarian shopping contexts as well as sensitive versus non-sensitive shopping information. Finally, we gather first evidence that anthropomorphized chatbots only seem to be beneficial in the pre-purchase stage and not in the post-purchase stage.

REFERENCES

Aggarwal, P., and McGill, A. L. (2007), "Is That Car Smiling at Me? Schema Congruity as a Basis for Evaluating Anthropomorphized Products", *Journal of Consumer Research*, 34 (4), 468-479.

Biocca, F. (1997), "The cyborg's dilemma: progressive embodiment in virtual environments," *Journal of Computer Mediated Communication*, 3 (2).

Epley, N., Waytz, A. and Cacioppo, J. T. (2007), "On Seeing Human. A Three Factor Theory of Anthropomorphism," *Psychological review*, 114 (4), 864–886.

Huang, M.-H. and Rust, R. T. (2018), "Artificial Intelligence in Service," *Journal of Service Research*, 21 (2), 155-172.

Kannan, P. V. and Bernoff, J. (2019), "Does Your Company Really Need a Chatbot?" *Harvard Business Review*, available at: https://hbr.org/2019/05/does-your-company-really-need-a-chatbot (accessed 28 January 2020).

Preacher, K. J. and Hayes, A. F. (2004), "SPSS and SAS Procedures for Estimating Indirect Effects in Simple Mediation Models," *Behavior Research Methods, Instruments, & Computers*, 36 (4), 717–731.

Thomaz, F., Salge, C., Karahanna, E., and Hulland, J. (2020), "Learning from the Dark Web: leveraging conversational agents in the era of hyper-privacy to enhance marketing," *Journal of the Academy of Marketing Science*, 48 (1), 43–63.

Van Doorn, J., Mende, M., Noble, S. M., Hulland, J., Ostrom, A. L., Grewal, D. and Petersen, J. A. (2017), "Domo Arigato Mr. Roboto," *Journal of Service Research*, 20 (1), 43–58.

Zhao, X., Lynch, J. G. and Chen, Q. (2010), "Reconsidering Baron and Kenny: Myths and Truths about Mediation Analysis," *Journal of Consumer Research*, 37 (2), 197-206.

Managing Customers' Imagination: Antecedents and Effects of Anticipated Surprises

Severin Friedrich Bischof, Copenhagen Business School, Denmark
Tim M. Boettger, IESEG School of Management, France
Thomas Rudolph, University of St. Gallen, Switzerland
Donald Lehmann, Columbia University, USA

EXTENDED ABSTRACT

Summary

This research aims to examine anticipated surprises, which we define as the deliberate purchase and anticipation of surprise items. While the literature has addressed the workings of unexpected surprises, it has not yet touched upon the anticipatory aspect of consumers expecting a surprise. Surprise subscriptions in retail embody the concept of anticipated surprises, as these subscriptions ship recurring boxes containing items chosen solely by the subscription provider. We apply the music-based ITPRA theory to pursue an analysis of the antecedents of anticipated surprise. Our results suggest that shoppers only pleasantly anticipate a surprise in case of bounded possibility realms. Prompting consumers to imagine the eventual surprise increases tension by limiting vagueness and thereby summons feelings of pleasant anticipation. This research utilizes experimental and field data to surface important implications for researchers in terms of a universal theory of anticipation.

Introduction

Surprise purchases, as offered by today's surprise subscriptions (e.g., Try the World, FabFitFun, StitchFix), represent valuable objects for scientific observation, as they are a white space within the academic literature. Existing surprise-related research did not address surprise as a retail mechanism, but only as the over- or under-fulfillment of expectations in the moment of consuming a product (Mano and Oliver 1993; Oliver and DeSarbo 1989; Oliver, Rust, and Varki 1997). Anticipation, due to its many facets in both expected and unexpected surprise situations, characterizes an important dimension of this phenomenon. We add to this by expanding surprise-related theories towards surprise as a manipulation rather than an outcome or dependent variable of consumption processes.

Hypothesis Development:

H1

Based on the research gap of surprise as a retail mechanism, this project explores surprise subscriptions of consumer goods. Subscribers purchase recurring deliveries of surprise packages, deriving value from two procedural factors: anticipating the delivery and experiencing surprise upon unpacking. Anticipation Theory states that savoring, i.e., the process of waiting for a positively valenced experience, such as the prospect of receiving a kiss from one's celebrity crush, is sometimes preferable over immediate payoffs, (Loewenstein 1987). In contrast, the same author finds that individuals seek to avoid wait times for negatively valenced experiences, such as the prospect of experiencing pain (Loewenstein 1987). Due to their schema-disrupting nature, surprises are widely considered an inherently negative emotion (Huron 2006; Plutchik 1980). We thus hypothesize that consumers are less willing to wait for surprises and thus value low uncertainty.

> Hypothesis 1.   Consumers value low uncertainty more than high uncertainty.

Hypothesis Development:

H2

The ITPRA theory by Huron (2006) defines several points in the process leading up to a surprise and starts with *imagination*, the point where subjects form all expectations about the surprising event. Closer to the point of surprise, a subject experiences *tension* as a form of preparation for the surprising moment. The following *prediction* response represents a reconsideration and refinement of former expectations regarding the imminent surprise moment. The *reaction* finally occurs in the moment of surprise, followed by an *appraisal* response yielding positive feelings in case of a harmless and pleasant surprise. Looking forward to a surprise differs from looking forward to a predefined event or offering because consumers have more images in their head when thinking of an event of which they have a clearer and more certain imagination. When customers think of a surprise, they have fewer images to ponder over in their mind, owing to their uncertainty.

> Hypothesis 2   Imagination of specific outcomes increases tension (by lowering uncertainty).

Study One

In the first experiment, we conduct a 2 (predefined vs. surprise product) x 2 (with wait vs. without wait before product disclosure) experiment on the interplay between anticipation and surprise. Participants in this experiment saw one of two advertisements for a fictional recipe subscription service that would either allow customers to pre-select their recipes (predefined condition) or send surprise recipes each week (surprise condition). We found that the surprise mechanism interacted with wait time, such that participants were willing to pay more for the predefined subscription when they had to wait, while their willingness to pay for the surprise offering was lower when it involved a wait. This supports H1.

Study Two

In the second experiment, we specifically manipulated participants' imagination during the anticipation period. We exposed participants only to the surprise version of the above fictional recipe subscription's advertisement and applied a 2 (imagery appeal vs. not) x 2 (wait time vs. not) between-subjects design. The analysis yielded a significant moderated mediation model with a marginally significant interaction between imagery appeal and wait time on tension. The mediation via tension on willingness to pay is statistically significant. This supports H1 and H2.

Study Three

We complemented these laboratory studies with a field experiment that seeks to replicate the process of anticipating a surprise as proposed by the ITPRA theory (Huron 2006). It investigates whether the sequence of imagination, tension, prediction and reaction, and appraisal also hold in real-life consumer behavior in the retail realm and asked participants before and after receiving the subscription box regarding their ITPRA-related feelings. The study confirmed the ITPRA process of anticipated surprise and was successfully re-

produced in a real-life setting, such that more imagination leads to higher tension and, subsequently, to higher liking of the surprise. This supports H2.

Conclusions

Scholars, so far, have only regarded surprise and disconfirmation in unexpected instances. By explicitly incorporating surprise as part of consumer goods subscriptions, this project extends research on anticipation and delight. Our findings have important implications for subscription providers and E-Commerce retailers in general, whose customers all face wait times between order and receipt of a purchase. Retailers now need to design processes that allow consumers to use such wait times for building anticipation and savoring. This research, thus, challenges previous notions about consumers' motivations to exert full control over their purchasing journeys and allows us to demonstrate the central effects and value of managing customers' anticipation in regard to surprise purchases.

REFERENCES

Huron, David Brian (2006), *Sweet Anticipation: Music and the Psychology of Expectation*, Cambridge, MA: MIT Press.

Loewenstein, George (1987), "Anticipation and the Valuation of Delayed Consumption," *The Economic Journal*, 97 (387), 666–84.

Mano, Haim and Richard L. Oliver (1993), "Assessing the Dimensionality and Structure of the Consumption Experience: Evaluation, Feeling, and Satisfaction," *Journal of Consumer Research*, 20 (3), 451.

Oliver, Richard L. and W. S. DeSarbo (1989), "Processing of the Satisfaction Response in Consumption: A Suggested Framework and Research Propositions," *Journal of Consumer Satisfaction, Dissatisfaction, and Complaining Behavior*, 2 (1), 1–16.

Oliver, Richard L., Roland T. Rust, and S. Varki (1997), "Customer delight: Foundations, findings, and managerial insight," *Journal of Retailing*, 73 (3), 311–36.

Plutchik, Robert (1980), *Emotion: A psychoevolutionary synthesis*, Harpercollins College Division.

Consumers as Brand Managers: Exclusion and Status in Brand Communities

Samantha Bittner, Ohio Northern University, USA
Tatiana Marie Fajardo, Florida State University, USA

EXTENDED ABSTRACT

In this research, we examine the motivation to exclude others from a brand affiliated group and the effect of doing so on consumers' desire for branded products. Among those with low domain-relevant experience, peripheral group status and the associated feelings of insecurity regarding group membership should make social needs particularly salient. For those with high domain-relevant experience, who are viewed as core group members, perceptions of membership security should generate a sense of acceptance and belongingness that addresses social needs. Thus, those low in domain-relevant experience should use the brand community to satisfy social needs, whereas those high in domain-relevant experience may use the brand community to satisfy ego needs.

Excluding others has been linked to a decrease in belongingness (Bastian et al. 2013) but an increase in perceptions of power and status (Dijkstra et al. 2008; Thibaut and Kelley 1959; Zadro et al. 2005). Inclusion of others, by contrast, has been shown to increase feelings of social connectedness and satisfy belongingness needs (Wellman and Wortley 1990) but decrease perceptions of power, posing a threat to fulfillment of ego needs (Cillessen and Mayeux 2004). This suggests that community members who perceive high levels of domain-relevant experience are more likely to exclude others than community members who perceive low levels of domain-relevant experience.

We test this proposition across three experiments and one secondary data study. Study 1A utilized a single factor design in which participants were randomly assigned to one of three conditions: high domain experience, moderate domain experience, or low domain experience. Participants were asked to rank how often they use nine different products, with one indicating the product they use the most often and nine indicating the product they use the least often. Participants were then assigned to imagine being a member of an online brand community depending on their randomly assigned domain experience condition. All participants were informed that in order to become a member of the brand community, applicants must be voted in by existing members. Participants were asked to vote on whether to admit a series of potential new members of the community. As expected, individuals in the high domain experience condition (M = 0.90) excluded significantly more applicants than participants in the moderate domain experience condition (M = 0.52, $F_{(1, 128)}$ = 4.43, p = 0.04) and participants in the low domain experience condition (M = 0.44, $F_{(1, 128)}$ = 6.51, p = 0.01).

For study 1B we collected discussion board postings for an online brand community for a national coffeehouse chain. In this community, members suggest ideas for improvements to the brand. Other members are then able to post responses to the idea. In total, 100 of the most recent response postings were collected from the "Popular Ideas" section of the site. Individuals who were designated as top commenters were coded as high domain experience individuals, while those not given this designation were coded as low domain experience individuals. Each of the 100 postings were coded by two independent coders, blind to our hypotheses, who determined whether each posting was considered an instance of exclusion or inclusion. As predicted, individuals with high domain experience were more likely to engage in exclusionary behavior (36 of 43 postings or 83.72% coded as exclusionary) than members with low domain experience (4 of 47 postings or 8.51% coded as exclusionary).

Study 2 seeks to examine whether the relationship between exclusionary/inclusionary behavior and brand commitment is moderated by consumers' perceptions of domain experience. This study utilized a 3 (interaction type: exclusion, inclusion, forum member) between-subjects design. Each participant's level of coffee consumption was used as a measure of domain experience. In the exclusion (inclusion) condition, participants were asked to imagine that while a member of the brand community, they receive a notification one day stating that a new member is being considered. They were then asked to imagine that after reviewing the applicant's information, they decided to vote against (for) admitting the applicant. Participants then wrote about how they thought they would feel after voting against (for) the applicant. In the forum member condition, participants were simply asked to imagine they were a member of the brand community and how they thought they would feel about being a member. Results indicated a significant interaction effect ($F_{(2, 258)}$ = 4.54, p = 0.01). Exclusion (compared to inclusion) resulted in significantly higher brand commitment among individuals with domain experience values greater than 4.40 (β = 0.40, t = 1.65). At values greater than 4.43, exclusion (compared to the forum member condition) yielded significantly higher brand commitment (β = 0.38, t = 1.65). Inclusion, relative to exclusion, resulted in significantly higher brand commitment when domain experience values were less than 2.42 (β = -0.41, t = -1.65). Inclusion, relative to the forum member condition, yielded significantly higher brand commitment when domain experience values were lower than 2.95 (β = 0.35, t = 1.65).

Study 3 determines the mediating role of an individual's desire for status and desire for belongingness. The brand community description and interaction type manipulation were similar to those used in study 2. Following exposure to the interaction type manipulation, participants completed a measure of their desire for social bonds and a measure of their status in the brand community. Participants with high (low) domain experience exhibited higher (lower) brand commitment when they excluded an applicant. Furthermore, among high domain experience participants, the relationship between the interaction type and brand commitment was mediated by feeling of status (C.I. = -0.29, -0.01) not by feelings of belongingness (C.I. = -0.41, 0.16). Conversely, among low domain experience participants, the relationship between the interaction type and brand commitment was mediated by feelings of belongingness (C.I. = 0.12, 0.65) not by feelings of status (C.I. = -0.01, 0.23).

Our results indicate that consumers high (low) in experience are more likely to exclude (include) other members, which in turn results in higher (lower) brand commitment after excluding another member. Moreover, this process is mediated via desire for status (social bonds) within the community.

Averse to Algorithms or Averse to Uncommon Decision Procedures?

Jonathan E. Bogard, Anderson School of Management, University of California, Los Angeles, USA
Suzanne B. Shu, SC Johnson College of Business, Cornell University, USA

EXTENDED ABSTRACT

In this paper, we argue that a very large share of apparent algorithm aversion is not an aversion to algorithms *per se*, but rather an aversion to uncommon decision procedures. Put simply, much of the algorithm aversion research has confounded the use of algorithmic forecasting methods with the use of an unconventional forecasting method.

When a counter-normative decision results in a negative outcome, people react more negatively (Kahneman & Miller, 1986). This tendency to penalize counter-normative decisions more harshly than nom-adhering decisions when they turn out badly could explain an apparent tendency to excessively penalize algorithms (relative to people) whenever a researcher confounds use of an algorithm with use of a counter-normative decision procedure. This leads us to predict that algorithms will be more excessively penalized when they are not the normal decision procedure.

In this paper, across four studies, we show that accounting for and/or manipulating the normativity of using an algorithm for some particular decision can minimize, eliminate, and sometimes entirely reverse algorithm aversion, demonstrating instead a preference for algorithms, whenever norms favor algorithmic decision procedures. Throughout, once properly accounting for the role of norms, we find a considerably smaller residual aversion to using algorithms. Further, we are able to decompose how much apparent algorithm aversion is due to an aversion to counter-normative decision procedures and how much is due to algorithm aversion *per se*.

The purpose of Study 1 (N=1168) was to test whether the amount of algorithm aversion is significantly lower when use of the algorithm was the norm for that decision. In a 2 (norm: consistent or inconsistent) x 2 (procedure: observed an algorithm or human err) between-subjects design, participants were told that the norm was for some particular medical analysis to be conducted by a doctor [algorithm]. Participants then observed an algorithm [doctor] fail, and were asked about anticipated regret.

We found, as predicted, a significant interaction suggesting that the amount of algorithm aversion depends on whether the norm is for the doctor or the algorithm to choose (beta = 2.27***). In fact, the interaction is so strong that we observe a complete crossover: when the doctor is the norm, we find significant algorithm aversion; when the algorithm is the norm, we find a significant preference for algorithms.

Additionally, beyond confirmation of our main hypothesis, we find evidence of four important insights.

(1) How much norms matter: Expected regret of choosing an algorithm that fails is considerably lower if the norm is for the algorithm, not the human, to make the decision (beta = -1.13***).

(2) Replicating traditional algorithm aversion: If the norm is for humans to choose, we observe greater regret when choosing the algorithm as opposed to the human (beta = -1.72***). This, we believe, is what has been mistakenly labeled "algorithm aversion" any time the selection of an algorithm has coincided with the norm of using a human forecaster for that particular domain.

(3) Reversing algorithm aversion: We find that, when algorithms are the known norm, greater regret is associated with a failed human rather than a failed algorithmic prediction (beta = 0.55***).

(4) Cleaner Test of Algorithm Aversion. We find that, conditional on a decision being norm-consistent, there is a greater penalty associated with failed decisions made by algorithms compared to humans (beta = 0.58***). Hence, while its effect is approximately half the effect-size of norms, we do in fact see a residual aversion to algorithms.

Study 2 (N=548) was a near-identical replication of Study 1 with one critical change: we tested whether the dependent measure of expected regret from Study 1 is a mediator of a measure more common of the algorithm aversion literature: participants' choice of whether to use an algorithm or human for a subsequent decision. To assess this, after mimicking the design of Study 1, we asked subjects who they would choose for a similar analysis for their own health decisions.

As hypothesized, whether participants penalized erring algorithms more than erring humans in their subsequent choice depends on whether the observed failure was norm-consistent or not (beta = 3.74***). Moreover, the effect of norm inconsistency on subsequent choice is mediated by expected regret. Norm-consistency significantly lowered expected regret (beta = 0.73***), which in turn was associated with greater likelihood of choosing an algorithmic forecaster (beta = -0.73***). A bootstrapped indirect effect of 0.17 was highly significant.

In Study 3 (N= 390), participants read a description of two people who missed a flight because of a route deviation, one suggested by a cab driver and the other suggested by Google Maps. Participants were asked how likely they would be to follow a suggested route deviation themselves if it came from Google Maps versus a cab driver. They were also asked about the normalcy of navigation by Google Maps. As predicted, the extent to which people prefer a human to an algorithm depends on how uncommon they think it is for an algorithm to suggest a route (beta = -0.46***). Moreover, contrary to the predictions of algorithm aversion, we found no smaller preference for using Google Maps among those who read about erring humans and algorithms compared to those in the control condition who did not read about these failures.

In Study 4 (N=469), we tested whether the same pattern of aversion to counter-normative decision procedures holds in the context of potential gains rather than realized losses. We replicated the design of Study 1, this time in the context of someone standing to gain $1000 in a betting pool based on predictions of football games. We find an identical pattern of results as observed in Study 1 for all tests except one: we find no residual aversion to algorithms once accounting for norm-consistency (beta=0.19, p=0.298 NS).

In sum, we're able to replicate the typical algorithm aversion findings, minimize or reverse them, explain them in terms of norm-adherence or norm-violation, and perform a cleaner test of algorithm aversion. When we isolate the independent effect of norm-consistent algorithm aversion, we find that it sometimes—though not always—persists, and is considerably smaller than the effect of norms.

Despite the fact that algorithms often outperform human forecasters, there is evidence that people seem to prefer human recommendations (Dietvorst et al., 2015). Here we show that this may be driven, to a very large extent, by an underlying aversion to decision procedures that are against the norm. As norms change and algo-

rithms become more broadly accepted for a given forecast or decision—as they have in domains as disparate as navigation and dating recommendations—we expect people's tendency to unduly punish them to shrink commensurately.

REFERENCES

Dietvorst, B. J., Simmons, J. P., & Massey, C. (2015). Algorithm aversion: People erroneously avoid algorithms after seeing them err. *Journal of Experimental Psychology: General*, *144*(1), 114–126. https://doi.org/10.1037/xge0000033

Kahneman, D., & Miller, D. T. (1986). Norm theory: Comparing reality to its alternatives. *Psychological Review*, *93*(2), 136–153. https://doi.org/10.1037/0033-295X.93.2.136

Products in Disguise: Communicating Product Benefits with Surface Mimicry

Caroline De Bondt, Ghent University, Belgium
Anneleen Van Kerckhove, Ghent University, Belgium
Maggie Geuens, Ghent University, Belgium

EXTENDED ABSTRACT

This article advances that surface mimicry—designing one product to look like another product (Lidwell, Holden and Butler 2010)—is an effective technique to communicate property information to consumers. Specifically, we posit that due to the inclusion of a visual property of another product (i.e., shape, package or serving mechanism) into the appearance of a target product, surface mimicry induces property mapping: a thinking style which leads consumers to transfer property information from one product onto another altering consumers' target product beliefs (Wisniewski 1996).

Based on extant research in psycholinguistics and marketing, we propose that surface mimicry will lead to property mapping when the following conditions are met. First, the two products share alignable properties (Wisniewski 1998). Second, the target product and mimicked product differ in terms of the alignable attribute(s) (Wisniewski 1996; 1997). For instance, consider the conceptual combination 'zebra horse'. A zebra and a horse share many communalities (e.g., four legs, identical body shape), but differ in skin tone (stripes). Skin tone is thus the alignable property which will be mapped from a zebra onto a horse. Third, mapping the value of an alignable property of the mimicked product onto the target product occurs only when this property is salient (Aaker and Keller 1990; Swaminathan et al. 2015). In addition, claims that are beyond a certain threshold of credibility will not lead target beliefs to assimilate (Stafford, Leigh, and Martin 1995). Hence, we hypothesize:

Hypothesis 1:   *Designing a target product to mimic a modifier product leads the target product's beliefs to assimilate with the (a) alignable, (b) dissimilar, and (c) salient attributes of the mimicked product (= surface mimicry effect).*

Hypothesis 2:   *The activation of a property mapping mindset underlies the surface mimicry effect.*

Hypothesis 3:   *The surface mimicry effect is attenuated when the distance in beliefs between the target product and the mimicked product is more (vs. less) substantial.*

We demonstrate the potential of surface mimicry and test our hypotheses by applying the technique to healthy food. Healthy food products often are perceived as poor tasting (Belei et al. 2012). Therefore, we copy a visual property that is prototypical for a tasty food product to the appearance of a healthy food product in order to communicate that the healthy product also is tasty.

Study 1a established that surface mimicry increases taste beliefs of a healthy product, but only when taste is an alignable property with a dissimilar value (H1a,b). We assigned 193 Mturk participants randomly to an advertisement presenting a piece of watermelon (1) in its regular shape (control), (2) as a popsicle (taste=alignable, dissimilar), (3) as an apple (taste=alignable, similar), or (4) as a star (taste=non-alignable). Taste perceptions of the watermelon only increased when it mimicked a popsicle.

Study 1b followed up by illustrating that surface mimicry for alignable, dissimilar attributes also has downstream consequences on food consumption. While watching a short movie fragment, 111 undergraduates could consume a snack ad libitum. This snack was either a healthy (baby carrots) or unhealthy product (chips) and either came on a plate (control) or in cone typically used to serve French fries. As expected, participants ate more when the baby carrots came in a French fry cone than on a plate (taste$_{carrots-fries}$=dissimilar), but mimicry did not affect chips' consumption (taste$_{chips-fries}$=similar).

Study 2 showed that shape mimicry influences those beliefs that are most salient for the mimicked product (H1c). Sixty-three members of a consumer panel participated in a mixed experiment in which they evaluated (1) either a normal kiwi or a kiwi shaped as a popsicle (taste=salient) and (2) either a normal popsicle or a popsicle shaped as a banana (health=salient). As expected, participants rated the mimicked kiwi's tastiness higher than the regular kiwi while no difference occurred for perceived healthiness, and the exact opposite pattern was found for the popsicle.

Study 3a provided empirical evidence for the claim that surface mimicry primes a property mapping process (H2). One alternative manner, besides property mapping, to interpret combinations of objects or concepts is "relational linking". Relational linking implies that people search for a plausible relationship between two concepts such as when they interpret a whale boat as a boat used for whale watching, whereas under property mapping it would be interpreted as a boat shaped like a whale (Wisniewski 1996, 1997). After 100 Mturk workers were exposed to an advertisement depicting vegetables either in its normal shape or mimicking a burger, they were presented five novel noun-noun phrases (Wisniewski and Love 1998), for which they indicated which interpretation (a relational linking vs. a property mapping) they thought was more plausible. Results show that the surface mimicry (vs the control) condition yielded a higher plausibility of property mapping interpretations. In addition, a bootstrap mediation analysis disclosed that the extent of property mapping underlied the effect of surface mimicry on taste beliefs.

Study 3b corroborated the conclusion of study 3a. Before being exposed to an ad depicting walnuts in a bucket typically used for popcorn, a total of 172 Mturk participants either received (1) no processing instructions, or were instructed (2) to "think about the relation between the two" (relational linking condition) or (3) to "think about product characteristics that the product could share with the product typically served in this package." Results denote that participants' taste beliefs in the control condition equaled those of participants in the property mapping condition, but were different from the ones in the relational linking condition, providing support for the hypothesis that consumers spontaneously engage in property mapping when processing a surface mimicry ad.

To test H3, study 4 considered two healthy target products (cherry tomatoes and Brussels sprouts) that differ in the extent to which their associated taste beliefs differ from the mimicked product's taste beliefs (a lollipop). Randomly exposing 149 Mturk workers to a picture that featured either cherry tomatoes or Brussels sprouts in their normal shape or mimicking a lollipop mimicry showed that surface mimicry ameliorated taste beliefs of both products, though the resulting change is less outspoken for Brussels sprouts than for cherry tomatoes.

REFERENCES

Aaker, David A. and Kevin L. Keller (1990), "Consumer Evaluations of Brand Extensions," Journal of Marketing, 54 (1), 27-41.

Belei, Nina, Kelly Geyskens, Caroline Goukens, Suresh Ramanathan, and Jos Lemmink (2012), "The Best of Both Worlds? Effects of Attribute-Induced Goal Conflict on Consumption of Healthful Indulgences," Journal of Marketing Research, 49 (6), 900-909.

Fazio, Russel H., David M. Sanbonmatsu, Martha C. Powell, and Frank R. Kardes (1986), "On the Automatic Activation of Attitudes," Journal of Personality and Social Psychology, 50 (2), 229-238.

Lidwell, William, Kristina Holden, and Jill Butler (2010), Universal Principles of Design: 125 Ways to Enhance Usability, Influence Perception, Increase Appeal, Make Better Design Decisions, and Teach Through Design. Beverly, MA: Rockport Publishers.

Stafford, Thomas F., Thomas W. Leigh, and Leonard L. Martin (1995), "Assimilation and Contrast Priming Effects in the Initial Consumer Sales Call," Psychology & Marketing, 12 (4), 321-47.

Swaminathan, Vanitha, Zeynep Gürhan-Canli, Umut Kubat, and Ceren Hayran (2015), "How, When, and Why Do Attribute-complementary versus Attribute-similar Cobrands Affect Brand Evaluations: A Concept Combination Perspective," Journal of Consumer Research, 42 (1), 45-58.

Wisniewski, Edward J. (1996), "Construal and Similarity in Conceptual Combination," Journal of Memory and Language, 35 (3), 434-53.

_____(1997), "When Concepts Combine," Psychonomic Bulletin and Review, 4 (2), 167-83.

_____(1998), "Property Instantiation in Conceptual Combination," Memory and Cognition, 26 (6), 1330-347.

Wisniewski, Edward J. and Bradley C. Love. (1998), "Relations versus Properties in Conceptual Combination," Journal of Memory and Language, 38 (2), 177-202.

Consumer Hope For Material Wealth in the New African Pentecostalism

Samuel K. Bonsu, GIMPA, Ghana
Jemima Nunoo, GIMPA, Ghana
Fadwa Chaker, Toulouse Business School, France

EXTENDED ABSTRACT

We explore African Pentecostal adherent practices/processes, drawing on a five-year ethnographic study located in Ghana. We conclude that the African Pentecostalism promise of material well-being dramatically transforms local practices in a manner that allows adherents to nurse hope for immense material wealth, even for those whose realities offer no hope.

Introduction

...the selling point of the Pentecostal message is the offer of rewards that blends the positive aspects of all these events. Such rewards imply significant enough material wealth that one can afford the luxuries of life, along with social markers such as good home, a decent job, a Mercedes Benz automobile, and high social repute... This hope [has become an important product that is]... promoted (Bonsu and Belk 2010; p. 312).

African Pentecostalism emerged out of the independent African churches Movement that was pioneered by Aladura Church, founded in Nigeria (Peel 2016). In the age of globalization, these churches now offer practices in adherents' material realities that are well-integrated into globalization's consumer ideology – with promises of economic paradise (Bonsu and Belk 2010)

– and neglect of the orthodox Euro-American Christian ideal that restricts material indulgences.

The epigraph references how African Pentecostalism proffers hope of eschatological salvation as well as good health and immense wealth on earth, through complex contemporary global branding practices (Bonsu and Godefroit-Winkel 2016).

Selling such hope in God has become the cornerstone of the new Pentecostalism that operates in a world of material conspicuous consumption that does not always include the poor. As an effective mechanism for coping with poverty (Yurdakul and Atik 2016), Pentecostalism invites the poor to a type of "imaginative hedonism" (Campbell 1987) that places them in a state of desire for immense wealth beyond reasonable reach (Benyah 2019), grounded in the contemporary notions of "development by market" (Bonsu 2019) intermingled with religious ideologies. Taking on a global cosmopolitan veneer, the new African Pentecostalism embraces a diversity of religious traditions that come together to emphasize supernatural gains manifested in material abundance for believers (Bonsu and Belk 2010).

As capitalism has traversed a globalized world, it has been informed by local cultures, leading to many "capitalisms" (Freeman 2012). However, research has only begun to recognize the breakdown of opposition between the spiritual and the material (Taylor 2007) that funds the African Pentecostal pragmatism that defines adherents' consumption and material priorities (e.g., Appau and Ozanne 2020; Asamoah-Gyadu 2010; Gifford 2003). Consequently, this paper sought to excavate the underpinnings of African Pentecostalism for purposes of crafting theory and relevant modes of understanding that fits the new African religious orientation. The paper explores the ideological tenets of Pentecostalism and its value through ethnographic studies in Ghana, West Africa. Ghana is a politically stable country that exhibits a vast array of Pentecostal beliefs/practices.

This diversity offers an excellent opportunity for theorizing towards a comprehensive framework for understanding Pentecostal logics.

We also seek to understand the foundations of adherents' hope for material and eschatological salvation, and what happens in the events that their hopes do not materialize. That is, many of the hopes offered by Pentecostal preachers do not come to pass. However, adherents do not lose hope but may even grow stronger in their expectations of success. In

an effort to understand this situation, we draw on Goffman's (1952) notion of "cooling down the mark" that attempts to explain why people might be conned repeatedly. We speculate that contemporary reframing and transformation of religion contributes to adherents' continued escalation of commitment towards effective pursuit of balance in the face of existential demands that are not always convergent. Ultimately, we propose a theoretical frame of reference for explaining consumer blending of religious and secular ideologies within their material realities, and how they manage failures.

Method

We conducted a five-year ethnography to explore African Pentecostal experience as a lens for understanding the processes and practices of religious reformulation in contemporary culture. Participant observation, depth interviews. TV broadcasts and textual materials were the primary sources of data. We attended church services in addition to church-sponsored conventions and open air "crusades" (services) that were organized by various Pentecostal churches. Except for keeping field notes, observed events were not recorded. However, many sermons are available on CDs sold by the churches.

In addition to participant observations, we conducted depth interviews with 26 Pentecostal informants (12 male, 14 female). Interviews helped explore the meanings of evangelical Pentecostalism to informants and the practices that were associated with their beliefs. Interviews took place at the informants' places of work or at their church and lasted an average of one hour; some extended over several days. They were all conducted in English. Some informants suggested key reading material that they viewed as fundamental to their beliefs. We read these materials and analyzed numerous messages preached by church leaders.

Data analysis was an ongoing process that began during initial data collection and continued throughout the research process (Emerson, Fretz, and Shaw 1995). Earlier analysis was considered preliminary, intended mainly to guide data collection with a focus on grounded charismatic Pentecostal practices and their relationship to the analytical categories that were emerging from the data. Detailed analysis began after data collection with a complete reading of field notes, interview transcripts and other data. Such reading allowed for thematization at the global level within the data. Our approach was one that required travel back and forth between personalized accounts and analytical structures in the process of developing theoretical points of interests (Emerson, et al 1995). Our diverse data sources allowed for cross-integration of interpretations.

Findings: Dream-Making

"Dream-making" represents the Pentecostal practice of setting improbable material goals and desires within the modalities of religious understanding. The Pentecostal adherents we observed per-

ceive Divinity's primary role is to provide the requisite platform and resources (e.g., intellect, health, opportunity) for a potentially successful material life. The adherent ideally converts these resources into immense material wealth through specific practices including prayer, active learning, and forming social networks within the broader church family. Within this religious framework, the bounds of material and religious achievement are rendered limitless. The pattern of crafting dreams and demanding them through faith and action is sustained by at least two processes: sense-breaking and sense-giving, as per Pratt (2000).

Sense-giving. Pratt (2000; p. 469) defined sense-giving as a socialization process of

learning to focus one's mind on positive enforcements that are "uplifting and edifying". Sense- giving is akin to Peale's (1952) "positive thinking," differing on the core point that the individual not only thinks positively but actively ignores external sources with the potential to counter or defeat such thinking. The individual also takes self-initiative toward goal achievement by faith, prayer, and action. Miracles are harnessed in the service of grand consumption goal fulfillment.

Drawing on the life of David in the Bible, in the broader context of the interview, one informant (Garth) identified suffering – by which he meant delayed gratification of consumption needs – as training for how he would live with his God-given wealth as a Christian. Garth's hope for his own material wealth is sustained by his belief that his current financial situation is not ideal but it is consistent with his station in life and that in God's time he will meet all his material needs. These needs include moving out of his parents' home into one of his own, buying a car, and studying abroad. Although reason may calculate what is desired, it is non-reasoned faith and action that provide for the congregant's seemingly impossible desires.

Adherents are also taught to seek material fulfillment across a diversity of life situations including marriage and protection of self (and others) from evil. Prayers are consistent with the observation that Africans do not distinguish between sacred and secular requests in prayer (Carter 1976), and that their requests are often pragmatic solutions to the vagaries of everyday life (Mbiti 1975). It is not surprising, then, that informants had one major symbol of material success in Ghana – a Mercedes Benz – on their prayer lists. The high status symbolism of this automobile indicates the extent to which Pentecostal practice connects to adherents sense of self identification and status negotiations through objects. For the poor, the open and aggressive pursuit of wealth may well be the appeal of the new Pentecostalism. It offers hope for a better future economically and spiritually. So, sermons, prayers and other church activities are key socialization equipment that allows adherents to live in a world of hope in anticipation of the good life. They are supported by tremendous camaraderie among adherents.

Sense-breaking. Analyzing the experiences of informants whose dreams were achieved and those whose were not suggested a pattern that governed dream-making. We have labeled this pattern as "sense-breaking". Whereas sense-giving focuses on the adherent learning to equip him or herself with the necessary skills for Pentecostal living, sense-breaking is a process of religious seeking that devalues the individual's sense of self to create a meaning gap that must be filled (Pratt 200; p. 464). It represents a breakdown of meaning and connects the need for new meaning to an ideal self-grounded in material possessions. The ideal self is one that extends to include material possessions (Belk 1988) and so "the self is not just a physical entity bounded by skin [but] a psychological construct in which the concept of *me* and the concept of *my* are blended" (Pratt 2000; p. 464). Sense-breaking involves identification of role models who exemplify the ideals being pursued. These role models become the satisfaction point for self-completion.

Grounded in the prosperity doctrine, Pentecostal adherents demonstrated various facets of sense-breaking. They set improbable material desires that were aligned with several Biblical figures recast as materially successful role models (e.g., David, Solomon, Jesus). We observed that achieving material expectations that would seem improbable (e.g., jobs beyond their qualifications, luxury cars beyond their economic means) indicated the adherent's Pentecostal piety. In the spirit of grandiose living as religious work, Joan observed that:

> [God] wants us [all Pentecostals] to do well. The riches on this earth are His. King David was a very rich man, King Solomon was a very rich man, the Jews are very rich people, these are God's people…Solomon did not hide his riches
> ….God knows we need riches to survive and do well…the more we have, the more we can do God's work…(Joan)

Notice Joan's alignment of her material ambitions with the financial success of biblical Kings, and her unambiguous portrayal of riches as a "need", without which she cannot do God's work. Within this newer ethics and morality, self-denial is not highly valued as it signals disobedience to God and church (Heward-Mills 2002). Breaking sense here involved a careful reformulation of traditional protestant ideal of asceticism (Weber 1958) to allow for immense wealth as a necessary part of Pentecostal existence. This is in spite of the fact that Solomonic riches were unlikely for Joan. The wealth of David and Solomon serves as a destination point for the adherent and she acknowledged the possibility of not achieving this goal. However, she noted her obligation to defy conventional wisdom in her implied "get rich or die trying" motivation. Thus, facilitated by sense-breaking, the Weberian notion of self- denial highlighted by Mason (1998) has given way to a more aggressive pursuit of wealth for purposes of social distinctions among these Pentecostals. Reason is cast away in favor of religious "magic" (miracles) as the source of meaning for outcomes.

Sense-breaking and its implications are challenged when the unconventional expectations are not realized. Some informants held that the unlimited flow of answers to prayer may be tempered by "God's will", in which case the believer does not receive the expected answer. For example, Reba prayed for admission into law school and did not receive it. She attributed the outcome to God's plan for her life – setting her up at her current workplace for reasons that are still not apparent to her. She has faith and hope that there is a positive aspect to this outcome and that in time, she will find the direction that God has chosen for her. The seeming contradiction in this observation is one that Shaw (2001) identified as necessitating various dissonance reduction strategies. Shaw observed selective attention to successes and reinterpretation of instances of failure to achieve prosperity or specific consumer desires for which God had been petitioned. In this way, hope for prosperity is sustained despite evidence to the contrary.

To counter the dissonance (Festinger 1959) and disidentification (Elsbach and Bhattacharya 1997) that would otherwise result from failed belief and prayer, Reba reconstructed her belief in expectation of future goals, suggesting no need to explain her failure in the present. The challenge to Reba's belief that God answers all prayers is mitigated by the employment of new cues – a current job that places her in an economic position that is better than many others in the country – to reconcile her expectations and the actual outcome of her prayers. She preserves the magical thinking in sense-breaking

by focusing on the fact that she is serving a particular purpose in her current job, even if she does not know this purpose yet. She still hopes to get into law school someday, noting her lack of control over what happens in her life and rendering absolute agency to God. Explanation is futile except as ordained by God.

Concluding Remarks

Although there has been research in globalization and consumer culture that draws on religion (e.g., Crockett 2017; Izberk-Bilgin,2012; Muniz and Schau 2005), these studies tend to merely employ religious motifs to understand secular consumer behavior. We combined the heritage of sociological theories with the more recent evolutionary theories (e.g., Whitehouse 2000) to suggest that African Pentecostalism has adopted a globalism stance that promises hope of material wellbeing for the rich and poor. Pentecostal adherents often exhibit consumption based affluence grounded in religious beliefs and personal actions toward economic success. The new Pentecostalism grants adherents greater personal agency for individual and societal wellbeing, thereby mobilizing adherent resources around moral and related investments toward a neo-liberal capitalist agenda that rests in a hope for material 'heaven on earth'(Freeman 2012).

We observed that the Pentecostal adherent is attracted to her church much as a shopper is attracted to a department store based on projecting herself into its window display. She perceives church facilities and church members' material expressions as evidence of God's presence in their religious lives. It is her tendency to spiritualize the everyday that feeds the transformation of ordinary consumption into religious practice. Through its processes and practices, Pentecostalism offers promises of protection from the injurious structures of contemporary globalization, especially to those on the fringes of an increasingly globalized consumer world.

Hope is a positive emotion (Shaver et al. 1987) that arises from environments or outcomes characterized as goal congruent (e.g., Ellsworth and Smith 1988; Lazarus 1991). This congruence leads consumers to encode information that suggests possible outcomes – not impossible ones (McInnis and Mello 2005). Failed hope for material prosperity is recycled in a new round of hope for success, grounded in faith. We conclude that African Pentecostalism and its promise of material wellbeing produce strategies and sentiments that dramatically transform local practices into a religiosity-infused environment where the church thrives on its ability to sell hope of material success even to the poorest in society who really have no hope of ever becoming materially wealthy.

REFERENCES

Available on request

Giving Novel Brands the Benefit of the Doubt: How Asymmetrical Instrumentality Perceptions Influence Choice

Danielle J. Brick, University of New Hampshire, USA
Jessica Gamlin, University of Oregon, USA

EXTENDED ABSTRACT

Today, it is easier than ever for firms to expose consumers to a novel brand—i.e., one that is new and unfamiliar—via online retail. One challenge for managers in this landscape is that novel brands might not yet benefit from the persuasive content promoted via traditional advertising. A brand manager must therefore understand factors that influence choice of a novel brand. In the present research, we suggest that consumer goals within the choice environment play an important role. Previous research shows that consumers choose products that align with their goals and avoid products that are misaligned with their goals (Markman and Brendl 2000; Van Osselaer and Janiszewski 2011) and that such choice is based on whether the product is perceived to facilitate one's goal or risks obstructing that goal (Peak 1955; Rosenberg 1956). Consumers thus tend to choose products that offer greater instrumentality and, correspondingly, avoid those that present greater impedimentality (Bélanger et al. 2016; Fishbach, Zhang, and Trope 2010; Kopetz et al. 2012). However, there are situations when consumers are choosing a product that is misaligned with a goal they have (Hofmann et al. 2012). For example, a consumer may generally have a goal to be healthy but is confronted with a choice of dessert options (Goldsmith, Friedman, and Dhar 2019). In these situations, we suggest they may be more likely to choose the novel brand option as the novel brand suggests lower risk, or less impedimentality, to their goal. We test our theory across five studies, including two with actual choice.

Study 1 examined consumer choice of a novel brand (vs. control) when the product was aligned or misaligned with their goal. Students (N = 132) were asked to list two reasons why it is important to "indulge and eat tasty foods" (aligned condition) or "be healthy and eat healthy foods" (misaligned condition). Participants were told they could take a candy as a thank you for completing the session. Two bowls of candy were labeled: "Zing™ candy" (novel brand) or "candy" (control). A logistic regression of goal condition on choice showed a marginally significant effect ($p = .07$): In the goal-aligned (indulgence) condition participants were equally likely to choose the novel brand (52%) and control (48%; $p > .25$); whereas, in the goal-misaligned (health) condition, participants were significantly more likely to choose the novel brand (68%) compared to control (32%; $p < .01$).

In study 2, we examine why this effect arises, theorizing an asymmetrical instrumentality effect, such that when the product is aligned with a consumer's goal they perceive the novel brand to be equally instrumental to their goal, but when the product is misaligned with their goal, they perceive the novel brand as less harmful. MTurkers (N = 453) were told, "We are interested in how various products help or hurt people's goals." They completed a six-item instrumentality scale, our DV, which manipulated both brand (novel vs. control) and product-goal alignment (aligned vs. misaligned) in a between-subjects design. Participants in the novel brand [control] condition and *aligned* [*misaligned*] condition responded to items such as, "Does Zing Cola [soda] help or hurt your goal to have something *tasty* [*healthy*]?" (averaged into an index of instrumentality; α = .98). An ANOVA revealed the predicted interaction ($p = .01$): In the goal-aligned (indulgence) condition participants perceived the novel brand and control to be equally instrumental ($p > .25$); whereas, in the goal-misaligned (health) condition, participants perceived the

novel brand (vs. control) to be significantly *less* harmful ($p < .01$). Study 3 replicated these findings using a different product category (cough syrup) where the aligned (health) and misaligned (taste) goals were reversed.

Study 4 was a spontaneous thought listing task. MTurkers (N = 195) listed the "first five things that come to mind when you think about" either "Zing candy" (novel brand) or "hard candy" (control). An RA, blind to our hypothesis, coded participants' responses for the number of thoughts that were both instrumental to taste goals (aligned; e.g., sweet, tasty) and impedimental to health goals (misaligned; e.g., dentist, cavities). T-test analyses showed an equal number of instrumental features for the novel brand and control ($p > .25$), but significantly fewer impedimental features for the novel brand compared to control ($p < .05$), further reflecting the asymmetric instrumentality effect.

In our final field study, we show product-goal (mis)alignment on novel brand choice is mediated by instrumentality perceptions. We placed a "Taste Test" sign (activating a misaligned goal) on a table with two bowls labeled "Zing™ cough drops" (novel brand) and "cough drops" (control). Participants in the ostensible taste test (N = 79) rated the instrumentality of both the novel brand and control (anchored 1 = "tastes very good" and 9 = "tastes very bad"). Participants then made their choice. In this goal-misaligned situation, results revealed that the novel brand was chosen more frequently (61%) than the generic product (39%; $p = .05$). A repeated measures ANOVA showed that participants perceived the novel brand of cough drops to be less harmful (i.e., tastes less bad) than the generic cough drops ($p < .05$). Showing support for our full model, a logistic regression revealed that instrumentality perceptions significantly predicted choice, such that those who thought the novel brand was less harmful were more likely to choose a novel brand cough drop over a generic one ($p < .05$).

Across five studies we find that asymmetric instrumentality perceptions influence novel brand choice. When products are aligned with consumer goals, consumers are equally likely to choose a novel brand (vs. control) as they perceive both to be equally instrumental. However, when products are misaligned with consumer goals, consumers are more likely to choose the novel brand as they perceive the novel brand to be less impedimental, i.e., less harmful to their goal. This research has implications for branding, brand choice, consumer perceptions of product instrumentality, and consumer goal pursuit. Moreover, the present research can help managers determine when a novel brand is most appealing to consumers.

REFERENCES

Bélanger, Jocelyn J., Birga M. Schumpe, Marc-André K. Lafrenière, Mauro O. Giacomantoni, Ambra Brizi, and Arie W. Kruglanski (2016), "Beyond goal commitment: How expectancy shapes means evaluation," *Motivation Science,* 2 (2), 67-84.

Fishbach, Ayelet, Ying Zhang, and Yaacov Trope (2010), "Counteractive evaluation: Asymmetric shifts in the implicit value of conflicting motivations," *Journal of Experimental Social Psychology,* 46 (1), 29–38.

Goldsmith, Kelly, Elizabeth M. S. Friedman, and Ravi Dhar (2019), "You don't blow your diet on Twinkies: Choice processes when choice options conflict with incidental goals," *Journal of the Association for Consumer Research,* 4 (1), 21-35.

Hofmann, Wilhelm, Roy Baumeister, Georg Förster, and Kathleen Vohs (2012), "Everyday temptations: An experience sampling study of desire, conflict, and self-control," *Journal of Personality and Social Psychology,* 102 (6), 1318-1335.

Kopetz, Catalina, Arie W. Kruglanski, Zachary Arens, and Jordan Etkin (2012), "The dynamics of consumer behavior: A goal systemic perspective," *Journal of Consumer Psychology,* 22 (2) 208-223.

Markman, Arthur B. and C. Miguel Brendl (2004), "The influence of goals on value and choice," *Psychology of Learning and Motivation*, 39, 97-128.

Peak, Helen (1955), "Attitude and motivation," In M. R. Jones (Eds.)*, Nebraska Symposium on Motivation*, Lincoln, NE: University of Nebraska Press, 149–189.

Rosenberg, Milton J. (1956), "Cognitive structure and attitudinal affect," *The Journal of Abnormal and Social Psychology,* 53 (3), 367-372.

Soman, Dilip, and Amar Cheema (2004), "When Goals are Counterproductive: The Effects of Violation of a Behavioral Goal on Subsequent Performance," *Journal of Consumer Research,* 31 (1), 52–62.

Van Osselaer, Stijn MJ, and Chris Janiszewski (2011), "A Goal-Based Model of Product Evaluation and Choice," *Journal of Consumer Research,* 39 (2), 260–292.

When and Why Choices for Others Diverge from Consumers' Own Salient Goals

Olya Bryksina, University of Winnipeg, Canada

EXTENDED ABSTRACT

Imagine that you are on your way to a spa and your goal is to have a pleasant relaxing experience. You stop at a mall to pick up a present for your friend as his/her birthday is coming up. Is it possible that your own salient goal of having a relaxing experience will make you less likely to choose something relaxing as a gift for your friend? Here we inform this question by investigating how choices for others are influenced by consumers' own salient goals.

Prior findings have identified predominantly factors relevant to the recipient and/or the process of giving (Baskin et al. 2014; Robben and Verhallen, 1994; Ward and Broniarczyk, 2016; Zhang and Epley, 2012). Here we investigate how consumers' salient personal goals, unrelated to the process of giving, influence choices made for others. We show that consumers prefer options that are inconsistent with their own salient goals when choosing for others because such choices allow consumers to enhance the perception of their own progress on a goal. This occurs for goals held at an individual (vs. group) level and when choice-for-others situation exhibits relationship (vs. recipient) focus.

A prominent characteristic of goals is that they generate motivation to make goal-progress through engaging in goal-consistent actions (Carver and Scheier 1990; Dijksterhuis et al. 2007; Sela and Shiv 2009). Consumption of goal-consistent products allows individuals to perceive making progress on a salient goal (e.g., Atkinson 1957; Ekin and Laran 2019; van Osselaer and Janiszewski, 2012) hence salient goals motivate consumers to choose goal-consistent products for themselves. Goal-progress, however, is not only influenced by one's own goal-consistent (vs. inconsistent) actions but also by the standard of comparison used to assess progress. The higher the standard of comparison, the lower the perception of one's own progress. For example, responding on a higher (vs. lower) frequency response-scale primed participants to perceive making lower (vs. higher) progress on their fitness goal (Etkin and Ratner 2012). Likewise, reading that the average American exercises more (vs. fewer) times per week primed participants with perception of lower (vs. higher) fitness-goal progress (Park and Hedgcock 2016).

Here we argue that goal-consistent products chosen for other people will raise the standard of comparison for the assessment of consumers' own goal progress. Hence, goal-consistent (vs. goal-inconsistent) products chosen for others will be perceived as undermining (vs. enhancing) consumers' own progress on a salient goal. Thus, salient goals will motivate consumers to select goal-inconsistent products for others to enhance their own perception of progress on a salient goal.

We also suggest that this effect will only occur for choice-for-other situations that exhibit a relationship (but not recipient) focus (Liu et al. 2019). This is because in relationship-focus situations consumers self-reflect on how the choice bears on them, whereas in recipient-focus situations consumers focus on the self is greatly diminished (Liu et al. 2019). This lowers the likelihood that choice for another will be based on the consideration about how it influences consumers' own perceived goal progress. Hence, in recipient-focus situations the focal effect should not occur.

Further, we suggest that the focal effect be attenuated for goals held at group level. A goal is set at a group level when a specific level of performance that is to be attained is measured by collectively assessing the level of performance of all group members (Weingart and Weldon 1991; Weldon and Weingart 1988). Consumers should prefer goal-congruent products for others for salient goals set at group level because choosing a goal-consistent (vs. goal-inconsistent) product for another person should contribute to the perception of progress on the salient goal.

Five experiments tested the proposed effects. Experiment 1 established that goal-inconsistent (vs. goal-consistent) products chosen for other people enhance (vs. undermine) the perception of consumers' own progress on a salient goal. Female participants primed with a beauty goal perceived that they made more (vs. less) goal progress after they imagined buying a wine-tasting package (vs. beauty-spa package) for a friend. Experiment 2 showed that participants make salient-goal-inconsistent choices for other people when faced with actual choices. Undergraduate students were primed either with a goal of healthy eating or with a goal of indulgent eating. Participants primed with a healthy (vs. indulgent) eating goal were more likely to select a chocolate bar (vs. apple) to give to a friend. Experiment 3 showed that imputing goal-progress-generating value onto an otherwise neutral option reduces the choice of this option for a social other. Experiments 4 demonstrated that attenuating the effect of goal-directed choice on the perception of goal progress (via restricting participants' psychological choice freedom) increased the choice of a goal-consistent option for a social other. Finally, Experiment 5 showed that the focal effect is attenuated for goals held at a group level and for choice-for-other situations that exhibit a recipient focus. Participants primed with a going-green goal were more likely to select a hummer ride than a nature walk for a social other than for themselves when they wrote about the importance of going green to themselves but not when they wrote about the importance of going green to society as a whole. In addition, this salient-goal-divergent choice effect only manifested when choice for other situation was characterized by a relationship focus (i.e., gift-giving and joint consumption) but not when it was characterized by recipient focus (caregiving and favor/pick-up).

These findings make theoretical contribution to choice-for-others literature by identifying a novel factor that influences choice for others and a novel psychological mechanism that underlies it. These findings also contribute to goals-based-choice model by identifying recipient as a moderator in the effect of salient goals on choice of goal-directed products. Marketers can enhance the appeal of their products as gifts by positioning them incongruently with consumers' salient goals (which can be activated either directly via priming or indirectly via viewing content). These findings can also be of benefit to consumers by allowing them to be aware of the motivational effects of their own goals on choices that they make for others.

REFERENCES

Atkinson, John W. (1957), "Motivational Determinants of Risk-taking behaviour," *Psychological Review*, 64(1), 359-72.

Baskin, Ernest, Cheryl J. Wakslak, Yaacov Trope, and Nathan Novemsky (2014), "Why Feasibility Matters More to Gift Receivers than to Givers: A Construal-level Approach to Gift Giving," *Journal of Consumer Research*, 41 (June), 169–82.

Carver, Charles S. and Michael F. Scheier (1990), "Origins and Functions of Positive and Negative Affect: A Control-Process View," *Psychological Review,* 97 (1), 19–35.

Dijksterhuis, Ap, Tanya L. Chartrand, and Henk Aarts (2007), "Automatic Behavior," in Automatic Processes in Social Thinking and Behavior, ed. John A. Bargh, Philadelphia: Psychology Press.

Etkin, Jordan Juliano Laran (2019), "Restricting Choice Freedom Reduces Post-Choice Goal Disengagement," *Journal of the Association for Consumer Research*, 4(1), 36−46.

Etkin, Jordan and Rebecca K. Ratner (2012), "The Dynamic Impact of Variety among Means on Motivation," *Journal of Consumer Research,* 38 (6), 1076−92.

Liu, Peggy J., Dallas, Steven K., and Fitzsimons, Gavan J. (2019), "A Framework for Understanding Consumer Choices for Others," *Journal of Consumer Research*, 46(3), 407–434.

Park, Jooyoung and William M. Hedgcock (2016), "Thinking Concretely or Abstractly: The Influence of Fit Between Goal Progress and Goal Construal on Subsequent Self-regulation," *Journal of Consumer Psychology*, 26 (3), 395–409.

Robben, Henry S. J. and Theo M. M. Verhallen (1994), "Behavioral Costs as Determinants of Cost Perception and Preference Formation for Gifts to Receive and Gifts to Give," *Journal of Economic Psychology*, 15 (2), 333–50.

Sela, Aner and Baba Shiv (2009), "Unraveling Priming: When Does the Same Prime Activate a Goal versus a Trait?" *Journal of Consumer Research*, 36 (3), 418.

Spencer, Steven J., Zanna, Mark P. and Fong, Geoffrey T. (2005), "Establishing a causal chain: Why experiments are often more effective than mediational analyses in examining psychological processes," *Journal of Personality and Social Psychology, 89* (6), 845–51.

van Osselaer, Stijn M. J. and Chris Janiszewski (2012), "A Goal-based Model of Product Evaluation and Choice," *Journal of Consumer Research*, *39(2),* 260-92.

Ward, Morgan K. and Susan M. Broniarczyk (2016), "Ask and You Shall (Not) Receive: Close Friends Prioritize Relational Signaling over Recipient Preferences in Their Gift Choices," *Journal of Marketing Research,* 53 (6), 1001–18.

Weingart, Laurie R. and Elizabeth Weldon (1991), "Processes that Mediate the Relationship between a Group Goal and Group Member Performance," *Human Processes*, 4(1), 33–54.

Weldon, Elizabeth and Weingart Laurie (1988), "A Theory of Group Goals and Group Performance," paper presented at the meeting of the Academy of Management, Aneheim, CA.

Zhang, Yan and Nicholas Epley (2012), "Exaggerated, Mispredicted, and Misplaced: When 'It's the Thought That Counts'," *Journal of Experimental Psychology: General,* 141(4), 667–81.

Can Side-By-Side Comparisons Compromise Decision Outcomes?
A Construal-Level View of Evaluation-Mode Effects

Olya Bryksina, University of Winnipeg, Canada
Na Xiao, Laurentian University, Canada

EXTENDED ABSTRACT

Would you prefer to evaluate your choice alternatives separately (i.e., one at a time) or jointly (i.e., side by side) in order to make the best choice? We asked 505 members of the general population which mode of evaluation they thought would allow them to make a better decision. Two thirds answered that they would be more likely to make a choice based on most important primary attributes if they evaluated options side by side and would prefer to evaluate their options in that way.

Here we show that evaluating options side by side (vs. one at a time) reduces the likelihood of choosing based on the primary and most important product attributes. Drawing on literatures on evaluation mode (Hsee 1996; Hsee et al. 1999; Leclerc, Hsee, and Nunes 2005), construal-level theory (Liberman and Trope 1998; Trope and Liberman 2000), and goals-based choice (Kopetz et al. 2012; van Osselaer et al. 2005; van Osselaer and Janiszewski 2012), we demonstrate that side-by-side comparisons lower consumers' level of construal during product evaluation and choice, leading them to place relatively greater importance on secondary attributes when making decisions. This happens because side-by-side comparisons activate choice-related goals—goals pertaining to the choice process itself, such as to simplify choice or to enjoy the decision-making process (van Osselaer et al. 2005)—and, as we argue, these goals are construed at a lower level than consumption goals that are satisfied by primary attributes of products.

Evaluation mode refers to whether products are presented one at a time (SE) or jointly (JE). Product attributes that are difficult to evaluate in SE mode (e.g., how many programs a job applicant has coded) gain importance in product evaluation in JE mode (Hsee 1996; Hsee et al., 1999), and consumers tend to focus on information about products that is unique more so in JE than in SE mode (Kruger et al., 2014; Schley et al., 2017). Also, JE mode activates choice-related goals (i.e., goals relevant to the choice process itself, such as to simplify choice or to enjoy the process) in consumers which leads to increased importance of attributes that help to satisfy these choice-related goals (Xiao, 2019).

Construal level refers to whether information is processed at a relatively high abstract level, focusing on de-contextualized conceptualizations and primary product features or at a relatively low concrete level, focusing on context-specific details and secondary product features (Liberman & Trope, 1998; Trope & Liberman, 2000). When people pursue high-level superordinate (vs. low level subordinate) goals (Carver & Scheier, 1998) they process information at high abstract (vs. low concrete) level (Trope & Liberman, 2010).

We predict that JE (vs. SE) prompts a lower level of information construal. We predict this based on our proposition that choice-related goals activated by JE (Xiao, 2019) are construed at a more subordinate level than consumption goals (e.g., buy a high-quality TV).

In study 1, participants viewed products from six product categories either in SE mode (one product per page) or JE mode (two products from a category per page) and responded to two measures of construal—BIF and categorization. Participants who viewed products in JE (vs. SE mode) identified fewer actions in low-level terms and grouped objects into more categories—both indicative of lower-level construal. In study 2, participants evaluated two options of product (radio) either in SE or JE mode. One option was dominant on

primary attributes, while the other option was dominant on secondary attributes. JE-mode participants rated option dominant on secondary attributes more favorably that SE-mode participants. There was no difference in how option dominant on primary attributes was rated. In study 3, participants evaluated 2 options of a hotel (one dominant on primary attributes and one dominant on secondary attributes) either in SE or in JE mode. In addition, for half the participants we introduced a time-delay between exposure to options and options evaluation. According to Sela and Shiv (2009) goal activation intensifies after time delay. We expected that the effect of evaluation mode on construal level would be stronger in the time-delay condition than in the control condition. We measured attribute importance as a measure of construal. JE-mode participants assigned relatively greater importance to secondary (vs. primary) attributes than SE-mode participants and this effect was most pronounced in the time-delay condition. These results suggest that it is goal activation that led to the increase in relative importance of secondary (vs. primary) attributes in JE (vs. SE) mode condition. In study 4, participants evaluated two hotel options (same as study 3) either in SE or in JE mode. Half the participants were primed with a choice-related goal of simplifying the decision process. JE-mode participants evaluated option dominant on secondary attributes more favorably than SE-mode participants but only among participants that were not primed with a goal of simplifying the decision process. Among participants who were primed with a simplifying goal there was now difference between JE and SE conditions and option-preferences were similar to those of JE participants with no simplifying goal. These results support the notion that priming a choice-related goal lowered the level of information construal. In study 5, participants chose a snack (healthy vs. indulgent) in SE or JE mode. We also directly measured the extent to which participants held a choice-related goal of enjoying the evaluation and choice process. Low-level construal undermines self-control (Fujita et al. 2006); consistent with this notion, JE-mode participants were more likely to select an indulgent snack than SE-mode participants and the activation of enjoyment goal mediated this effect.

Our findings contribute to evaluation-mode literature, construal level theory and goals-based choice theory. Our findings can be utilized by marketers to influence consumers' construal level. Options dominant on primary (vs. secondary) attributes should be presented individually (vs. simultaneously). These findings can also be used by consumers to make better consumption decisions. Evaluate options one at a time to facilitate the likelihood of selecting based on most important primary product attributes.

REFERENCES

Carver, C. S., & Scheier, M. F. (1998). On the Self-Regulation of Behavior, New York: Cambridge University Press.

Hsee, Christopher K. (1996). The evaluability hypothesis: An explanation for preference reversals between joint and separate evaluations of alternatives. *Organizational Behavior and Human Decision Processes, 67*(3)*,* 247.

Hsee, Christopher K., Blount, Sally, Loewenstein, George F., & Bazerman, Maz H. (1999). Preference reversals between joint and separate evaluations of options: A review and theoretical analysis. *Psychological Bulletin, 125*(5), 576–590.

Kruger, T., Mata, A., & Ihmels, M. (2014). The Presenter's Paradox Revisited: An Evaluation Mode Account. Journal of Consumer Research, *41*(December), 1127–1136.

Liberman, N., Sagristano, M. D., & Trope, Y. (2002). The effect of temporal distance on level of mental construal. *Journal of Experimental Social Psychology*, *38*(6), 523–534.

Lee, H., Deng, X., Unnava, H. R., & Fujita, K. (2014). Monochrome forests and colorful trees: The effect of black-and-white versus color imagery on construal level. *Journal of Consumer Research, 41*(4), 1015–1032.

Liberman, N., & Trope, Y. (1998). The role of feasibility and desirability considerations in near and distant future decisions: A test of temporal construal theory. *Journal of Personality and Social Psychology*, *75*(1), 5–18.

Schley, D. R., Lembregts, C., & Peters, E. (2017). The role of evaluation mode on the unit effect. *Journal of Consumer Psychology*, *27*(2), 278–286.

Sela, A., & Shiv, B. (2009). Unraveling priming: When does the same prime activate a goal versus a trait? *Journal of Consumer Research, 36* (3), 418−33.

Slovic, P., Finucane, M., Peters, E., & MacGregor, D.G. (2002). The affect heuristic. In T. Gilovich, D. Griffin, & D. Kahneman (Eds.), *Heuristics and biases: The psychology of intuitive judgment* (pp. 397–420). New York, NY: Cambridge University Press.

Spencer, Steven J., Mark P. Zanna, and Geoffrey T. Fong (2005), "Establishing a Causal Chain: Why Experiments Are Often More Effective than Mediational Analyses in Examining Psychological Processes," *Journal of Personality and Social Psychology, 89* (6), 845–851.

Trope, Y., & Liberman, N. (2000). Temporal construal and time-dependent changes in preference. *Journal of Personality and Social Psychology*, *79*(6), 876–889.

Trope, Y., & Liberman, N. R. (2010). Construal-level theory of psychological distance. *Psychological Review*, *117*(2), 440–463.

Tversky, A., & Kahneman, D. (1974). Judgment under uncertainty: Heuristics and biases. *Science*, *185*, 1124–1130.

Vallacher, R. R., & Wegner, D. M. (1987). What do people think they're doing? Action identification and human behavior. *Psychological Review*, *94,* 3–15.

Xiao, Na (2019), Choice setting and product evaluation, Society for Consumer Psychology

Yan, D., Sengupta, J., & Hong, J. (2016). Why does psychological distance influence construal level? The role of processing mode. *Journal of Consumer Research*, *43*(4), 598–613.

Misguided Preference for Mysterious Consumption

Eva C. Buechel, University of Southern California, USA
Ruoou Li, University of South Carolina, USA

EXTENDED ABSTRACT

Consumers are increasingly choosing to engage in mysterious consumption, a phenomenon whereby consumers purchase products of unknown nature. The present research argues that the popularity of such items at least in part lies in the inherent uncertainty associated with the products, thus allowing for mysterious consumption.

Although uncertainty is widely considered as averse and uncomfortable (Gneezy et al. 2006; Kahneman and Tversky 1979), we posit that mysterious consumption represents a rare instance in which consumers seek out uncertainty because they want to be surprised (Charlesworth 1969; Mellers et al.1997; Hill et al. 2016) and want to resolve the curiosity they elicit (Loewenstein 1994; Ruan et al. 2018; Shen et al. 2015). These two forces, we argue, lead people to value the uncertainty of mysterious consumption and motivate them to seek it out.

In line with this proposition, we find a preference for mysterious consumption items over non-mysterious consumption items of equal expected value. In a pilot field study (N=100), 89% of consumers preferred a mystery stress relief ball over a comparable non-mystery one (vs. 50% choice share, $\chi2$ (99) = 60.84, $p < .001$). In study 1a (N=239), participants reported higher WTP for a mysterious selection of five (out of 20 possible) snacks ($M = \$10.13$) than for an average non-mystery selection ($M = \$7.73$; $F(1, 227) = 7.11$, $p = .008$) and for a self-chosen selection ($M = \$8.55$; $F(1, 227) = 3.15$ $p = .07$). In study 1b (N=150), participants showed a preference for the same mysterious selection over an average non-mystery selection (76% vs. 50% choice share; $\chi2$ (1, N=50) = 13.52, $p < .001$) and an above average non-mystery selection (74% vs. 50% choice share; $\chi2$ (1, N=50) = 11.52, $p = .001$). In this joint evaluation mode, however, participants preferred the self-chosen selection over the mysterious one (28% vs. 50% choice share; $\chi2$ (1, N=50) = 9.68, $p = .002$). Mediation analyses revealed that the effects were driven by wanting to be surprised (B = -1.16, SE = .31; Wald = 13.61, $p < .001$) but not by decision ease, selection effort, or wanting to explore new snacks ($ps >.11$).

Importantly, we also argue that this preference for mysterious consumption might be misguided. Surprise is traditionally conceptualized as an unexpected event (Heilman et al. 2002; Mellers et al. 1997). Mysterious consumption, however, represents a pre-announced and anticipated surprise. The anticipated nature of the surprise, along with the curiosity it elicits, we argue, leads people to engage in wishful thinking with regards to its nature (Lee and Qiu 2009; Weinstein 1980). This, in turn, leads to disappointment upon reveal of the mysterious product via hedonic contrast effect (Novemsky and Ratner 2003; Zellner et al. 2006). As a result, consumers are less satisfied with mysterious consumption items than comparable non-mysterious items.

A second set of studies provides support for the proposition that mysterious consumption can backfire. In study 2 (N=228), participants all received real boxes containing six snacks (Skittles, Haribo Gummy Bears, Butterfingers, Snickers, Welch's Fruit Snacks and M&M's) to keep as a gift. In two conditions, participants were told that they would be receiving a snack box once the experimenter finished preparing it, but the contents of the box were either mysterious (unknown to the participants) or non-mysterious (known to the participants). In a third, unanticipated surprise condition, participants received the identical box without forewarning. Mystery boxes

yielded less happiness ($M = 5.29$), more disappointed ($M = 2.59$), and less favorable ratings ($M = 3.80$) than non-mystery boxes (happiness: $M = 5.74$, $F(1, 188) = 4.32$, $p = .04$; disappointment: $M = 2.05$, $F(1, 188) = 6.66$, $p = .01$; ratings: $M = 4.11$, $F(1, 188) = 4.55$, $p = .03$) and unanticipated surprise boxes (happiness: $M = 6.06$, $F(1, 188) = 7.98$, $p = .005$; disappointment: $M = 1.64$; $F(1, 188) = 13.07$, $p = .005$; ratings: $M = 4.30$; $F(1, 188) = 7.79$, $p = .006$). This suggests that *anticipating* the surprise undermines the satisfaction with mysterious consumption.

Study 3 (N=646) provides direct process evidence for wishful thinking. After telling participants about a mystery box or a non-mystery box, we manipulated the extent of wishful thinking by either allowing no time, allowing time, or explicitly encouraging wishful thinking. Mystery boxes were rated higher when wishful thinking was impossible ($M = 3.24$) than when it was possible ($M = 2.96$; $F(1, 642) = 4.77$, $p = .029$) or explicit ($M = 2.96$; $F(1, 642) = 4.49$, $p = .035$). Replicating study 2, mystery boxes ($M = 2.96$) were rated less favorably than non-mystery boxes ($M = 3.39$) when participants had the opportunity to engage in wishful thinking ($F(1, 642) = 7.39$, $p = .007$).

Study 4 (N=244) rules out two alternative explanations. If mysterious consumption items are sought out because they provide utility from anticipation and/or reveal, then longer anticipation should yield greater utility. Participants either forecasted or reported utility from anticipation/ reveal after a short or long anticipation period. In contrast to these explanations, forecasters anticipated deriving marginally less utility from anticipation ($M = 3.63$) and equal utility from reveal ($M = 4.30$) after a long versus short waiting period (anticipation: $M = 4.06$, $F(1, 240) = 3.11$, $p = .079$; reveal: $M = 4.50$, $F < 1$). Experiencers reported deriving significantly less utility from anticipation ($M = 2.83$) and directionally less from the reveal ($M = 3.49$) after a long versus short waiting period (anticipation: $M = 3.60$, $F(1, 240) = 10.21$, $p = .002$; reveal: $M = 3.91$, $F = 2.63$, $p = .11$).

Together, we show that consumers prefer uncertainty in the context of mysterious consumption, but that this preference is misguided. Past research shows that uncertain rewards can approximate (Goldsmith and Amir 2010; Laran and Tsiros 2013) or outperform (Shen et al. 2015) certain rewards during goal pursuit. Extending these initial findings, we directly focus on the evaluations of certain and uncertain target outcomes and demonstrate a *preference* for uncertainty. Furthermore, we demonstrate that surprises can backfire when they are anticipated.

REFERENCES

Charlesworth, William R. (1969), "The Role of Surprise in Cognitive Development," in *Studies in Cognitive Development,* ed. David Elkind and John H. Flavell, New York: Oxford University Press, 257-314.

Gneezy, Uri, John A. List, and George Wu (2006), "The Uncertainty Effect: When a Risky Prospect is Valued Less Than Its Worst Possible Outcome," *The Quarterly Journal of Economics*, 121 (4), 1283-1309.

Goldsmith, Kelly and On Amir (2010), "Can Uncertainty Improve Promotions?" *Journal of Marketing Research*, 47 (6), 1070-77.

Heilman, Carrie M., Kent Nakamoto, and Ambar G. Rao (2002), "Pleasant Surprises: Consumer Response to Unexpected In-Store Coupons," *Journal of Marketing Research*, 39 (2), 242-52.

Hill, Krista M., Paul W. Fombelle, and Nancy J. Sirianni (2016), "Shopping under the Influence of Curiosity: How Retailers Use Mystery to Drive Purchase Motivation," *Journal of Business Research*, 69, 1028-34.

Kahneman, Daniel and Amos Tversky (1979), "Prospect Theory: An Analysis of Decision under Risk," *Econometrica*, 47 (2), 263–92.

Laran, Juliano and Michael Tsiros (2013), "An Investigation of the Effectiveness of Uncertainty in Marketing Promotions Involving Free Gifts," *Journal of Marketing*, *77*(2), 112-123.

Lee, Yih Hwai and Cheng Qiu (2009), "When Uncertainty Brings Pleasure: The Role of Prospect Imageability and Mental Imagery," *Journal of Consumer Research,* 36 (4)*,* 624-33.

Loewenstein, George (1994), "The Psychology of Curiosity: A Review and Reinterpretation," *Psychological Bulletin*, 116 (1), 75-98.

Mellers, Barbara A., Alan Schwartz, Katty Ho, and Ilana Ritov (1997), "Decision Affect Theory: Emotional Reactions to the Outcomes of Risky Options," *Psychological Science,* 8 (6), 423–29.

Novemsky, Nathan and Rebecca K. Ratner (2003), "The Time Course and Impact of Consumers' Erroneous Beliefs about Hedonic Contrast Effects," *Journal of Consumer Research*, 29 (4), 507–16.

Ruan, Bowen, Christopher K. Hsee, and Zoe Y. Lu (2018), "The Teasing Effect: An Underappreciated Benefit of Creating and Resolving an Uncertainty," *Journal of Marketing Research*, 55 (4), 556-70.

Shen, Luxi, Ayelet Fishbach, and Christopher K. Hsee (2015), "The Motivating-Uncertainty Effect: Uncertainty Increases Resource Investment in the Process of Reward Pursuit," *Journal of Consumer Research*, 41 (5), 1301-15.

Weinstein, Neal D. (1980), "Unrealistic Optimism about Future Life Events," *Journal of Personality and Social Psychology*, 39 (5), 806–20.

Zellner, Debra A., Dawn Allen, Monique Henley, and Scott Parker (2006), "Hedonic Contrast and Condensation: Good Stimuli Make Mediocre Stimuli Less Good and Less Different," *Psychonomic Bulletin & Review*, 13 (2), 235-39.

I Just Can't Quit You: When Good Habits Undermine Self-Control

Bryan Buechner, Xavier University, USA
Joshua J. Clarkson, University of Cincinnati, USA
Ashley Otto, Baylor University, USA

EXTENDED ABSTRACT

Political ideology reflects a set of ideals and principles that explain the basis by which society should function (Jost, Federico, & Napier, 2009). The construct is traditionally divided into two ideological groups: those who believe in maintaining the present social system (i.e., conservatives) and those who believe in individual liberty and social equality (i.e., liberals) (Gutmann, 2001).

Research on political ideology has recently extended the breadth of differences between these these groups to the domain self-control. Specifically, greater endorsement of political conservatism (vs. liberalism) is associated with elevated self-control in the form of greater attention regulation and persistence on tasks requiring response inhibition (Clarkson et al., 2015). Response inhibition is defined as the ability to override thoughts and behaviors that interfere with an existing decision rule (Baddley, 1996). The rationale for this success stems from conservatives' perceived control over their actions which, in turn, heightens their ability to regulate their attention (Rigoni et al., 2012). Indeed, this heightened attention and ability to inhibit unwanted responses is crucial in creating and building effective habits (Wood & Neal, 2009).

In the current work, we hypothesize that the inhibitory function that facilitates conservatives' self-control success comes at the expense of greater mental rigidity. This rigidity generates from repeated reliance on a decision rule (i.e., mental sets; Luchins & Luchins, 1959). Although reliance on decision rules can generate repeated solutions quickly and efficiently, the "mechanized mindset" it produces makes it difficult to update to new rules (Smith, 1995). As such, while inhibition can facilitate *habit formation* through persistence, it can consequently impair *habit change* through inability to update based on external influences (e.g., rule changes, newer relevant information).

We therefore posit that inhibition (i.e., adherence to a decision rule) can conflict with the ability to actively modify information in working memory to update the appropriate decision rule. Moreover, this conflict should make updating to a new decision rule more frustrating for conservatives, as these individuals not only perceive greater control over their actions (Carey & Paulhus, 2013; Clarkson et al., 2015) but exhibit an inherent resistance to change (Jost et al., 2003). In all studies, ideology was self-reported, using various measures (Knight, 1999; Jost, 2006).

In an initial study ($N = 204$), undergraduates completed fifty trials of a classic number string task. Participants were presented with a rule to confirm to in the first twenty-five trials (response inhibition task) and then that rule changed in the final twenty-five trials (updating task). We assessed response latency as our index of performance and included demographics (gender, age, ethnicity, education, income) as covariates. The findings revealed a significant ideology × trial interaction ($p = .008$); conservatives outperformed liberals on the fixed trials ($p = .01$), whereas liberals outperformed conservatives on the updating trials ($p = .02$). Thus, conservatives' fixation on the original decision rule, though initially beneficial, impeded their performance when the decision rule changed.

A follow-up study ($N = 194$) included a condition where the rule did not change to isolate the impact of the rule change on performance. The findings again revealed that conservatives outperformed liberals on the first twenty-five trials ($p = .002$). Yet on the second twenty-five trials, liberals outperformed conservatives when the rule changed ($p = .03$), whereas conservatives continued to outperform liberals when the rule remained fixed ($p = .01$). Importantly, along with standard demographics, we assessed intelligence, religiosity, and perceptions of task complexity as covariates. As a result, this effect appears isolated to the impact of political ideology on fixation with a decision rule.

In a third study ($N = 196$), we assessed the extent to which conservatives' performance stemmed from their struggle with the rule change. Participants completed a set of anagrams where they were randomly assigned to a condition where the decision rule (i.e., the number of letters required to solve the anagram) was either held fixed or varied. Participants saw three total anagrams and were allowed 30 seconds to generate responses for each anagram before indicating (in random order) their levels of motivation and frustration. The findings revealed a significant decision rule x ideology interaction ($p = .001$); conservatives generated more correct solutions than liberals in the fixed rule condition ($p = .01$), whereas liberals generated more correct solutions than conservatives in the variable rule condition ($p = .055$). Additionally, the frustration data revealed a significant pathway of moderated-mediation; conservatives' elevated levels of frustration impaired their performance when the decision rule was variable (indirect effect = -.13, 95% CI: -.25, -.04), but had no effect when the rule was fixed (indirect effect = -.04, 95% CI: -.04, .14). There was no effect on motivation (p's > .60).

Through the lens of political ideology, three studies demonstrate a downside to self-control success. Specifically, conservatives' ability to strictly adhere to a decision rule (i.e., inhibition) impaired their ability to modify that rule when necessary (i.e., updating). This struggle manifested in greater feelings of frustration which mediated conservatives' impaired performance. Moreover, these findings occurred across distinct samples and methodologies and were independent of alternative explanations related to motivation, intelligence, religiosity, task complexity, or demographics. Despite the clear functional and beneficial qualities of self-control, this research demonstrates that the processes which facilitate self-control success come at the expense of modifying habits to situational demands.

Building on these findings, this research provides novel insight for future research. Specifically, self-control is construed as an adaptive executive function critical to foundational regulatory processes (Vohs & Baumeister, 2016) that hold direct import for consumer behavior (Baumeister, 2002). Furthermore, these findings provide a framework by which to explore alternative cognitive costs elicited from the processes that promote self-control success. For instance, what happens when consumers try to break a bad habit? Should consumers seek out self-improvement regimens (e.g., dieting plans) that facilitate a match between their ideology and the amount of updating or inhibition required? Lastly, ideology research has predominantly differentiated conservatives and liberals on a motivational basis (see Jost et al., 2003), this work explores an alternative, cognitive-based perspective which offers novel predictions based on a unique means by which to differentiate conservatives and liberals.

REFERENCES

Baddeley, A. (1996). The fractionation of working memory. *Proceedings of the National Academy of Sciences*, Vol. 93 (24), 13468-13472.

Baumeister, R. F. (2002). Yielding to temptation: Self-control failure, impulsive purchasing, and consumer behavior. Journal of consumer Research, 28(4), 670-676.

Carey, Jasmine M., Delory L. Paulhus (2013), "Worldview implications for believing in free will and/or determinism: Politics, morality, and punitiveness," in *Journal of Personality,* 81 (2), 130-141

Clarkson, Joshua J., John R. Chambers, Edward R. Hirt, Ashely S. Otto, Frank R Kardes, and Christopher C. Leone (2015), "The self-control consequences of political ideology," in *Proceedings of the National Academy of Sciences*, Vol. 112 (27), 8250-253.

Diamond, Adele (2013), "Executive functions," in *Annual Review of Psychology*, Vol 64, ed. Susan Fiske, Palo Alto, CA: Annual Reviews, 135-68.

Duncker, Karl (1945), "On problem-solving," in *Psychological Monographs,* Vol. 58 (5), i-113.

Gutmann, Amy (2001). "Liberalism," in *International Encyclopedia of the Social and Behavioral Sciences*, Vol. 1, ed. Neil J. Smelser and Paul B. Baltes, New York, NY: Elsevier, 8784-787

Jost, J. T., Federico, C. M., & Napier, J. L. (2009). Political ideology: Its structure, functions, and elective affinities. *Annual Review of Psychology*, Vol. 60, ed. Susan Fiske, Palo Alto, CA: Annual Reviews, 307-337.

Jost, John T., Jack J. Glaser, Arie W. Kruglanski, and Frank J. Sulloway (2003), "Political conservatism as motivated social cognition," in *Psychological Bulletin*, 129 (3), 339-375.

Luchins. Abraham S., and Edith H. Luchins (1959), in *Rigidity of behavior: A variational approach to the effect of Einstellung,* ed. University of Oregon, Eugene, Oregon: University of Oregon Books, xxvi – 623.

Rigoni, Davide, Simone Kühn, Giuseppe Sartori, and Marcel Brass (2011), "Inducing disbelief in free will alters brain correlates of preconscious motor preparation: The brain minds whether we believe in free will or not," *Psychological Science, 22* (5), 613-18.

Smith, Steven M (1995), "Getting into and out of mental ruts: A theory of fixation, incubation, and insight," in *The Nature of Insight*, ed. Robert J. Sternberg & J. E. Davidson, Cambridge, MA: The MIT Press, 229-51

Vohs, Kathleen D., and Roy F. Baumeister (2016), "The Development of Executive Functions," in *Handbook of self-regulation: Research, theory, and applications,* Vol. 3, ed. Kathleen Vohs and Roy Baumeister: New York, NY, Guilford Publications, 419-433.

Wood, W., & Neal, D. T. (2009). The habitual consumer. *Journal of Consumer Psychology*, 19(4), 579-592.

Advertising Co-created New Products: An Exploration
of Consumer Responses and Success Contingencies

Fanny Cambier, NEOMA Business School, France
Ingrid Poncin, Université Catholique de Louvain, Belgium

EXTENDED ABSTRACT

Co-created new products are increasingly popular but their failure rate is sobering; traditional advertising techniques may be inadequate to stimulate adoption. This qualitative study reveals that consumers responses are contingent upon eight aspects differently combining with a "made-with-consumers" claim and pertain to perceived claim veracity, brand integrity and action meaningfulness.

Introduction

Globally, 78% of large companies (e.g. Lego, Volkswagen, and PepsiCo) have already used consumer empowerment strategies (CES) for new product development (Wang et al., 2019). Many of them have then advertised the resulting new products as "made-with-consumers". CES refer to a form of co-creation of new products and services, in which companies provide a platform to involve their consumers and collect their input (e.g. ideas or votes), then market most promising idea(s) into finished product(s) (Fuchs and Schreier, 2011) and may advertise them as such (Nishikawa et al., 2017). CES reflect a new paradigm, where the firm is no longer solely responsible for value creation (Ramaswamy and Ozcan, 2014).

However, the return on investment of these new products is not always satisfactory; their failure rate is sobering (Wang et al., 2019), despite the fact that "made-with-consumers" products usually better fit consumer needs (Poetz and Schreier, 2012). Marketing communication, another key lever for driving product adoption (Bruhn and Ahlers, 2017), might then be inadequate or suboptimal (Wang et al., 2019). Surprisingly, however, brand audiences' interpretations and judgements about CES advertising have not received much attention so far. Rooted in the innovation literature, previous research has mostly focused on the presence versus absence of "made-with-consumers" labels (Nishikawa et al., 2017). Knowledge gaps persist because advertising research has largely ignored this field of research; The examination of advertising characteristics (e.g., modalities, message information, source credibility) known to influence consumer advertising responses (Batra and Keller, 2016) remains underexplored.

This research therefore aims to further understand which aspects of CES advertising trigger brand audiences' interpretations and judgements and the nature of these interpretations and judgements.

Literature Review

A first line of innovation research shows that firms derive competitive advantage from CES because resulting products better meet consumer needs (Poetz and Schreier 2012). Other research focuses on the participants' overall experience of empowerment (Hoyer et al., 2010) and shed light on enhanced brand relationships after participation in CES (Füller et al., 2009; Bendapudi and Leone, 2003). A third, burgeoning, line of research focuses on the larger group of non-participating consumers (i.e. brand audiences, exposed to marketing communications with "made-with-consumers" claims). This research focuses on this group.

Previous research focused primarily on benefits (Gemser and Park, 2015) and consistently showed that demand for "made-with-consumers" products is higher than for traditionally designer-made products (e.g. Nishikawa et al., 2017). Current consumer distrust in advertising claims might suggest though that such claims could also be perceived as a marketing ploy (Acar and Puntoni, 2016) used to produce undue positive brand associations (Thompson and Malaviya, 2013). Brand audiences may also believe in the brand's interest -as a business entity aimed at making profits- to distort the empowerment message for greater persuasiveness. Uncertainty about firms' ulterior motives might then induce perceptions of information asymmetry that consumers will try to mitigate (Jeon and Menicucci, 2008). Signaling theory (Spence, 1973) foresees that, in case of information asymmetry, the less informed party will look for extrinsic clues from which they can infer quality heuristically (Kirmani and Rao, 2000). These cues -or signals- only work to the extent that consumers deem them both useful and credible (Boulding and Kirmani, 1993).

Previous research identified product-related moderating effects: complexity (Schreier et al., 2012; Meissner et al., 2017) and category (i.e. luxury fashion industry; Fuchs et al., 2013). Closer to an advertising perspective, Wang et al (2019) present the winning consumer's story to be an influential signal. It is the only study that offers concrete recommendations for designing a persuasive CES message; yet, due to its unique characteristics (e.g. brand and consumers as product designers simultaneously) effective CES advertising might differ from traditional advertising techniques.

Much is still to learn about other influential aspects and how these aspects interact with 'made-with-consumers' claims.

Method

An exploratory qualitative research was conducted to identify influential aspects and brand audiences' interpretations and judgments. Qualitative research allows delve deeper into how brand audiences read and judge advertisements (Belk, 2017). Specifically, twenty-eight individual interviews and three group interviews (five, six and nine informants) were conducted. Widely used in advertising and marketing research, group interviews actively compare informants' opinions and experiences and stimulate more natural group discussions (Belk, 2017). Individual interviews allow reveal realities that deepen consumers' experiences, to assess the subtle links between concepts of interest (Malhotra, 2010) and to overcome the group thinking, moderator biases and dominant individual discussions that are common in group interviews (Belk, 2017). Thus, each method used here attempted to compensate for the biases of the other.

Informants (non-participating consumers/brand audiences) were recruited out of friendship, kinship or acquaintance and have never participated in CES; they were all French-speaking adults, aged 19 to 68 (see Table 2), from different social backgrounds. Their field of study, profession and lifestyle varied, although the majority had a university degree. Interviews were conducted on campus or at the informants' homes, at their convenience and lasted. Each semi-structured interview lasted between 32 and 120 minutes and each group interview lasted two hours. A total of forty-eight informants contributed to the verbatim data collected.

Both authors conducted the interviews. The semi-structured guide used a funnel approach; questions initially focused on general themes but gradually became more specific. After the introductory part, three main sections followed: (1) exploration of informants' general knowledge and interpretations about CES, (2) examination

of spontaneous responses to "made-with-consumers" products and their advertising (informants were exposed to a variety of printed stimuli), (3) exploration of behavioral judgements and intentions towards the advertising brand. Projection techniques such as sentence completion and word association complemented the animation guide for group interviews, aiming to reveal unarticulated feelings, overcome social desirability and inhibition, and inject variation and pleasure into the interview process (Belk, 2017).

All interviews were audio- or video-recorded, transcribed in full and coded using NVivo 11 software using an inductive approach. First, emerging themes were identified from the data by noting instances and patterns (LeCompte and Schensul, 1999). Specifically, the first author and three research assistants independently identified all instances of responses, interpretations and judgments towards CES and created reflective coding. Each analyst provided the second author with the finalized coding sheets, who audited the emergent categories and coding and provided additional insights. While informant data served as the primary source for differentiating responses and judgements, the consumer empowerment literature was used in an iterative process to compare emerging areas of consumer judgements and triggers to previous research. Saturation was reached when the repetitive comparison of themes and relationships no longer produced new ideas. This iterative process allowed move from data to identification of emerging patterns and contributed to a more refined understanding (Belk, 2013).

Results

Characteristics of brand audience responses

In line with previous research (e.g. Fuchs and Schreier 2011), CES advertising generates interest and positive judgements; the openness of internal innovation processes to consumers evidences how valuable consumers can be for the empowering brand.

The data content analysis also revealed negative interpretations and judgments, thereby refining and complementing extant literature. Doubts about the actual control, influence and impact that consumers had throughout the CES process are commonly cited. The veracity of the "made-with-consumers" claim is often questioned, suggesting a need to strengthen it in marketing communication (i.e. improving perceived empowerment). The alignment between the brand's advertising claim and the actual actions of the brand throughout the process (i.e. brand integrity) is expected but also often questioned. Resulting are differential indirect impacts on declared behavioral intentions. These emerging findings underline the growing, but still under-explored, importance as influential persuasion variables of brand integrity and claim veracity perceptions (enhanced empowerment perceptions).

The data reveal that these interpretations and judgements depend on a series of aspects that brand audiences rely one to give evaluate the veracity of the "made-with-consumers" claim; they can or would like to find these aspects in the advertising copy. The combination and juxtaposition of these additional signals with the primary "made-with-consumers" claim are found to influence the perceived quality of the "made-with-consumer" claim and thus, advertising effectiveness.

Success contingencies to CES advertising

Eight aspects of CES advertising triggering brand audiences' interpretations and judgements emerge from the verbatim: brand size/importance, winner identification, brand reputation, empowerment signals, type of empowerment platform, monetary rewards, brand process transparency, and CES purpose. Liljedal (2016) framework of CES dimensions provides a relevant framework for identifying

and organizing signals from which to infer quality of 'made-with-consumers' claims. These dimensions concern "who" (the interacting parties, an empowering brand and participating consumers), "what" (an outcome in the form of a new product or service) and "how" (a series of actions or steps constituting the CES-based innovation process).

Only one aspect here pertains to what (CES purpose) while three aspects (brand size/importance, winner identification, brand reputation) reflect 'who'. Importantly, four aspects (empowerment signals, type of empowerment platform, monetary rewards and brand process transparency) relate to 'how', showing that interpretations and judgments are contingent upon the additional information found about the process. Given the short length of this paper, only these four aspects are described below; each of them appeared more than once in the verbatim. Table 1 encapsulates illustrative quotes for the eight aspects though.

Empowerment signals. The verbatim reflects that a visible CES follow-up (e.g. result communication) reinforces perceptions of actual consumer listening and consumer voice valuation. Doubts arise when informants do not see or believe in the implementation of the empowerment contract with consumers. Three forms of contract non-execution emerge: 1) failure to follow up/non-execution of consumer ideas, 2) execution of an idea other than the one chosen, for reasons of feasibility or brand positioning, 3) rule changes along the way. V. (female, 36) tells her disappointment about a local food cooperative that initially asked its consumers to vote for two local producers; The products of the two elected producers would then be added to the cooperative's available range (see Table 1).

Brand process transparency. Informants are willing to diagnose between "empowering" brands only interested in image improvement and brands that truly value their consumers' voices and impacts. Informants express their desire to know about CES rules and processual steps, for instance: why ideas get chosen, which criteria are in place, who may participate, whether participants receive feedback and what happens to ideas that are not selected. Brand process transparency has positive signaling effects on perceived empowerment and brand integrity (Authors, 2020)

Type of empowerment platforms. Permanent platforms "à-la-Lego" evoke more spontaneous, higher-quality ideas aimed at improving a company's offering (i.e. more effective listening and true consumer empowerment). "Made-with-consumers" claims related to temporary platforms evoke large marketing campaigns and sales tactics only aimed at recruiting new consumers.

Monetary rewards. Informants spontaneously picked the absence or presence of financial reward given to the winning consumer and differentially interpreted it. For CES without rewards, informants interpret participants' search for ideas as a sign of willingness to engage with the brand; conversely, informants negatively associate rewards with participants' financial motivation, overriding perceptions of value co-creation. CES with rewards are negatively associated with consumers who are not primarily interested in helping the brand but in financial rewards.

Discussion

Through a qualitative inquiry, this research aimed to further the understanding of brand audiences' interpretations and judgments toward CES advertising and the aspects triggering these interpretations and judgments. The sobering failure rate of new co-created products and the potential inadequacy of traditional advertising methods to encourage co-created product adoption motivated this research, especially given the current literature gaps.

The findings have implications for both research and practice. First, this research reveals that the relatively new use of a "made-with-consumers" claims may generate brand audiences' wariness and questioning. This result contrasts with previous experimental research (e.g. Schreier et al., 2012; Fuchs and Schreier, 2011) where "made-with-consumers" labels produced positive brand associations and increased demand. The results show that tensions and wariness can emerge between brands and consumers, particularly in the management of the process and the achieved outcomes. It was here observed in the interviews that informants -before forging judgments- consistently searched signals giving substance -"reasons-to-believe"- to empowerment claims and inducing brand integrity. However, while certain signals placed next to the "made-with-consumers" claims may reassure (e.g. brand process transparency), integrating other signals may diminish the persuasive effect of a "made-with-consumers" claim (e.g. "one-off" nature of the platform) and create wariness toward actual empowerment and brand integrity. This raises many questions, requiring deeper investigation, about the appropriate use of the CES as a signal in advertising.

Second, extant literature gives brand audiences a passive role in CES: no presence on the empowerment platforms, no impact on performances (Pine and Gilmore, 1998), and no role in decision-making (Le Nagard and Reniou, 2013). This research instead shows that brand audiences may have the ability to change the brand-participants dynamics; the knowledge of their interpretations and judgments and the nature of the aspects triggering these may inform on how to design CES as an innovation practice. CES specifications, platform informational content and brands behaviors and interactions throughout the CES-related innovation processes might then be conceived upstream in accordance with brand audience concerns downstream. From there might result more integrated innovation and advertising strategies, towards enhanced adoption of new products.

This research bridges innovation and advertising literatures and contributes to both. First, this research integrates CES as a form of advertising stimulus that triggers brand audience responses. The original and novel aspects herein identified inform advertising research about new credible signals able to increase perceived quality of a "made-with-consumers" claim.

In persuasion literature, a large majority of the investigated advertising effects stem from classical persuasion measures such as, recognition, recall, brand attitudes and ad liking (Dahlen and Rosengren, 2016). This research opens the importance of alternative persuasion mechanisms in advertising research (e.g. perceived brand integrity and claim veracity). Besides, the synthesis of brand audience responses to CES-related advertising as well as the factors triggering these responses converge towards an expressed need to give CES meaningfulness. These findings open up alternative paths from advertising to purchase, in line with Batra and Keller (2016).

While recognizing advertising as a key lever to encourage new product adoption (Wang et al., 2019), much CES research has largely ignored the variety of advertising characteristics that can modulate brand audience responses to CES advertising. As a result, knowledge is mostly limited to effects stemming from the presence or absence of a "made-with-consumers" claim. This research thus also contributes to consumer empowerment literature. First, it gives some insights to answer Nishikawa et al. (2017)'s call for research by drawing up a detailed inventory of contingencies surrounding the mere "made-with-consumers" claim effect. Besides, by highlighting negative brand audience interpretations and judgments towards CES advertising and the paradoxical tensions that emerge in the brand-consumer relationship, this study valuably complements previous research that is mostly focused on CES benefits (Gemser and Parks, 2015). It also opens up avenues of research on what can be done to reduce brand scepticism and resistance in this context.

However, the interview guides -although as non-directive as possible- may have elicited interpretations and judgments that would have been undetectable in a more spontaneous and observational context. Besides, all identified aspects may combine and juxtapose differently with the "made-with-consumers" claim and potentially with other situational factors (e.g., disruptive innovation vs. line extension). That is why the present research represents a starting point to a larger project. In fact, based on the aspects deduced from the qualitative inquiry, follow-up studies will be conducted to further assess the signaling values of these aspects, and the relationships between these signals and the mechanisms discussed in this paper will be examined.

REFERENCES

Acar OA and Puntoni S. (2016) Customer empowerment in the digital age. *Journal of Advertising Research* 56: 4-8.

Batra R and Keller KL. (2016) Integrating marketing communications: New findings, new lessons, and new ideas. *Journal of Marketing* 80: 122-145.

Belk RW. (2017) Qualitative research in advertising. *Journal of Advertising* 46: 36-47.

Belk RW. (2013) Qualitative versus quantitative research in marketing. *Revista de Negócios* 18: 5-9.

Bendapudi N and Leone RP. (2003) Psychological implications of customer participation in co-production. *Journal of Marketing* 67: 14-28.

Boulding W and Kirmani A (1993). A consumer-side experimental examination of signaling theory: do consumers perceive warranties as signals of quality?. *Journal of Consumer research*, *20*(1), 111-123.

Bruhn M and Ahlers GM (2017). Integrated Communication in the Innovation Process—An Approach to Integrated Innovation Communication. In Pfeffermann, Nicole and Gould Julie (Eds.) *Strategy and Communication for Innovation* (pp. 205-225). Springer, Cham.

Dahl DW, Fuchs C and Schreier M. (2014) Why and When Consumers Prefer Products of User-Driven Firms: A Social Identification Account. *Management Science* 61: 1978-1988.

Dahlen M and Rosengren S. (2016) If advertising won't die, what will it be? Toward a working definition of advertising. *Journal of Advertising* 45: 334-345.

Franke N and Schreier M. (2010) Why Customers Value Self-Designed Products: The Importance of Process Effort and Enjoyment. *Journal of Product Innovation Management* 27: 1020-1031.

Fuchs C, Prandelli E, Schreier M, et al. (2013) All That Is Users Might Not Be Gold: How Labeling Products as User Designed Backfires in the Context of Luxury Fashion Brands. *Journal of Marketing* 77: 75-91.

Fuchs C and Schreier M. (2011) Customer Empowerment in New Product Development. The *Journal of Product Innovation Management* 28: 17.

Füller J. (2010) Refining Virtual Co-Creation from a Consumer Perspective. *California Management Review* 52: 98-122.

Füller J, Mühlbacher H, Matzler K, et al. (2009) Consumer Empowerment Through Internet-Based Co-creation. *Journal of Management Information Systems* 26: 71-102.

Gemser G and Perks H (2015) Co-Creation with Customers: An Evolving Innovation Research Field. *Journal of Product Innovation Management* 32: 660-665.

Hoyer WD, Chandy R, Dorotic M, et al. (2010) Consumer Cocreation in New Product Development. *Journal of Service Research* 13: 283-296.

Jeon DS and Menicucci D (2008). Money, fame and the allocation of talent: Brain drain and the institution of science. *Journal of Economic Behavior & Organization*, *66*(3-4), 558-581.

Kirmani A and Rao AR (2000). No pain, no gain: A critical review of the literature on signaling unobservable product quality. *Journal of Marketing*, *64*(2), 66-79.

LeCompte MD and Schensul JJ. (1999) *Designing and Conducting Ethnographic Research,* Walnut Creek, CA, USA: AltaMira Press.

Le Nagard E and Reniou F. (2013) Co-innover avec les clients: entre intérêt et réticence pour les entreprises grand public, *Décisions Marketing*, May, 71, 5975.

Liljedal KT (2016) The effects of advertising consumer co-created new products: A brand-alliance framework model can predict perceptions about co-created brands and their creators. Journal of Advertising Research, 56(1), 53-63.

Malhotra NK. (2010) *Marketing research: An applied orientation*: Hoboken, NJ, USA:Pearson Education New Jersey.

Meissner M, Haurand MD and Stummer C. (2017) With a little help from my customers: the influence of customer empowerment on consumers' perceptions of well-established brands. *International Journal of Innovation Management* 21:1750048 (20 pages).

Nambisan S and Baron RA. (2009) Virtual customer environments: testing a model of voluntary participation in value co-creation activities. *Journal of Product Innovation Management* 26: 388-406.

Nishikawa H, Schreier M, Fuchs C, et al. (2017) The value of marketing crowdsourced new products as such: Evidence from two randomized field experiments. *Journal of Marketing Research*.

Nishikawa H, Schreier M and Ogawa S. (2013) User-generated versus designer-generated products: A performance assessment at Muji. *International Journal of Research in Marketing* 30: 160.

Pine BJ and Gilmore JH (1998). Welcome to the experience economy. *Harvard business review*, *76*, 97-105.

Poetz MK and Schreier M. (2012) The Value of Crowdsourcing: Can Users Really Compete with Professionals in Generating New Product Ideas? *Journal of Product Innovation Management* 29: 245-256.

Schreier M, Fuchs C and Dahl DW. (2012) The Innovation Effect of User Design: Exploring Consumers' Innovation Perceptions of Firms Selling Products Designed by Users. *Journal of Marketing* 76: 18-32.

Spence M. (1973) Job market signaling. *The Quarterly Journal of Economics* 87: 355-374.

Spreitzer GM. (1995) Psychological empowerment in the workplace: Dimensions,

Thompson DV and Malaviya P. (2013) Consumer-Generated Ads: Does Awareness of Advertising Co-Creation Help or Hurt Persuasion? *Journal of Marketing* 77: 33-47.

Venable BT, Rose GM, Bush VD and Gilbert FW (2005). The role of brand personality in charitable giving: An assessment and validation. *Journal of the academy of marketing science*, *33*(3), 295-312.

Verleye K. (2015) The co-creation experience from the customer perspective: its measurement and determinants. *Journal of Service Management* 26: 321-342.

Von Hippel, E. (2005). Democratizing innovation: The evolving phenomenon of user innovation. *Journal für Betriebswirtschaft*, *55*(1), 63-78.

Wang HS, Noble CH, Dahl DW, et al. (2019) Successfully Communicating a Cocreated Innovation. *Journal of Marketing* 83: 38–57.

Doing the Dirty Work For The Sharing Economy: Building Trust With Consumers In Emerging Markets

Mario Campana, Goldsmiths, University of London, UK
Adèle Gruen, Goldsmiths, University of London, UK
Luciana Velloso, Goldsmiths, University of London, UK

EXTENDED ABSTRACT

The sharing economy is disrupting industries, redefining jobs, and creating new consumption practices (Belk 2010, 2014; Schor 2016), confronting service providers with many trust-related challenges (Eckhardt et al. 2019). In emerging markets, these challenges are aggravated by the nascent digital economies and the lack of established institutions, which increase consumers' uncertainty and risk perceptions (Al-Khouri 2012; Chen and Wang 2019; Baz Radwan et al. 2019). Hence, building trust takes on paramount importance for service providers in emerging markets.

The process of developing trust with consumers in these challenging environments remains largely underexplored within the sharing-economy literature (Chen and Wang 2019; Baz Radwan et al. 2019; Ter Huurne et al. 2017). We redress this gap by employing an institutional theory perspective to investigate: *What types of work do sharing-economy service providers undertake to build trust with their consumers in emerging markets?* We conducted qualitative research in Chile, which has one of the lowest trust levels worldwide (OECD 2016). The digital infrastructure is still developing (OECD 2018) despite governmental attempts to boost the digital agenda.

We focused on the carsharing company Awto. Founded in 2016, Awto is currently the largest carsharing company in Chile and the second largest in Latin America. We conducted 20 in-depth interviews with 15 Awto costumers and five nonusers who had experienced other shared-mobility services in Santiago (e.g., Uber), complemented by archival data. We performed an inductive qualitative thematic analysis (Spiggle 1994), where three types of work emerged: *humanizing*, *localizing*, and *risk bearing*.

Humanizing gives the marketplace interactions a human appeal. Friendliness and the ability to talk face-to-face with staff are crucial to fostering trust in emerging markets. The close ties that consumers develop with employees (to the point of using nicknames) go beyond simple transactional bonds, which are usually associated with the sharing economy (Bardhi and Eckhardt 2012, 2017; Ravenelle 2020). As Diana exemplifies: "I trust [Awto] 100%. The difference from the rest is that Awto has a person behind it. In Latin-American cultures, we need a face behind businesses." This need to experience human connections in order to trust the service is a unique characteristic of low-trust contexts. Humanizing the carsharing system is furthered by the development of bonds with nonhuman actors (i.e., cars) through anthropomorphism. Using Chilean names (e.g., Valentina) enables consumers to imbue the cars with human characteristics (Hoffman and Novak 2018), as Adela recalls: "the other day, I went with Arturo to see my mother, and it was so cute! I even said 'hi' to it." Anthropomorphism improves consumers' experience with the service (Hoffman and Novak 2018) and enables customers to develop familiarity and emotional bonds with the cars.

Localizing means establishing deep roots in the geographical and sociocultural context. This involves being physically present in consumers' surroundings through their open headquarters and street visibility. Jeronimo explains that a solid digital presence was not enough to convince him that Awto was trustworthy: "Awto doesn't make me scared because an internet search took me to a safe website, and after I *obviously* stopped by their office to check" (emphasis added). Having a local, visible, and accessible presence seems

fundamental. Furthermore, Awto strategically emphasizes its local roots, forging a sense of closeness with its consumers. Informants compared Awto with foreign platforms, expressing trust in Awto for being a Chilean enterprise. Awto works to solve local issues associated with the city's transportation system by reducing congestion and facilitating parking ('Move smart' is their tagline). As carsharing gets implemented, it acquires representations of a smart, urban service that helps consumers overcome local challenges.

Risk bearing consists of carefully designing operations to absorb a significant amount of the risk consumers in emerging markets associate with the sharing economy. Awto shifts the burden of ownership (Schaefers et al. 2016; Lawson et al. 2016) and the stress of dealing with service failures from consumers to them. Awto opted for owning a vehicle fleet rather than incentivizing consumers to rent out their own cars, and operates a station-based carsharing model to help users deal with the safety and space challenges in Santiago. Our interviewees reveal that these risk-bearing choices entice them to make a leap of faith (Brownlie and Howson 2005) towards carsharing: "I don't worry about anything. I mean, there's always a risk, but the insurance is under [Awto's] name, that is, they take care of everything. They bear the risks" (Victor). Awto also responsibilizes consumers by implementing punishments (e.g., for insufficient cleaning or smoking) and rewards (e.g., free half hour if the car is cleaned). The main difference between developed and emerging markets lies in the extent to which this can be implemented. Beyond a certain point, Awto must take a leap of faith and give users the benefit of the doubt: "I noticed there was a dent I hadn't reported. If they say something, I will say that it wasn't me and they'll have to believe me" (Carmen). Carmen expects Awto to take her word. By taking a leap of faith, Awto encourages customers to reciprocate the trust demonstrated by the company.

We contribute to the literature on trust within the sharing economy by showing that companies in emerging markets should work to make the service visible to consumers and offer solutions to local needs. We argue that these services should bear the risks associated with sharing to encourage users to trust the organization. Our findings go against the trend of overdigitalizing customer relationships (Möhlmann et al. 2019). Consumers' desire to engage with Awto at a human level (not just through a faceless platform) provides nuance to previous research (Bardhi and Eckhardt 2012; Gruen 2017).

We also extend the knowledge on how service providers initiate and implement market change (Baker et al. 2019; Wieland et al. 2016). Awto's trust-building work changes consumers' risk perceptions and negative impressions of sharing-economy services, which allows carsharing to be seen as capable of solving local structural problems. Awto is, therefore, performing the "dirty work," that is, the unpleasant, difficult work of changing taken-for-granted belief systems about mobility. They act as market-makers (Chen and Wang 2019; Humphreys 2010) by fashioning a space for carsharing that did not exist before.

REFERENCES

Al-Khouri, Ali M. (2012), "Emerging Markets and Digital Economy: Building Trust in the Virtual World," *International Journal of Innovation in the Digital Economy*, *3*(2), 57-69.

Baker, Jonathan J., Storbacka, Kai and Roderick Brodie (2019), "Markets Changing, Changing Markets: Institutional Work as Market Shaping". *Marketing Theory, 19*(3), 301–28.

Bardhi, Fleura and Giana M. Eckhardt (2012), "Access-Based Consumption: The Case of Carsharing," *Journal of Consumer Research*, *39*(4), 881-98.

Bardhi, Fleura and Giana M. Eckhardt (2017), "Liquid consumption," *Journal of Consumer Research*, 44(3), 582-97.

Baz Radwan, Maha, Georgios Patsiaouras, and Mike Saren (2019), "To own or to access? An exploration of sharing and access practices by Arab millennials," in *Handbook of the sharing economy,* Eds Russell Belk, Giana M. Eckhardt and Fleura Bardhi, Cheltenham: Edward Elgar Publishing, 62–74.

Belk, Russell (2010), "Sharing," *Journal of Consumer Research*, *36*(5), 715-34.

Belk, Russell (2014), "You are What you Can Access: Sharing and Collaborative Consumption Online. *Journal of Business Research*, *67*(8), 1595-600.

Benoit, Sabine, Thomas L. Baker, Ruth N. Bolton, Thorsten Gruber, and Jay Kandampully (2017), "A Triadic Framework for Collaborative Consumption (CC): Motives, Activities and Resources & Capabilities of Actors," *Journal of Business Research*, 79, 219-27.

Brownlie, Julie and Alexandra Howson (2005), "'Leaps of Faith' and MMR: An Empirical Study of Trust. *Sociology, 39*(2), 221-39.

Chen, Yubo and Liantao Wang (2019), "Commentary: Marketing and the Sharing Economy: Digital Economy and Emerging Market Challenges," *Journal of Marketing*, *83*(5), 28-31.

Coleman, James S (1988), "Social Capital in the Creation of Human Capital," *American Journal of Sociology*, *94*, S95-S120.

Eckhardt, Giana. M., Mark B. Houston, Baojun Jiang, Cait Lamberton, Aric Rindfleisch, and Georgios Zervas (2019), "Marketing in the Sharing Economy," *Journal of Marketing*, *83*(5), 5-27.

Granovetter, Mark (1985), "Economic Action and Social Structure: The Problem of Embeddedness," *American Journal of Sociology*, *91*(3), 481-510.

Gruen, Adele (2017), "Design and the Creation of Meaningful Consumption Practices in Access-Based Consumption," *Journal of Marketing Management*, *33*(3-4), 226-43.

Hazée, Simon, Cecile Delcourt, and Yves Van Vaerenbergh (2017), "Burdens of Access: Understanding Customer Barriers and Barrier-Attenuating Practices in Access-Based Services," *Journal of Service Research*, *20*(4), 441-56.

Hoffman, Donna L. and Tom P. Novak (2018), "Consumer and Object Experience in the Internet of Things: An Assemblage Theory Approach," *Journal of Consumer Research*, *44*(6), 1178–204.

Humphreys, Ashlee (2010), "Semiotic Structure and the Legitimation of Consumption Practices: The Case of Casino Gambling," *Journal of Consumer Research*, *37*(3), 490–510.

Lawson, Stephanie J., Mark R. Gleim, Rebecca Perren, and Jiyoung Hwang (2016), "Freedom from Ownership: An Exploration of Access-Based Consumption," *Journal of Business Research*, *69*(8), 2615-23.

Möhlmann, Mareike (2015), "Collaborative Consumption: Determinants of Datisfaction and the Likelihood of Using a Sharing Economy Option Again," *Journal of Consumer Behaviour*, *14*(3), 193-207.

Möhlmann, Mareike, Timm Teubner and Antje Graul (2019), "Leveraging Trust on Sharing Economy Platforms: Reputation Systems, Blockchain Technology and Cryptocurrencies," in *Handbook of the sharing economy,* Eds Russell Belk, Giana M. Eckhardt and Fleura Bardhi, Cheltenham: Edward Elgar Publishing, 290–302.

OECD (2016). 'Trust', in *Society at a glance 2016: OECD social indicators*. Paris: OECD Publishing.

OECD (2018). *OECD Economic Survey: Chile 2018*. Retrieved at http://www.oecd.org/economy/chile-economic-snapshot/

Puentes, Ana (2020), "¿El Carro Particular Ahora Es Obsoleto? La Tendencia Dice Que Sí [Is Owning A Car Now Obsolete? The Trend Says Yes]. *El Tiempo*. Retrieved from http://www.eltiempo.com

Ravenelle, Alexandra J. (2020), "Digitalization and the Hybridization of Markets and Circuits in Airbnb. *Consumption Markets & Culture*, 23(2), 154-73,

Schaefers, Tobias, Stephanie Lawson, and Monika Kukar-Kinney (2016), "How the Burdens of Ownership Promote Consumer Usage of Access-Based Services. *Marketing Letters*, *27*(3), 569-577.

Schor, Juliet (2016), "Debating the sharing economy," *Journal of Self-Governance and Management Economics*, *4*(3), 7-22.

Spiggle, Susan (1994), "Analysis and Interpretation of Qualitative Data in Consumer Research," *Journal of Consumer Research*, *21*(3), 491-503.

Sutherland, Will and Mohammad Hossein Jarrahi (2018), "The Sharing Economy and Digital Platforms: A Review and Research Agenda," *International Journal of Information Management*, *43*, 328-341.

Ter Huurne, Marteen, Amber Ronteltap, Rense Corten, and Vincent Buskens (2017), "Antecedents of Trust in the Sharing Economy: A Systematic Review," *Journal of Consumer Behaviour, 16*(6), 485-498.

Wieland, Heiko, Kaisa Koskela-Huotari, and Stephen L. Vargo (2016), "Extending Actor Participation in Value Creation: An Institutional View," *Journal of Strategic Marketing*, 24(3-4), 210-226.

Core Stigma and the Consumption of RuPaul's Drag Race

Mario Campana, Goldsmiths, University of London, UK
Katherine Duffy, University of Glasgow, UK
Maria Rita Micheli, IESEG School of Management, France

EXTENDED ABSTRACT

This paper assesses the consumption of RuPaul's Drag Race as a stigmatized serial brand (Parmentier and Fischer 2015) building success on the active spectacularization of its core stigma. In CCT research, stigma has mostly been studied as something consumers need to conceal or manage (Goffman 1962/2009), exploring how consumption practices and objects can be destigmatized (e.g. Sandikci and Ger 2010), leading to the legitimization of markets and brand image (Giesler 2012, Humphreys 2010). However, research has stopped short of exploring how stigmatized brands can find space in the mainstream marketplace by actively promoting and performing their stigma, instead of concealing it.

Drag queens, the protagonists of RuPaul's Drag Race, have always suffered from a "double stigma" (Berkowitz et al. 2007) from both LGBTQ+ and non-LGBTQ+ audiences. The generalized stigma derives from the fact that drag queens are men who "publicly perform being women in front of an audience that knows they are 'men,' regardless of how compellingly female they might otherwise appear" (Schacht and Underwood 2004, 4). This transgressive behavior destabilizes the performance of gender and sexuality, crossing the boundaries of the social constructions of masculinity, femininity, homosexuality, and heterosexuality (Berkowitz and Liska Belgrave 2010; Taylor and Rupp 2004). Research has emphasized these elements as emblematic of the stigma from the heterosexual community against the LGBTQ+ community (Tewksbury 1994); in turn, these elements also lead the LGBTQ+ community to isolate drag queens, marginalizing them as outcasts (Berkowitz et al. 2007).

In exploring Drag Race as a stigmatized serial brand (Parmentier and Fischer 2015) we explore how it has managed to build success through an active performance of core stigma (Hudson 2008), with performances during the show and the use of a specific language. Our research revolves around questioning: *How can brands succeed by performing their stigma? How do different audiences, such as media and consumers, contribute to the performance of the stigma?*

We conducted a qualitative and an automated text analysis (Humphreys and Wang 2018; Caliandro and Gandini 2017) on data from several online sources: 3,605 statuses (since 2009) from the Facebook page of Drag Race, 5,644 articles from newspapers and magazines worldwide, and around 1,000,000 tweets between 2014 and 2019 following the hashtag #DragRace. We specifically searched for stigma associated with different transgressions related to gender and sexuality, reflecting the stigma of drag queens (Berkowitz et al. 2007).

We find that the brand did not conceal stigmatized elements in its discourses, in turn, it spectacularized them through different channels (e.g. Facebook, Twitter). We define spectacularization as a way of representing transgressions and deviant behaviors of the brand, or individuals associated with it, in the form of a spectacle. With the qualitative analysis, we identify three main spectacularized transgressions. Firstly, a transgression of gender norms whereby the multifaceted nature of drag gender appears across a spectrum (*glamor*):

Drag loses its sense of danger and its sense of irony once it's not men doing it, because at its core it's a social statement and a big F-you to male-dominated culture. So, for men to do it, it's really punk rock, because it's a real rejection of masculinity. The Guardian (March 3, 2018)

Although the article above highlights the tensions of discussing gender in Drag Race, it describes the transgression of gender norms as a key spectacularized topic. This can vary from looking very feminine (defined as *fishy* in the show), to looking androgynous, or showing more masculine traits (e.g. *butch queens*), to looking very queer or gender non-conforming, to looking like a glamor diva.

Secondly, in the show, we find a transgression of societal mores through using comedy and crassness in subverting accepted social codes and conventions (*comedy*). The same discourses are also in the media, as Vulture (*February 10th, 2017*) exemplifies:

Comic sensibility has become enshrined in RuPaul's Drag Race [...] That disregard for social conventions, though, has also been what has gotten RuPaul into trouble. [...] Some online trans activists took umbrage at the regular joke on RuPaul's Drag Race, "Ooh girl. You've got she-mail!" when the contestants would get a pun-filled video message from RuPaul about the day's challenge. [...] Eventually the joke was taken out and replaced.

Thirdly, we identify a transgression in which the creation of a parallel social world facilitates social categories to be transgressed (*realness*). Drag Race is inspired by *Paris is Burning* and underground ballroom culture. In the Nineties, balls were underground gatherings of LGBTQ+ individuals, mostly belonging to ethnic minorities, competing in 'walking' categories. One of the judging criteria was the "realness", in reference to the appropriateness of the look to the category, and the credibility. The Drag Race brand spectacularizes the 'realness' transgression, as Wired (2018) shows:

Yet, for many, that slang— 'work,' 'gagging,' 'eleganza,' 'hunty'—has been stripped of valuable context. Borrowing and stealing language, especially from communities of color, has been going on for a long time [...] And the vernacular of drag culture has been absorbed so quickly that few even know where the terms originated.

Overall, through spectacularization, discourses and meanings belonging to an underground stigmatized culture has become absorbed into mainstream culture.

We used these three transgressions as the basis for the automated analysis. We created three dictionaries associating words to each of the transgressions. For example, we associated the words 'work', 'gagging' or 'eleganza' to the 'realness' dictionary/transgression. We then mechanically searched the three transgressions in the tweets and in the articles. As table 1 shows, the brand, the consumers and media actively use these transgressions in their discourses. We also observe a similar longitudinal trend of the transgressions, seeing their use increasing after 2016[1]. As the show reaches mainstream audiences, the transgressions related to stigma evolve into mass culture. Overall, different audiences (i.e. consumers on Twitter, and media) become part of this spectacularization, contributing to reinforce the presence of stigma within discourses.

We contribute to research on how stigmatized brands can thrive within the mainstream marketplace (e.g. Scaraboto and Fischer 2013) and to research on multidimensionality and instability of stigma (e.g. Hudson 2008). We extend this research by exploring how brands can spectacularize stigma through an active showcasing of transgressions of societal norms, without trying to conceal or reduce stigmatized elements. We also show how audiences differ in the per-

---

1   In September 2016 the show moves from a niche TV channel, Logo TV, aimed at LGBTQ+ consumers and audiences, to a mainstream channel, VH1.

ception of stigma and in the way they react to stigma spectacularization. Overall, we present spectacularization as a way to normalize stigma by entering everyday discourses of different audiences, familiarizing with stigma and reducing brand distance.

REFERENCES

Austin, J.L. (1962), *How to Do Things with Words*, Oxford: Oxford University Press

Bailey, Marlon M. (2011), "Gender/Racial Realness: Theorizing the Gender System in Ballroom Culture," *Feminist Studies*, 37(2), 365-86.

Berkowitz, Dana, Linda Belgrave and Robert A. Halberstein (2007), "The Inter-Action of Drag Queens and Gay Men in Public and Private Spaces," *Journal of Homosexuality*, 52 (3-4), 11–32.

Berkowitz, Dana and Linda Liska Belgrave (2010), "She Works Hard for the Money": Drag Queens and the Management of Their Contradictory Status of Celebrity and Marginality," *Journal of Contemporary Ethnography*, 39 (2), 159–86.

Caliandro, Alessandro and Alessandro Gandini (2017.) *Qualitative Research in Digital Environments: A Research Toolkit*, London: Routledge.

Giesler, Markus (2012), "How Doppelgänger Brand Images Influence the Market Creation Process: Longitudinal Insights from The Rise of Botox Cosmetic," *Journal of Marketing*, 76(6), 55-68.

Goffman, Erving (1962/2009), *Stigma. Notes on the Management of Spoiled Identity,* New York, NY: Simon & Schuster, Inc.

Gond, Jean-Pascal, Laure Cabantous, Nancy Harding and Mark Learmonth (2016), "What Do We Mean by Performativity in Organizational and Management Theory? The Uses and Abuses of Performativity," *International Journal of Management Reviews*, 18, 440–63.

Hardy, Cynthia, Ian Palmer and Nelson Phillips (2000). "Discourse as a Strategic Resource". *Human Relations*, 53 (9), 1227–48.

Hudson, Bryant A. (2008), "Against all Odds: A Consideration of Core-Stigmatized Organizations," *Academy of Management Review*, 33(1), 252–66.

Hudson, Bryant A. and Gerardo A. Okhuysen (2009) "Not with a Ten-Foot Pole: Core Stigma, Stigma Transfer, and Improbable Persistence of Men's Bathhouses," *Organization Science*, 20(1), 134–53.

Humphreys, Ashlee (2010), "Semiotic Structure and the Legitimation of Consumption Practices: The Case of Casino Gambling," *Journal of Consumer Research*, *37*(3), 490–510.

Humphreys, Ashlee and Rebecca J. H. Wang (2018), "Automated Text Analysis for Consumer Research," *Journal of Consumer Research*, 44(6), 1274–306.

Parmentier, Marie-Agnes and Eileen Fischer (2015), "Things Fall Apart: The Dynamics of Brand Audience Dissipation," *Journal of Consumer Research*, 41(5), 1228–51.

Sandikci, Özlem and Guliz Ger (2010), "Veiling in Style: How Does a Stigmatized Practice Become Fashionable?," *Journal of Consumer Research*, 37(1), 15–36.

Scaraboto, Daiane and Eileen Fischer (2013), "Frustrated Fatshionistas: An Institutional Theory Perspective on Consumer Quests for Greater Choice in Mainstream Markets," *Journal of Consumer Research*, 39(6), 1234–57.

Schacht, Steven P., and Lisa Underwood (2004), "The Absolutely Fabulous but Flawlessly Customary World of Female Impersonators," *Journal of Homosexuality*, 46(3-4), 1-17.

Taylor, Verta and Leila J. Rupp (2004), "Chicks with Dicks, Men in Dresses," *Journal of Homosexuality*, 46 (3-4), 113–33.

Tewksbury, Richard (1994), "Gender Construction and the Female Impersonator: The Process of Transforming "He" to "She"," *Deviant Behavior*, 15 (1), 27–43.

Thompson, Craig J. (1997), "Interpreting Consumers: A Hermeneutical Framework for Deriving Marketing Insights From the Texts of Consumers' Consumption Stories,"*Journal of Marketing Research*, 34(4), 438-55.

When and Why Physical Strength Increases or Decreases Persuadability

Margaret C. Campbell, University of Colorado, USA
Irene Consiglio, Nova School of Business and Economics, Portugal
Stijn M. J. van Osselaer, Cornell University, USA

EXTENDED ABSTRACT

The majority of people predicts that it is easier to persuade a weaker (vs. stronger) person (pilot study 1). However, we propose the opposite. Our predictions rest on the notion that humans have a threat detection system, scanning the environment for potential threats (Holbrook, Sousa, and Hahn-Holbrook 2011). Weaker (vs. stronger) individuals are more vigilant towards threats, because an underestimation of danger puts them at a greater risk of injury (Fessler, Holbrook and Gervais 2014). This threat detection system may involve also the detection of persuasion. Indeed, persuasion is conceived as a threat (e.g., to the self, or freedom of choice; Brehm and Brehm 1981), and in order to defend themselves, individuals are vigilant against persuasive intent (Campbell 1995; Campbell and Kirmani 2000). We propose that weaker (vs. stronger) individuals' sensitivity to threats makes them relatively more (vs. less) vigilant against and resistant to persuasion.

Five studies tested these predictions. In study 1A (N = 100, M_{age} = 35.10, SD = 10.28; 41% males; MTurk), respondents imagined an interaction with a salesclerk and answered four vigilance items (e.g., "The salesclerk is likely to have an ulterior motive for helping me" (1 = *Strongly disagree*, 7 = *Strongly agree*). In an allegedly unrelated task, respondents rated their physical strength (1 = *I have absolutely no strength*, 7 = *I have exceptional strength*; Rahamni-Nia et al. 2011). As strength increased, vigilance decreased (r = -0.29; p = .01). This analysis excluded 15 participants who failed two preregistered attention checks. The effect is stronger including all participants.

In study 1B (N = 120; M_{age} = 37.53; 43.3% male; MTurk), we manipulated strength: participants in the weakness [strength] condition read that the best [worst] performers in their age group could do more than 47 [barely 3] push-ups in 1 minute; next, they completed a vigilance measure as in study 1A. Participants felt stronger in the strength (vs. weakness) condition (M = 4.61, SD = 1.71 vs. M = 2.45, SD = 1.53; t(97) = 6.98, p < .001). Participants in the strength (vs. weakness) condition were less vigilant (M = 3.83, SD = 1.14 vs. M = 4.24, SD = 0.92; t(97) = -2.06; p = .04). This analysis excluded 21 participants who failed two preregistered attention checks. Analysis of all the respondents showed the same pattern, but the effect of strength was not significant (p = .11).

In study 2, participants (N = 145; M_{age} = 36.37; 53.8% male; MTurk) wrote about a situation in which they felt physically weak, or strong, or a typical day. Next, they watched an infomercial and reported their purchase intentions (3 items; e.g., "If I needed/wanted a TV… I would be likely to buy the Panasonic AS640;" 1 = *Strongly disagree*, 7 = *Strongly agree*) and brand attitudes (6 items; e.g., "The Panasonic AS640 is…" 1 = *Unappealing*, 7 = *Appealing*; adapted from Meyers-Levy and Peracchio 1995). Participants who recalled being strong expressed higher purchase intentions (M = 5.73, SD = 0.86) than participants who recalled being weak (M = 4.98, SD = 1.63, p < .01), or a typical day (M = 5.02, SD = 1.45; p = .01; F = 4.65, p = 0.01). The control and weakness condition did not differ (p > .88). The analysis of brand attitudes revealed a similar pattern.

In study 3, respondents (N = 200; M_{age} = 33.84; 61% male; MTurk) completed a strength measure (see study 1A). Next, they saw five wine pairs and indicated their preference for one wine in each pair after reading an alleged expert's advice (knowing that a random winner would receive a chosen wine). Finally, they indicated if they perceived the expert as manipulative (our vigilance measure; 1 = *Extremely sincere/manipulative*, 7 = *Not sincere/manipulative at all*; Campbell & Kirmani 2000). Strength had a positive effect on the number of times participants chose a recommended wine (B = 0.21, t(147) = 2.36, p = .02; R^2 = 0.04, F(1, 147) = 5.56, p = .02). Moreover, as strength increased, vigilance decreased (B = -0.13, t(146) = -1.67, p = .10; R^2 = 0.02, F(1,146) = 2.78, p = .10), and this, in turn, increased advice taking (LLCI > 0, ULCI = 0.12; 90% bootstrap confidence interval). These results exclude participants who opted out of the lottery. Including all participants reinforces the mediation pattern (LLCI > 0, ULCI = 0.11; 95% bootstrap confidence interval).

In study 4, we tested the role of persuasion salience. Participants (N = 304; M_{age} = 37.11; 51.3% male; MTurk) completed a manipulation of strength (see study 1B) and read either a commercial written by an advertising agency (*high salience*), or a review written by an independent agency (*low salience*). Finally, participants filled in their purchase intentions (see study 2). Participants in the strength (vs. weakness) condition felt stronger (M = 4.98, SD = 1.43; vs. M = 2.66, SD = 1.24; t(302) = 15.08, p < .001). Stronger participants indicated higher purchase intentions when persuasion was less (M = 4.89, SD = 1.15) versus more salient (M = 3.87, SD = 1.20; F(1, 221) = 17.00, p < .001). Salience did not affect weaker participants (F(1, 221) = 1.33, p = .25; interaction: F(1, 221) = 5.00, p = .03). These results exclude participants who failed a preregistered attention check. Including them makes the interaction not significant (p = .32). These results suggest that stronger individuals are less persuadable when persuasion is blatant: when stronger people detect persuasion, they react negatively to it; instead, weaker people might be generally more vigilant.

This research has important implications. If weaker people resist persuasion, it might be problematic—imagine failing to convince frail elderly parents to take their medication. More broadly, patients often get medical advice while in a state of physical weakness. Moreover, strong individuals are malleable with mild persuasion tactics, but may be resistant to overt persuasion attempts. Thus, this research may aid consumer protection as it speaks to which fraudulent schemes different consumer groups are likely to succumb.

REFERENCES

Brehm, J. W., and S. S. Brehm (1981). Psychological reactance: A theory of freedom and control. San Diego, CA: Academic Press.

Campbell, M. C. (1995). When Attention-Getting Advertising Tactics Elicit Consumer Inferences of Manipulative Intent: The Importance of Balancing Benefits and Investments. Journal of Consumer Psychology, 4 (3), 225–254.

Campbell, M. C., and Kirmani, A. (2000). Consumers' use of Persuasion Knowledge: The effects of accessibility and cognitive capacity on perceptions of an influence agent. Journal of Consumer Research, 27 (1), 69-83.

Fessler, D. M. T., Holbrook C., and Gervais, M. M. (2014). Men's physical strength moderates conceptualizations of prospective foes in two disparate human societies. Human Nature, 25, 393-409.

Holbrook, C., Sousa P., and Hahn-Holbrook, J. (2011). Unconscious vigilance: Worldview defense without adaptations for terror, coalition, or uncertainty management. Journal of Personality and Social Psychology, 101 (3), 451-66.

Meyers-Levy, J. and L. A. Peracchio (1995). Understanding the effects of color: How the correspondence between available and required resources affects attitudes. Journal of Consumer Research, 1995, 22 (2), 121-38.

Rahamni-Nia, F., Damitchi, A., Azizi, M. and Hoseini, R. (2011). Associations between self-perceived and measured physical fitness of male college students. World Applied Sciences Journal, 14 (9), 1331-38.

The Effect of AI on Selective Belief Updating

Cindy Candrian, University of Zurich, Switzerland
Anne Scherer, University of Zurich, Switzerland
René Algesheimer, University of Zurich, Switzerland

EXTENDED ABSTRACT

The optimism bias leads people to update beliefs more when receiving good versus bad news. This phenomenon is one of the most consistent, prevalent, and robust biases documented in research (Sharot 2011, 2012) and has been considered as one of the core causes of the financial downfall of 2008 (Shefrin 2010). While research on the optimism bias is extensive, the nature of the messenger has been neglected. Understanding if and how an optimism bias arises when users' prior beliefs are challenged by an artificial agent rather than a human is crucial, as the collaboration between humans and machines is increasingly becoming an everyday reality (Zamalloa et al. 2017). The present research hence aims to examine 1) if and 2) how AI agents affect peoples' belief updating tendencies.

Even when presented with accurate information, people fail to update their prior beliefs in light of undesirable information. Instead, when people are confronted with information that contradicts their beliefs, they respond with psychological reactance, which often surfaces in a negative attitude toward the message, a lower intention to comply, or a disregard for the advisor (Cohen 1962).

Psychological reactant behavior generally occurs when people experience a threat to their autonomy. This is the case, when people receive messages that are inconsistent with their goals and beliefs (Roseman 1996). It follows that undesirable information from an advisor should generally increase the level of perceived threat, which – in our case – surfaces in a resistance to incorporate new information into existing beliefs. Psychological reactance to a persuasive message also tends to be higher, the more social agency is attributed to the message source (i.e. the higher the degree to which an agent is perceived as a social entity) (Roubroeks, Ham, and Midden 2011). Taken together, we propose that learning rates will be higher for desirable advice rather than undesirable advice, but that this bias will be stronger, when the source of advice is a human rather than AI.

All studies in the present research used a well-established investment game to examine biases in belief updating.

Study 1 aims to establish the effect of human vs. AI advice on valence dependent belief updating. Participants were randomly assigned to one of four experimental conditions in a 2 x 2 full-factorial design, with nature of the message source (human/AI) and desirability of advice (desirable/undesirable) treated as between-subject factors. Our results confirm a valence dependent belief updating asymmetry ($F(1, 503) = 7.51$, $p = .006$). Learning rates for advice provided by a human were significantly lower when the information was undesirable ($M = 0.66$, $SD = 0.45$) rather than desirable ($M = 0.86$, $SD = 0.64$), $d = 0.19$. If the advisor was AI, the learning rates did not significantly differ between the undesirable and desirable advice condition ($M = 0.83$, $SD = 0.52$), $d = 0.07$.

Study 2 aims to examine if varying levels of psychological reactance to the advice and the advisor can explain how differences in the belief updating asymmetry between human and AI advisors arise. Study 2 parallels study 1 but included measures of perceived threat and social agency. Moderated mediation analysis following Preacher, Rucker and Hayes (2007) showed that positive (negative) information significantly reduces (increases) perceived threat to autonomy ($\beta = -.198$, $t(482) = -2.83$, $p = .004$) and the interaction of threat to autonomy and nature of the message source has a significant interaction effect on learning ($\beta = -0.07$, $t(482) = -2.90$, $p > .05$).

Study 3 examines liking, a well-known force towards compliance as it can decrease resistance to undesirable advice (Silvia 2005). Confirming the results of study 1 and 2, we find a valence dependent belief updating asymmetry an interaction of the information valence and the message source on learning. Moreover, results indicated a stronger change in liking in human interactions.

In study 4, we aim to test if AI advisors can still outperform human advisors when using a well-established persuasion technique in human-to-human interactions: Starting off on common grounds. We conducted a 2x2x2 experiment with nature of the message source (human/AI), information valence (undesirable/desirable) and persuasion (no common ground/with common ground) treated as between-subject factors. The results are in line with the previous three studies. Further, for both advisors, persuasion through common ground had no significant effect on learning rates, although learning rates with persuasion were slightly higher ($M = 0.62$, $SD = 0.63$) than without ($M = 0.55$, $SD = 0.74$) for the human advisor, $d = -0.06$.

Study 5 examines 1) if differential reactions to AI and human advice also lead to important behavioral differences and 2) if our results hold firm when inviting managers, who have to make decisions regularly in their job, to our study. Again, valence dependent belief updating was only present in the human condition. Further, loyalty intention towards a human advisor was significantly higher when information was desirable ($M = 4.56$, $SD = 1.36$) rather than undesirable ($M = 3.84$, $SD = 1.44$), $d = 0.77$. When the advisor was AI, loyalty intentions did not differ significantly between the undesirable and desirable advice ($M = 3.98$, $SD = 1.38$), $d = 0.15$. Further, when receiving desirable advice, loyalty was significantly higher when the advisor was human ($M = 4.56$, $SD = 1.36$) than when the advisor was AI ($M = 4.07$, $SD = 1.32$), $d = 0.55$.

The present research finds ample evidence for a valence dependent updating asymmetry in interactions with human advisors and a reduction of this bias in interactions with AI. We find that AI can reduce psychological reactance and in consequence increase learning. Especially in comparison to human advisors, users interacting with AI advisors have higher learning rates for undesirable information, which leads to less biased belief updating, or put differently, a lessening of the well-established optimism bias. These findings are highly relevant not only because they show the potential to reduce irrational risk-taking of individuals, but also because they can improve managerial decision making and contribute to a stable economy.

REFERENCES

Cohen, A. R. (1962). A dissonance analysis of the boomerang effect. *Journal of Personality*.

Roseman, I. J. (1996). Appraisal determinants of emotions: Constructing a more accurate and comprehensive theory. *Cognition & Emotion*, *10*(3), 241-278.

Roubroeks, M., Ham, J., & Midden, C. (2011). When artificial social agents try to persuade people: The role of social agency on the occurrence of psychological reactance. *International Journal of Social Robotics*, *3*(2), 155-165.

Sharot, T. (2012). *The Optimism Bias: Why we're wired to look on the bright side*. Hachette UK.

Sharot, T., Korn, C. W., & Dolan, R. J. (2011). How unrealistic optimism is maintained in the face of reality. *Nature neuroscience*, *14*(11), 1475.

Shefrin, H. (2010). How psychological pitfalls generated the global financial crisis. *Voices of Wisdom: Understanding the Global Financial Crisis, Laurence B. Siegel, ed., Research Foundation of CFA Institute*, 10-04.

Silvia, P. J. (2005). Deflecting reactance: The role of similarity in increasing compliance and reducing resistance. *Basic and Applied Social Psychology*, *27*(3), 277-284.

Zamalloa, I., Kojcev, R., Hernández, A., Muguruza, I., Usategui, L., Bilbao, A., & Mayoral, V. (2017). Dissecting Robotics-historical overview and future perspectives. *arXiv preprint arXiv:*1704.08617.

Gift Giving in Response to Others' Hardship:
The Role of Recipient Optimism versus Pessimism

Christopher Cannon, University of Hawaii, USA
Derek D. Rucker, Northwestern University, USA

EXTENDED ABSTRACT

Researchers have examined gift giving during special occasions, such as weddings or birthdays, as well as in everyday contexts, such as bonding with a friend (Chan and Mogilner 2017; Tifferet et al. 2018). However, the emphasis on such situations neglects, perhaps unintentionally, another important gifting context: hardships (for discussion, see Klein, Lowrey, and Otnes 2015). For example, a friend could lose his father, a co-worker could fall ill, or a family member could end a marriage. How do consumers provide gifts in response to hardship?

To answer this question, we examine an aspect that is fundamental to the experience of hardship: recipients' outlook on their hardship. Optimistic people believe that, despite the hardship, future events will go favorably, whereas pessimistic people believe that, in addition to the hardship, future events will go unfavorably (Carver, Kus, and Scheier 1994). Importantly, we suggest that these two responses signal to others different needs in the recipient. In particular, we introduce the idea that gifts can be used to fulfill one of these needs. First, gifts can fulfill the need for affiliation—the desire for social connection (Hill 1987). Second, gifts can fulfill the need for nurturing—the desire for care and support from others (Cannon and Rucker 2020; McAdams et al. 1996).

We argue that optimism and pessimism in others can signal the need for affiliation versus nurturing. First, we predict that gift givers infer affiliation needs in optimistic others. In line with this, optimistic individuals frequently cope by seeking out social support (Scheier, Weintraub, and Carver 1986) and have a preference for engaging in social interactions (Terrill, Ruiz, and Garofalo 2010). Second, we predict that gift givers infer nurturing needs in pessimistic others. In line with this, pessimistic individuals are more submissive, which suggests they lack the agency to confront their own challenges (Smith et al. 2013), and frequently engage in avoidant behavior (Nes and Segerstrom 2006), which suggests the need for others' intervention and support.

Thus, we propose gift givers will choose gifts that fulfill these distinct needs. For optimistic recipients, we predict that gift givers will choose gifts that respond to a need for affiliation. This can include both experiential (e.g., paint night with friends) and material gifts (e.g., family board game). For pessimistic recipients, we predict that gift givers will choose gifts that respond to a need for nurturing. This can also include both experiential (e.g., spa treatment) and material gifts (e.g., hand soap that supports clean water initiatives).

In experiment 1, MTurk participants ($N = 202$) were randomly assigned to a 3-cell (recipient outlook: optimistic, pessimistic, vs. no hardship) between-subjects design. In the optimistic (vs. pessimistic) condition, participants read a scenario where their co-worker, Jennifer, was optimistic (vs. pessimistic) about her Crohn's disease diagnosis. In the no hardship condition, Jennifer was not diagnosed with Crohn's disease. Participants chose one of three gift baskets: a control gift basket (e.g., gourmet fruits and jams), an affiliation gift basket (e.g., paint night with a group of friends), and a nurturing gift basket (e.g., hand soap that supports clean water initiatives). Participants shifted preferences between affiliation and nurturing gifts depending on the recipient's outlook ($^2 = 9.40$, $p = .052$). More participants chose the affiliation gift basket (52%) for the optimistic recipient than either the nurturing (29%; $p = .027$) or control gift

baskets (19%; $p < .001$). In contrast, more participants chose the nurturing gift basket (51%) for the pessimistic recipient than either the affiliation (28%; $p = .036$) or control gift baskets (22%; $p = .006$). The same number of participants chose the affiliation and nurturing gift baskets for the recipient with no hardship.

In experiment 2, we provided evidence for the psychological mechanism. MTurk participants ($N = 201$) were asked to indicate their purchase intentions between the same affiliation and nurturing gift baskets (1 = definitely nurturing, 7 = definitely affiliation) for their co-worker, who was either optimistic or pessimistic about her diagnosis (see experiment 1). We also measured perceptions of the recipient's affiliation ($\alpha = .88$) and nurturing needs ($\alpha = .85$). In line with our hypothesis, affiliation versus nurturing needs mediated the effect of recipient outlook on gift giving ($B = .47$, $SE = .18$; 95% CI [.12, .84]).

In experiment 3, MTurk participants ($N = 200$) were randomly assigned to a 2-cell (recipient outlook: optimistic vs. pessimistic) between-subjects design. Participants read a scenario where their friend, Sarah, was either optimistic or pessimistic about her recent relationship rejection. Then, participants chose between two restaurant gift cards, framed in terms of affiliation (e.g., comfortable ambiance for conversion) and nurturing needs (e.g., waitstaff takes care of customer needs). More participants chose the affiliation (65%) over the nurturing framed gift card (35%) for the optimistic recipient ($p = .003$). In contrast, more participants chose the nurturing (65%) over the affiliation framed gift card (35%) for the optimistic recipient ($p = .003$).

In experiment 4 ($N = 300$), we increased the external validity of our findings by having participants purchase a gift for someone they personally know who is experiencing a hardship. In addition, we provided a boundary condition for our effects: social closeness (Aron, Aron, and Smollan 1992). In line with construal level theory (Trope and Liberman 2010), consumers should rely on the recipients' outlook more in their decision making for distant (vs. close) recipients. In support of this, gift givers were able to differentiate between the affiliation and nurturing needs for socially distant recipients because of their higher construal of the situation. In contrast, gift givers did not take into consideration the situational needs for close recipients.

In conclusion, consumers do not simply provide any gift as a gesture toward a person enduring hardship. A recipient's outlook on the hardship, and the corresponding psychological need inferred by the giver, plays an integral role in the gifts given. In doing so, the present work paves the way for more research to study both gift giving in times of others' hardship and how recipients' outlook ultimately informs and influences gift givers.

REFERENCES

Aron, Arthur, Elaine N. Aron, and Danny Smollan (1992), "Inclusion of Other in the Self Scale and the Structure of Interpersonal Closeness," *Journal of Personality and Social Psychology*, 63 (4), 596–612.

Cannon, Christopher and Derek D. Rucker (2020), "The Communal Consumer: Longitudinal Evidence for the Distinction between Nurturing and Affiliative Motives," *Journal of the Association for Consumer Research*, 5 (3), 345–55.

Carver, Charles S., Lisa A. Kus, and Michael F. Scheier (1994), "Effects of Good versus Bad Mood and Optimistic versus Pesimistic Outlook on Social Acceptance versus Rejection," *Journal of Social and Clinical Psychology*, 13 (2), 138–51.

Chan, Cindy and Cassie Mogilner (2017), "Experiential Gifts Foster Stronger Social Relationships than Material Gifts," *Journal of Consumer Research*, 43 (6), 913–31.

Hill, Craig A. (1987), "Affiliation Motivation: People Who Need People ... but in Different Ways," *Journal of Personality and Social Psychology*, 52 (5), 1008–18.

Klein, Jill G., Tina M. Lowrey, and Cele C. Otnes (2015), "Identity-Based Motivations and Anticipated Reckoning: Contributions to Gift-Giving Theory from an Identity-Stripping Context," *Journal of Consumer Psychology*, 25 (3), 431–48.

McAdams, Dan P., Barry J. Hoffman, Elizabeth D. Mansfield, and Rodney Day (1996), "Themes of Agency and Communion in Significant Autobiographical Scenes," *Journal of Personality*, 64 (2), 339–77.

Nes, Lise Solberg and Suzanne C. Segerstrom (2006), "Dispositional Optimism and Coping: A Meta-Analytic Review," *Personality and Social Psychology Review*, 10 (3), 235–51.

Scheier, Michael F., Jagdish Kumari Weintraub, and Charles S. Carver (1986), "Coping with Stress: Divergent Strategies of Optimists and Pessimists," *Journal of Personality and Social Psychology*, 51 (6), 1257–64.

Smith, Timothy W., John M. Ruiz, Jenny M. Cundiff, Kelly G. Baron, and Jill B. Nealey-Moore (2013), "Optimism and Pessimism in Social Context: An Interpersonal Perspective on Resilience and Risk," *Journal of Research in Personality*, 47 (5), 553–62.

Terrill, Alexandra L., John M. Ruiz, and John P. Garofalo (2010), "Look on the Bright Side: Do the Benefits of Optimism Depend on the Social Nature of the Stressor?," *Journal of Behavioral Medicine*, 33 (5), 399–414.

Tifferet, Sigal, Gad Saad, Mali Meiri, and Nir Ido (2018), "Gift Giving at Israeli Weddings as a Function of Genetic Relatedness and Kinship Certainty," *Journal of Consumer Psychology*, 28 (1), 157–65.

Trope, Yaacov and Nira Liberman (2010), "Construal-Level Theory of Psychological Distance," *Psychological Review*, 117 (2), 440–63.

The Endowment Effect: Unique Predictions from a Cognitive Elaboration Account

Christopher Cannon, University of Hawaii, USA
Derek D. Rucker, Northwestern University, USA
David Gal, University of Illinois at Chicago, USA

EXTENDED ABSTRACT

The endowment effect is a phenomenon in which sellers have a higher valuation of their goods than buyers (Kahneman, Knetsch, and Thaler 1990, 1991). The term "endowment effect" was originally coined by Richard Thaler as a manifestation of prospect theory (Kahneman and Tversky 1979; Thaler 1980). The endowment effect has attracted significant scientific attention, with a multitude of distinct perspectives being offered to explain the endowment effect such as loss aversion (Thaler 1980), psychological inertia (Gal 2006), psychological ownership (Morewedge et al. 2009), and reference price theory (Weaver and Frederick 2012).

The present work introduces an additional, potentially powerful, yet entirely unexplored, explanation for the endowment effect: cognitive elaboration. According to the Elaboration Likelihood Model (ELM), attitudes can be formed and changed through two routes (Petty and Cacioppo 1986). Under high cognitive elaboration, people engage in the central route to processing; they carefully scrutinize the arguments presented in support of a message or product. Under low cognitive elaboration, people engage in the peripheral route to processing; they rely on simple heuristics and cues as opposed to the persuasiveness of the arguments.

We propose that buyers engage in more cognitive elaboration than sellers. Although neither proposed nor tested, a review of the literature provides evidence consistent with such a possibility. First, Petty and colleagues argue that the intention to purchase a product elicits high involvement and greater cognitive elaboration, whereas not needing to purchase a product leads to lower involvement and lower cognitive elaboration (Petty, Cacioppo, and Schumann 1983). Building on this perspective, one might expect that buyers—who might purchase the product—would be more involved than sellers—who already own the product. Second, as additional evidence, buyers (vs. sellers) appear to be more sensitive to the actual value of the good manipulated through product descriptions (Weaver and Frederick 2012).

If differences in cognitive elaboration exist between buyers and sellers, it follows that differences in participants' sensitivity to the quality of arguments should occur. Specifically, buyers, who are more attentive to the information about a prospective purchase, should exhibit a stronger response to whether the arguments in favor of a product are weak or strong (see Petty and Cacioppo 1986). In contrast, sellers, who are less attentive to the product, should be less sensitive to the quality of the arguments. Importantly, a cognitive elaboration account allows for novel theoretical predictions relative to all prior explanations of the endowment effect. Specifically, when argument quality is weak, the classic endowment should be observed: Selling prices should be higher than buying prices. However, when argument quality is strong, an elimination and even a reversal of the endowment should occur: Buying prices should be equal to or higher than selling prices.

We tested a cognitive elaboration account of the endowment effect across four experiments. In each experiment, MTurk participants were assigned to a 2 (endowment: buyer vs. seller) × 2 (argument strength: weak vs. strong) between-participant design. We varied the product category to demonstrate robustness across disparate types of products: smartwatch (experiment 1), cell phone (experiment 2), laundry detergent (experiment 3), and travel mug (experiment 4). In each experiment, we aimed to collect 300 participants to ensure a sufficiently large cell sizes. For the endowment conditions, buyers were asked to imagine that they are thinking about purchasing the product. Sellers were asked to imagine that they own the product and take it home with them. In the weak (vs. strong) argument condition, participants were given a list of features in favor of the product, but they were not particularly convincing (vs. exceptionally convincing). In each experiment, we measured WTP/WTA (i.e., measured on a sliding scale) and brand attitude (i.e., bad-good, negative-positive, and unfavorable-favorable). In experiments 2-4, we also measured favorability of thoughts generated about the product by having independent judges code the valence and relevance of the participants' listed thoughts.

Across four experiments ($N = 1200$), we demonstrate that sellers (vs. buyers) show decreased cognitive elaboration when forming product evaluations and determining reservation prices; see table 1. Moreover, we demonstrate that sellers (vs. buyers) show less sensitivity to argument strength. Therefore, when products were presented with weak arguments, selling price was significantly greater than buying price. However, when products were presented with strong arguments, buying price was equal to selling price (experiments 1, 3-4) and sometimes even greater than selling price (experiment 2). Moreover, as further evidence for a cognitive elaboration perspective, favorability of message-related thoughts mediated our effects. Buyers (vs. sellers) generated fewer favorable message-related thoughts when the product was framed in terms of weak arguments. However, buyers (vs. sellers) had more favorable message-related thoughts when the product was framed in terms of strong arguments.

In contrast to prior explanations of the endowment effect, such as loss aversion, psychological ownership, and psychological inertia, a cognitive elaboration perspective can offer new insights into when and why the endowment effect is (and *is not*) observed. Of course, these other accounts still offer insight into the endowment effect; however, the present experiments suggest such accounts are incomplete.

This work also opens up the possibility for future research. First, although we provide evidence that sellers engage in less cognitive elaboration than buyers, it is still an open question as to what peripheral cues sellers rely on to form judgments about products that they own. Likely, sellers rely on multiple different cues, such as reference prices (Weaver and Frederick 2012), the price of a similar product one owns (Hsee, Dubé, and Zhang 2008), or misattribution of affect (Shu and Peck 2011). Second, although our evidence suggests that buyers unilaterally engage in greater cognitive elaboration than sellers, there may be cases when the reverse is true. Future research could examine under which contexts sellers are more involved in determining reservation prices than buyers, such as when there is high competition among vendors in the marketplace. Overall, we hope this work inspires researchers to apply novel psychological perspectives to better understand the complexities of buyer-seller relationships.

REFERENCES

Gal, David (2006), "A Psychological Law of Inertia and the Illusion of Loss Aversion," *Judgment and Decision Making*, 1 (1), 23–32.

Hsee, Christopher K., Jean-Pierre Dubé, and Yan Zhang (2008), "The Prominence Effect in Shanghai Apartment Prices," *Journal of Marketing Research*, 45 (2), 133–44.

Kahneman, Daniel, Jack L. Knetsch, and Richard H. Thaler (1991), "Anomalies: The Endowment Effect, Loss Aversion, and Status Quo Bias," *Journal of Economic Perspectives*, 5 (1), 193–206.

——— (1990), "Experimental Tests of the Endowment Effect and the Coase Theorem," *Journal of Political Economy*, 98 (6), 1325–48.

Kahneman, Daniel and Amos Tversky (1979), "Prospect Theory: An Analysis of Decision under Risk," *Econometrica: Journal of the Econometric Society*, 47 (2), 263–91.

Morewedge, Carey K., Lisa L. Shu, Daniel T. Gilbert, and Timothy D. Wilson (2009), "Bad Riddance or Good Rubbish? Ownership and Not Loss Aversion Causes the Endowment Effect," *Journal of Experimental Social Psychology*, 45 (4), 947–51.

Petty, Richard E. and John T. Cacioppo (1986), "The Elaboration Likelihood Model of Persuasion," *Advances in Experimental Social Psychology*, 19 (1), 123–205.

Petty, Richard E., John T. Cacioppo, and David Schumann (1983), "Central and Peripheral Routes to Advertising Effectiveness: The Moderating Role of Involvement," *Journal of Consumer Research*, 10 (2), 135–46.

Shu, Suzanne B. and Joann Peck (2011), "Psychological Ownership and Affective Reaction: Emotional Attachment Process Variables and the Endowment Effect," *Journal of Consumer Psychology*, 21 (4), 439–52.

Thaler, Richard H. (1980), "Toward a Positive Theory of Consumer Choice," *Journal of Economic Behavior & Organization*, 1, 39–60.

Weaver, Ray and Shane Frederick (2012), "A Reference Price Theory of the Endowment Effect," *Journal of Marketing Research*, 49 (5), 696–707.

Urban Art and Brands: Analyzing from Different Perspectives

Diana M. Cárdenas, Tecnologico de Monterrey, EGADE Business School, México
Raquel Castaño, Tecnologico de Monterrey, EGADE Business School, México
Claudia Quintanilla, Tecnologico de Monterrey, EGADE Business School, México
Edgardo Ayala, Tecnologico de Monterrey, EGADE Business School, México

EXTENDED ABSTRACT

Purpose

This paper aims to explore brand value embedded in street art from the perspective of urban artists, brand managers and final consumers. We argue that through the consumption of street art advertising, consumers, brands and community obtain valuable benefits.

Design/methodology/approach

In-depth interviews were conducted with urban artists, consumers and brand managers to explore the value of street art advertising.

Findings

This research shows that street art contributes to the communication of a brand because it stimulates sensory, intellectual and behavioral responses. Three main themes related to street art advertisement value and brand benefits emerged (a) Social connectedness and community bonding; (b) Imprinting an image of authenticity and coolness; and (c) Permeating an aura of beauty that engages consumers and provokes social dissemination of the brand. While urban artists and consumers focus in emotional and aesthetic benefits, brand managers perceive benefits in a utilitarian perspective, viewing brand as a networking tool for community transformation.

Originality/value

To the best of our knowledge, this is the first study to qualitatively analyze the brand benefits of urban art advertisement from the perspectives of artists, consumers and brands. This study provides insights into the benefits of urban art advertisement as compared to classical media.

Introduction

Urban art is a worldwide phenomenon where people come out to the streets to paint as a form of self-expression. Street painting in an elaborately creative manner is a powerful practice that is transforming the world. *Public art* has been defined as a public product of expression. It is a phenomenon of individual art deference into a collective society that indulges differences among individual as a manifestation of a communal spirit (Hein, 1996). The terms 'public art', 'urban art' and 'street art' often relate to diverse forms of 'art expression' that are embedded in public space. In this research, we refer to 'street art' as 'visual images that are *hand-painted* mainly on the walls of the street'.

Non-profit and for-profit organizations and governments use street art as a valuable resource. Previous research has examined *street art* or *urban art* and found evidence that urban art interventions effectively drive social transformation as social encounters promote engagement and emotional involvement (Gonzalez, 2017; Howes, 2005; Laurel; 1993). It also promotes community transformation as it improves district image, safety, services and capacities, covers commercial activities and improves local services (Perez, 2010). Moreover, some studies have confirmed that art and culture can help accomplish policy objectives related with economic development and neighborhood regeneration, hence promoting economic growth (Zukin, 1982; Markusen, 2006; Currid, 2009; Hartley, 2018). The global street art movement as an idea of illicit practice is losing its power as new perspectives emerges that encourages its coexistence with institutions such as government and the market (Visconti, 2010).

Thus, previous research has also focused on sociological aspects as a pedagogical vehicle that promotes learning about art and life skills with interaction and dialogue. These aspects include physical city reconstruction, community transformation and people's engagement in the educational value of urban art. In certain manifestations, urban art's economic value is raised by increasing urban artists' salaries and land value among others.

Street art and brands could seem an interesting fit. 'Companies around the globe are starting to implement street art as a branding strategy' (Borghini, 2010). Urban art's marketability has increased. 'The current interplay of commercial advertising and street art is fascinating' (Borghini, 2010). Young viewers that are tired of publicity are accepting this technique. 'The youngers have become less and less susceptible to traditional advertising' (Saucet, 2015), and brands are incorporating this phenomenon.

However, to the best of our knowledge little is known about the value of urban art advertisement for consumers and brands. This study seeks to extend previous research by qualitatively exploring this value from the perspective of urban artists, brand managers and final consumers. We argue that through the consumption of street art advertising, consumers, brands and community obtain valuable benefits as compared to classical media.

Theoretical Background

Aesthetics and Consumer Experience

People interact with the world through their basic senses that allow them to appreciate and survive in the world. Although humans experience more than five senses, the principle of the five basic human senses is traced back to Aristotle. This principle allows simple sensory categorization of in the complex world, namely, vision, smell, hearing, taste and touch (Kotler, 1973). According to Kotler, atmosphere has visual (color, brightness, size, shapes), aural (volume, pitch), olfactory (scent, freshness) and tactile dimensions (softness, smoothness, temperature). Reimann (2017) states that a better understanding of the interaction between aesthetic judgments, emotions, fluency, and the different senses should be the goal of future marketers and psychologist. The main idea is that stimuli provoke aesthetic judgements based on sense perception, ease of processing and aesthetic affect. These aspects respond to aesthetics, namely, judgement on other variables, the choice of an aesthetic object over other objects and decisions and performance in unrelated tasks. Responses could relate to the consumer decision and impact consumer experience. Consumer experience has been defined as 'an emergent property that results from a complex system of mutually overlapping interrelationships in constant reciprocal interaction with personal, environmental, and situational inputs' (Hirschman, 1986). Fournier (1998) identified that customers derive value from their experiences when they are strongly involved with brands. 'Brand Experience is conceptualized as the sensations, feelings, cognitions, and behavioral responses evoked by brand-related stimuli' (Brakus, 2009). Understanding consumers' brand experience and how they provide appealing brand experiences is critical for positioning and differentiating their brands (Schmitt, 2013). The branding literature has not focused

enough on multisensory brand experience and its impact on brand components perceived through the five senses. It can be argued that multisensory brand experience should be the basis for brand building and brand identity in creating brand image and loyalty (Hultén, 2011). How can art enhance the communication of a brand?

Art Infusion Effects

Based on marketing research, 'art infusion effect' refers to the phenomenon when consumers evaluate products more positively when they are associated with art images than when they are related to non-art images (Hagtvedt & Patrick, 2008). In addition, artistic characteristics could contribute to positive consumer evaluation (Crader & Zaichkowsky, 2007). Similarly, art images are more persuasive than non-art because art adds a unique glamour to products (Mantovani & Tazima, 2016). According to Lacey et al.'s (2011) research titled 'Art: For Reward's Sake', artwork activates the brain's reward circuit when viewing an art image. Art infusion studies focused on the effects of consumer perception of art on a product, but consumers' brand experience embedded in an artwork of art has not been completely explored.

Street Art as a Vehicle to Transform Communities

Urban Art and Social Value. In the last decades, urban art has been increasingly used for social transformation. These art interventions in public spaces frequently drive an entire district's social change by adopting interaction and daily habits that improve people's daily lives (Gonzales, 2017).

Howes (2005) demonstrated that interacting with urban art often involves a degree of engagement. This engagement is not only an interaction with an object, space or device but also a degree of emotional involvement as a part of an experience (Laurel, 2013). Consequently, if an urban artist desires to produce and engage people in their work, then they should address people's emotions.

Reconstruction of a city. This reconstruction is commonly achieved by collaborating with the community and their stakeholders (Perez, 2010). Creativity and artistic activities can significantly help resolve this problem, (Lopes, 2017). Baquero (2017) demonstrated the importance of urban art to rebuilding a city's reputation and perception marked by trauma of violence. Throw graffiti, murals and photography urban artist have changed the meaning of violence and fear in the city of Medellin. This cultural art requires gender equality and justice reconciliation with past events, which are fundamental to rebuilding national identity.

Education. Urban art intervention practices use open spaces art-making, learning and social action spots. As mentioned by Desai and Darts (2016), street art is not only made to decorate environment but also to challenge the viewer to reflect how these public spaces are connected to dominant power relations. Accordingly, Miles (2004) suggested that many artists are motivated to make interventions in open areas primarily due to provocation and participation. Hence, their works aim to provoke thought and generate dialogue and discussion among the viewers. Urban artists can be described as educators who teach the public about the connection between public spaces and private interests (Desai & Darts, 2016). Their street art seeks to challenge the cultural status quo. They stimulate a dialogue about this issue, which reflects their daily life. In addition, the relationship between urban art and education is reflected in a phenomenon wherein an art educator moves to public areas for pedagogical intervention. An art educator uses different educational strategies to connect with the public. They aim to challenge different actors and public spaces' private interest in a democratic system through art projects (Duncum, 2011).

Urban Art and Economic Value. Urban art is a precursor of community wealth. Universities, non-profit organizations, governments and business enterprises use urban art as a valuable resource. The creation of alliances increases artist salaries and land value and promotes tourism. Public art can be 'an authentic form of visual communication within the open space of the city and a profitable element of the capitalist system' (Antoniou, 2014).

Alliances and artist salaries. Urban artists travel worldwide to work on international projects. As artists found an increment in their income through this activity, local painters cannot use public art activity as their only source of income. Thus, they engage in other jobs and activities with better remuneration, including worldwide civic events. Festivals have federal funding and capture the attention of sponsors and brands. They promote local artists' exposition and international visitors' recognition. Artists consider these activities as opportunities to travel overseas and gain incredible experiences. These collaboration and alliances promote economic activity as partnership is an integral part of street art activities. Live painting events also showcase numerous artists working as a team and complement their painting. Therefore, artists are compelled to be harmonious during an entire activity, thus enabling them to enrich each other's works.

Land value and tourism. Art and an urban neighbourhood's economic changes are associated. Seresinhe (2016) conducted an experiment in London and found that communities with high proportion of art photographs have high relative gains in property prices. Thus, similar to economic development, the visual environment may significantly affect crucial aspects of people's life (Seresinhe, 2016).

Urban Art and Environmental Value. Environmental issues have been intensively explored since the 1960s. However, certain scholars have argued that the value–action gap between people's attitude and behaviors must be addressed to achieve drastic environmental change (Tunnacliffe, 2013). Urban art plays an essential role in this context by offering an interactive way of reconnecting with our environment, communities and ourselves. The meaning of conservation is a relevant concept that needs exploration. Furthermore, the role of the local community members in urban mural preservation is relevant. Community members can maintain cultural heritage, conservation values and process. However, designing a project to engage community members with clear objectives reflected in their assigned tasks is a challenge (Dickinson, 2010). Kyi, Tse and Khazam (2016) provided evidence that community members highly commit to public visual spaces by establishing a conservation dialogue and providing conservation data on urban murals. They also demonstrated that this commitment should be motivated by information that promotes an evidence-based dialogue of preservation projects, such as cultural heritage and environmental preservation.

In sum, previous research has examined the aesthetic value of urban art and its impacts on consumers and their experiences. Studies show that urban art has an impact on the social, economic and environmental context of a community (Koeck, 2011). Thus far, consumer-perceived value of urban art and brands remain underexplored. Understanding the value of street art advertisement is important to set the bases of understanding its effect as a marketing strategy. Although there have been studies that explored the phenomena of street art and marketing through a systematic research review (Visconti, 2010; Droney, 2010; Borghini, 2010; Saucet, 2015; Molnár, 2018), understanding the specific brand benefits poses an interesting question for scientific research.

Methodology

In-depth interviews were conducted with three segments: Five urban artists, eight brand managers and twenty consumers. The interview guideline was formulated based on personal perception of street art movement in each segment, brand collaborations, and consumer experience. The interviews were conducted at the respondents' studios and offices, during a 6-month period, and instrumentation rigor followed (Chenail, 2015).

In this study reflexivity was used to diminish possible bias by analyzing the interviews. Prolonged engagement also avoid projecting own experiences (Berger, 2015). For analysis, Spiggle's (2015) data were categorized, abstracted, compared and integrated. Meanings were interpreted based on their identifying patterns. Each meeting was audio-recorded and transcribed. The interviews were imported into NUD.IST Vivo software (Welsh, 2002), and then the content was catalogued into the findings.

Findings

Street art advertisement can be a valuable brand experience as it stimulates consumers' affective, intellectual and behavioral responses. Three main emerging themes related to street art advertisement value and brand benefits. First, social connectedness as street art creates bonds by merging community identity. Second, it imprints and image in memory and provokes thinking and imagination. Third, beautification of spaces engages consumers, hence provoking dissemination. Although all segments share the same three themes, they have differences. Urban artists tend to focus on the affective response, recalling social connectedness, whereas brand managers focus on functional variables, such as visual memory and brand benefits. The consumer segments emphasize the most the value of creating bonds and beautification of spaces as they mentioned brand benefit awareness. We shall now analyze each emerging theme by segment response.

1. Social Connectedness: Bonding with the Community Identity

All participants agree that street art stimulates mainly customers' visual sensory. An arousal provokes involvement that creates bonds and social connection. After provoking sensory, street art can stimulate feelings, sentiments and emotions. These feelings can be translated into more elaborate constructs, such as love, hope and happiness that are interconnected.

'As soon as we started to shake the paint cans; the children of the community listen and come to join us' (Urban Artist Silvestre).

'It is an experience of encounter and connection between people from the urban art that emphatically impacts the space, to activate the transformation' (Brand Manager Tomas).

'I think it gives a positive feeling to the environment that motivates people and connects the humans through a different type of communication which is urban art. If the world that surrounds us is colorful and if this art has a positive meaning it will give a positive impact on people's mind' (consumer).

The segments mainly differ in that urban artists and consumers reflect more comments on the sensorial and affective aspects, whereas brand managers find more functional value on final consumers that are preoccupied of visual and symbolic content. We observed urban art can also generate negative emotions, such as dislike or rejection, depending on the type of image or message. Therefore, care is necessary for visual content to promote the creation of bonds.

Urban artists elaborate multiple constructs derived from primary sensorial stimuli. They tend to focus on affective constructs, such as humor, love and joy that are evoked by the urban art. This approach provokes people's participation and engagement, creating bonds beyond the conventional family. The reason is because people from streets have different cultures. This technique promotes social connectedness beyond common social approaches.

'Urban art helps to fall in love, it revives the community humor' (Urban Artist Silvestre).

Brand managers recognize emotions and affective street art value. They recognize that these emotions by consumers impact their connection. They mainly focus on utility aspects, such as serving as a communication channel, community transformation, encounters and connections and brand benefits, such as social responsibility, partnerships, respect and recognition.

'The joy of seeing a city with art and people enjoying it without having to pay for a museum is also a great joy' (Brand Manager Elizondo).

'Urban art has brought greater recognition to my brand, thanks from people; and above all, I think it has given us a lot of social joy in the company to know that we are impacting, that we are helping Mexico' (Brand Manager Elizondo).

Final consumers focus the sensorial and positive sentiments and how they create unity and bonds as they recognize it as a cool strategy. This segment shows peculiar interest in visual content and present dislikes in few cases only.

'It is a way to connect and bond without the need to exchange words' (consumer).

'Connect a community of people, get them closer' (consumer).

In sum, we observed that street art stimulates the interviewed segments' sensory and affective aspects. These aspects elaborate consumers' positive constructs and positive brand benefits as connections and social recognition. Consumers may not appreciate, understand or value urban art in a personal perspective. Nevertheless, given that street art is in public areas, it can give opportunity to respect differences. Thus, a bond beyond personal thoughts is created in a bigger picture by sharing handmade visuals in a physical public space.

2. Imprinting an Image in the Memory: Authenticity and Coolness

All participants agree that street art generates intellectual values, such as thinking, curiosity, interpretation and can enhance imagination. It can be associated with a learning device as customers are involved in an intellectual process that impacts their memory and could be associated with brand recall.

'The brand makes the relationship for them to associate, what they do is ask you a certain range of colors, as for example tequila the miracle' (Urban Artist Beo Hake).

'And the works of art provoke an interpretation. So that it provokes an interpretation and as it is something of daily use, gives character, and what I mean is that its symbolic character is built with use, with socialization, with language. An object, any object, acquires meaning depending on how we use it' (Brand Manager Coker).

I like that the brand uses urban art as a means of advertising, it is a way of letting the city express itself as a living entity through its artists. Traditional advertising is made for consumption, urban art for the contemplation of space (consumer).

The segments mainly differ in that only the consumer segment shows peculiar interest in visual image content. Moreover, urban artists and consumers show more interest on the public educational arena, whereas brand managers focus on building brand identity.

The urban artist and consumer segments held that this strategy can be associated with a young and coolness trend and can be an alternative advertising method. The consumer segment identifies visual content as a learning device that generates intellectual involvement and promotes their understanding and respect of other ideologies.

'I think they associate it with youth, give it a fresher air but also differentiate it from traditional marketing' (Urban Artist Asero).

Brand managers find value in the marketing discourse of urban art benefits and linkage with a symbolic value and brand identity and recognition.

'In the area of the creation of identity there are many possibilities, and it is very exciting' (Brand Manager Coker).

Consumers recognize that brand identity could be a learning device that transforms consumer judgements. Only the consumer segment shows value on considering content; they promote health and do not prefer the use of underage content.

'People learned new things through paintings like culture, it can inspire young people and for the same thing that its impressive people always put attention to it' (consumer).

'It creates a piece in the way that people become more understanding and open-minded' (consumer).

'The themes should be for every kind of public, nothing suggestive, always with respect' (consumer).

'Do not use text so people can interpret whatever they want' (consumer).

'The brands should send a message of cleanness, care of the environment, respect consciousness, about the importance of don't get lost in technology or dehumanizing, messages that promote communication, anything related to the health' (consumer).

In sum, we observed that this strategy imprints visual memory and could be a helpful learning and association device that build on brand image with a unique, social and cool trend.

3. Permeating an Aura of Beauty: Engaging and Social Dissemination

All participants agreed that street art can provoke community engagement and contributes to public space beautification. The segments mainly differ in that brand managers focus more on utilitar-ian brand benefits, whereas urban artists and consumers focus on community values. In sum, physical actions and bodily experiences are identified as action-oriented. Street art motivates consumers to engage in the experience, reunite and make sense of community and take pictures and videos and share them on social networks. Thus, consumers become a publicity agent of urban art. Overall, they all share their passion to utilize urban art as a win-win strategy.

We influence in the humor, urban art makes the neighborhood to reunite, to be more united, and create community, we all together build a better park for our children, and they can see, so we teach them with the example' (Urban Artist Asero).

The art interventions, why are you doing are adding to those networks and becoming nodes of interaction for the different people who inhabit the same space, and that happens because where before there were people who had nothing in common, now you have an art intervention that everyone sees every day and that generates topics of conversation, and they make you part of a community' (Brand Manager Coker).

It think that kind of art provides a great atmosphere for the city and thus more people will come to visit the city (consumer).

The main difference between the interviewed segments is that urban artists focus on the sensorial and affective values, whereas brand managers focus on functional responses as network transformation and dissemination of artwork. Final consumers share the same sensorial and functional values. Only the consumer segment had few unpleasant responses. They presented dislikes regarding possible visual contamination. Thus, they were emphatic on managing the content.

Urban artists appreciate physical community involvement, hence disseminating their work via word-of-mouth and social networks. All brand managers and urban artists showed passion and enjoyment of their job.

'A friend of mine did a job for Honda in Mexico City, he painted a car with enormous profound columns, as if the car was up in the columns, so the persons started to jump between the columns, the art promotes the people interaction, and as the persons are part of the picture, promotes a virality in social networks' (Urban Artist Dazer).

'We were three weeks in Dubai at the Festival Dubai Canvas, they invite us the five-star hotel and pay for everything, they even gave us special equipment; all the time there were this status cars like Rolls Royce and Lamborghinis. We paint two giraffes at the beginning, we have such a success that then real motley of giraffes was custom made identical as the ones that we paint and were walking over the festival, the Jecke came to take a picture, and we were on the news, the paint became viral as every consumer what to take a photo and put in into Instagram' (Urban Artist Dazer).

'Brands are utilizing street art because there is a projection, there is an audience, urban artists have an audience, thanks to social networks, I have friends colleagues who have thousands of followers in their networks' (Urban Artist Acaro).

'The bank Santander asked marketing agencies to search for several urban artists to paint street bank cashiers. The campaign was displayed all over the country, but the exciting thing is that they took pictures and make a video of that, and they put it out into Instagram' (Urban Artist Beo Hake).

Brand managers focus on functional responses, such as dialogue, network creation, connection building, territory transformation and brand dissemination. They also recognize economic benefits for the enterprise.

What we do is we mobilize the transforming energy from the places where we are working' (Brand Manager Perez).

'It is important for territorial development. And that same brand city gives rise to the development of certain organizations. Because the brand makes that space attractive. It attracts talent and that attraction of talent makes networking happen, networks are being woven and this, in turn, builds the brand, and the brand attracts more people, and these people are joining the networks and this is where they are transforming and creating the new organizations. To organize oneself you need closeness, that people inhabit these spaces' (Brand Manager Coker).

'With the urban art festivals is that there are programs of activities in public spaces, this is where the fortuitous encounters are generated and coexistence is generated, which together generate the construction of citizenship, community' (Brand Manager Padilla).

And well, in economic matters, we have seen an increase in sales of paint counter (Brand Manager Elizondo).

'These types of projects are very attractive for anyone, to be able to position oneself in the media' (Brand Manager Nuñez).

Consumers found an opportunity to transform physical spaces into a more aesthetic, inviting and functional ones. They believe this transformation could improve an environment's attractiveness for tourism.

It generates value because messages can be spread around through art (consumer).

I like the urban art publicity that also has a functionality, and serves as the –Sprite Showers-, that are on the beach' (consumer).

In sum, this research provides insights about how street art contributes to the communication of a specific brand, as compared to classical media. As it appears to stimulate the sensory, intellectual and behavioral responses of the consumer by creating bonds with the community identity; provoking thinking and interpretation; permeating an aura of beauty and social responsibility and by letting the brand benefit from its viral dissemination over social media (see Table 1)

Conclusion

Urban street art in the social, educational and economic arena has been explored. However, in the context of marketing management, specific benefits for urban artist, brand managers and consumers was unexplored. Thus, this study aimed to extend this knowledge and how it benefits consumers and brands. We found that urban art can be a valuable brand experience as it stimulates consumers' sensory, intellectual and behavioral responses. Our research highlights that it can promote social connectedness, hence creating bonds by merging communities, imprinting visual memory, giving an image of coolness to the brand and engaging the community in public space beautification. These activities promote brand dissemination via social networks.

Previews research in the field of outdoor advertisement has stated that in regards to communication of a specific brand, several variables as creativity, attention, and memory have been studied and shown benefits related to product involvement, brand attitude, and advertising recognition (Rosbergen,1997, Wilson,2015). We contribute to this research by highlighting that street art contributes to the communication of a specific brand not only by involvement and recognition, but by enhancing the brand experience through community bonding, the creation of an image of authenticity and coolness and by social dissemination of the brand.

Our results have important managerial implications as we found that establishing a link between urban artists and brand managers could be crucial to setting the bases of a successful project. The integration of the community into an artwork's design can be a significant factor that impacts consumer satisfaction. Consumers ask for positive messages of humanization and health to visual image and avoid violent, negative and underage content. Urban art should improve a city's appearance, and not tarnish it. Consumers mention to prefer urban art that provides a clean surrounding and does not promote visual contamination. Consumers aim for brands that respect artists' freedom to maintain the pureness of art. Urban art advertisement should be developed based on important factors that control art elements that may irritate consumers and negatively impact their experience. This aspect could be seen as the primary responsibility of brands.

Urban street art advertisements attract consumers. Communities, enterprises and government can positively involve in creative ways. We found that customers are eager to witness these interventions. Future research could explore the type of brands and products on which this strategy effectively works and the specific characteristics of image type. Online advertising through social networks is a major unexplored area (Hadija, 2012). Thus, an analysis of the impact of these images on a social network could be also an area of future research. Urban street can also be used as a valuable resource for segmentation and targeting decisions, when analyzing community brand responses. Urban art can identify various consumer trends, including their likes and dislike. Visual image can be useful for future product development and advertising campaigns that involve the community.

REFERENCES

Antoniou, C. (2014). The street art spectacle: The paradoxical phenomenon of contemporary graffiti. *Doctoral dissertation, Sotheby's Institute of Art-New York*.

Baquero, C. L. (2017). The urban memory galleries in Medellin. *Revista De Estudios Colombianos*, (50), 35-49.

Berger, R. (2015). Now I see it, now I don't: Researcher's position and reflexivity in qualitative research. *Qualitative Research*, 15(2). doi:10.1177/146879112468475

Borghini, S., Visconti, L. M., Anderson, L., & Sherry, Jr, J. F. (2010). Symbiotic postures of commercial advertising and street art. *Journal of Advertising*, 39(3). doi:10.2753/JOA0091-3367390308

Brakus, J. Joško, Bernd H. Schmitt, Lia Zarantonello (2009). Brand experience: what is it? How is it measured? Does it affect loyalty?'. *Journal of Marketing*, 73(3). doi:10.1509/jmkg.73.3.052

Chenail, R. J. (2009). Interviewing the Investigator: Strategies for Addressing Instrumentation and Researcher Bias Concerns in Qualitative Research. *The Qualitative Report*, 13(4), 14-21. Retrieved from https://nsuworks.nova.edu/tqr/vol13/iss4/1

Crader, S., & Zaichkowsky, J. L. (2007). The art of marketing. In T. M. Lowrey (Ed.). *Brick & mortar shopping in the 21st century* (pp. 87– 106). Mahwah, NJ: Lawrence Erlbaum Associates.

Currid, E. (2009). Bohemia as subculture; "Bohemia" as industry: Art, culture, and economic development. *Journal of Planning Literature*, *23*(4). doi:10.1177/0885412209335727

Desai, D., & Darts, D. (2016). Interrupting everyday life: Public interventionist art as critical public pedagogy. *International Journal of Art & Design Education*, 35(2). doi: 10.1111/jade.12050

Dickinson, J.L., Zuckerberg, B. & Bonter, D.N. (2010). Citizen Science as an Ecological Research Tool: Challenges and Benefits. *Annual Review of Ecology, Evolution, and Systematics*, 41. doi:10.1146/annurev-ecolsys-102209-144636

Droney, D. (2010). The business of "Getting Up": Street art and marketing in Los Angeles. *Visual Anthropology*, *23*(2). doi:10.1080/08949460903472952

Duncum, P. (2011) Engaging public space: art education for social justice, equity, and excellence, 44 (3). doi:10.1080/10665684.2011.590400

Fournier, Susan. (1998). Consumers and their brands: Developing relationship theory in consumer research. *Journal of Consumer Research*, 24(4). doi:10.1086/209515

González, C., Gómez-Isla, J., del Río, V., & Santamaría, A. (2017). El papel del arte contemporáneo en la dinamización social del entorno urbano. Un estudio de caso: El barrio del Oeste en Salamanca. *Arte, Individuo y Sociedad*, *29*(2), 299-310. doi: 10.5209/ARIS.53165

Hadija, Z., Barnes, S. B., & Hair, N. (2012). Why we ignore social networking advertising. *Qualitative Market Research: An International Journal*, 15(1). doi:10.1108/13522751211191973

Hagtvedt, H., and Patrick, V. M. (2008). Art infusion: The influence of visual art on the perception and evaluation of consumer products. *Journal of Marketing Research*, 45(3). doi:10.1509/jmkr.45.3.379

Hartley, K. (2018). State-society relations and urban art districts: The case of Angono, Philippines. *City, Culture and Society*, *15*, 45-52. doi: 10.1016/j.ccs.2018.09.003

Hein, H. (1996). What is public art?: Time, place, and meaning. *The Journal of Aesthetics and Art Criticism,* 54(1), 1-7. doi: 10.2307/431675

Hirschman E.C., Holbrook M.B. (1986) Expanding the Ontology and Methodology of Research on the Consumption Experience. In: Brinberg D., Lutz R.J. (eds) *Perspectives on Methodology in Consumer Research*. Springer, New York, NY.

Howes, David. 2005. Introduction: Empires of the Senses. *Empire of the Senses: The Sensual Culture Reader*, 1–17. Oxford: Berg.

Hultén, B. (2011). Sensory marketing: the multi-sensory brand-experience concept. *European Business Review*, *23*(3). doi:10.1108/09555341111130245

Koeck, R. (2011). Urban Regeneration in Liverpool: Sign-structures of the Visible and the Invisible. *Regenerating Culture and Society: Architecture, Art and the Global-politics of City Branding. Liverpool: Liverpool University Press/TATE*, 73-93.

Kotler, P. (1973). Atmospherics as a marketing tool. *Journal of Retailing*, *49*(4).

Kyi, C., Tse, N., & Khazam, S. (2016). The potential role of citizen conservation in re-shaping approaches to murals in an urban context. *Studies in Conservation,* 61(2), 98-103.

Lacey, S., Hagtvedt, H., Patrick, V. M., Anderson, A., Stilla, R., Deshpande, G., ... & Sathian, K. (2011). Art for reward's sake: Visual art recruits the ventral striatum. *Neuroimage*, *55*(1). doi:10.1016/j.neuroimage.2010.11.027

Laurel, B. (2013). *Computers as theatre*. Addison-Wesley.

Lopes, A. C., Farinha, J., & Amado, M. (2017). Sustainability through Art. *Energy Procedia*, 119, 752-766. doi:10.1016/j.egypro.2017.07.102

Mantovani, D., & Tazima, D. I. (2016). Visual art and regulatory fit messages on consumer evaluations. *Revista de Administración de Empresas*, *56*(2). doi:10.1590/S0034-759020160203

Markusen, A. (2006). Urban development and the politics of a creative class: evidence from a study of artists. *Environment and Planning A*, *38*(10). doi:10.1068/a38179

Miles, M. (2004) Urban Avant-Gardes: Art, Architecture, and Change. London: Routledge

Molnár, V. (2018). The business of urban coolness: Emerging markets for street art. *Poetics*, *71*, 43-54. doi:10.1016/j.poetic.2018.09.006

Perez, Y. A. (2010). Relocating MIU to the cityscape: gentrifying Wynwood's art district from industrial to institutional. *WIT Transactions on Ecology and the Environment*, *142*, 27-38.

Reimann, M., & Cao, C. C. (2017). Aesthetics: Antecedents, underlying processes and behavioral consequences. *International Handbook of Consumer Psychology* ,1, 65-599.

Rosbergen, E., Pieters, R., & Wedel, M. (1997). Visual attention to advertising: A segment-level analysis. *Journal of Consumer Research*, *24*(3). doi:10.1086/209512

Saucet, M., & Cova, B. (2015). The secret lives of unconventional campaigns: Street marketing on the fringe. *Journal of Marketing Communications*, *21*(1). doi:10.1080/13527266.2014.970820

Schmitt, B. (2011). Experience marketing: Concepts, frameworks and consumer insights. *Foundations and Trends in Marketing*, *5*(2), 55-112.

Schmitt, B., & Zarantonello, L. (2013). Consumer Experience and Experiential Marketing: A Critical Review. *Review of Marketing Research, 25–61*. doi*:*10.1108/S1548-6435(2013)0000010006

Seresinhe, C. I., Preis, T., & Moat, H. S. (2016). Quantifying the link between art and property prices in urban neighbourhoods. *Royal Society Open Science*, *3*(4), doi:10.1098/rsos.160146

Spiggle, S. (1994). Analysis and interpretation of qualitative data in consumer research. *Journal of Consumer Research*, 21(3). doi:10.1086/209413

Tunnicliffe M. (2013). The power of urban street art in re-naturing urban imaginations and experiences. DPU working paper. Retrieved from http://www.bartlett.ucl.ac.uk/dpu/latest/

Turner, D. W. (2010). Qualitative Interview Design: A Practical Guide for Novice Investigators. The Qualitative Report, 15(3), 754-760. Retrieved from http://nsuworks.nova.edu/tqr/vol15/iss3/19

Visconti, L. M., Sherry Jr, J. F., Borghini, S., & Anderson, L. (2010). Street art, sweet art? Reclaiming the "public" in public place. *Journal of Consumer Research*, 37(3), 511-529. http://dx.doi.org/10.1086/652731

Welsh, E. (2002). Dealing with data: Using NVivo in the qualitative data analysis process. *Qualitative Social Research,* 3, (2). Retrieved from http://nbn-resolving.de/urn:nbn:de:0114-fqs0202260

Wilson, R. T., Baack, D. W., & Till, B. D. (2015). Creativity, attention and the memory for brands: an outdoor advertising field study. *International Journal of Advertising*, *34*(2). doi:10.1080/02650487.2014.996117

Zukin, S. (1989). *Loft living: Culture and capital in urban change*. Rutgers University Press.

Implications of Underrepresentation for Female Fashion Consumers

Lena Cavusoglu, University of North Carolina at Pembroke, USA
Deniz Atik, University of Texas Rio Grande Valley, USA

EXTENDED ABSTRACT

Ideal female beauty standards are set by global fashion and beauty media and featured as including a narrow face with high eyebrows, large, round, light-colored eyes, high cheekbones, thin noses and lips, and straight hair (Kim 2010) and are associated with Whiteness (Taylor 1999) and thinness (Mussell, Binford, and Fulkerson 2000). The constructed, so-called Western standards of beauty and femininity (Bartky 1997) have "*racialized* beauty, [in] that it has defined beauty per se in terms of White beauty, in terms of the physical features that the people we consider white [people] are more likely to have" (Taylor 1999, p. 17). Therefore, in a fashion scene dominated by Caucasian and Western looks, the idea of ideal beauty became even more substantial for minority women from different ethnic, racial, religious, or cultural backgrounds and women in different age groups, socioeconomic classes, and physical abilities, to name a few. As such, investigating the fashion consumption experiences of a divergent group of women and the way they read the physiological, social and psychological consequences of underrepresentation in the fashion industry becomes crucial for both consumer researchers and industry professionals.

Before beauty firms began exporting, each society had a unique perception of beauty, obtained through the years from the traditional views and the physiological characteristics of the people (Yan and Bissell 2014). Beauty and aesthetic perceptions of societies varied considerably over time and between geographies, and thus how cultures enhanced their attractiveness through cosmetics, hairstyles, and clothing was unique. No global perception of what was beautiful existed. For instance, the Korean feminine beauty was to possess an average or even overweight body in size as a symbol of abundance and wealth (Han 2003), while oversized and curvy Hispanic women were valued as fertile and attractive (Cunningham et al. 1995). However, globalization gave rise to the Westernization of beauty by diffusing the Western hygiene practices and beauty ideals. In other words, beauty firms converted societal values into brands, commoditized beauty, and, ultimately, exported those commodities to many other countries, carrying strong assumptions of what is beautiful. The commoditization and marketization of beauty eventually changed societal perceptions of beauty worldwide (Jones 2011).

As Western beauty ideals became globalized, local beauty ideals and practices were abandoned. So, due to their influential, global reach, beauty firms, fashion magazines, and Hollywood remained the trendsetters in fashion and beauty. The concept of "world fashion," which is embedded in Western culture and history, began the global diffusion of ideal beauty standards and the appropriation of Western clothing.

The westernization of fashion and beauty eroded the national beauty standards for women other than Caucasian (Isa and Kramer 2003) and the traditional way of dressing in non-western countries. The overwhelming lack of representation of women who do not possess the qualities that are reflected in the standard definitions and rules of the fashion and beauty industry causes a significant disparity and brings forth huge struggles for minorities.

Since research on issues such as race, ethnicity, gender, physic, and appearance are defined as socially sensitive topics (Renzetti and Lee 1993), qualitative methods, to explore the experiences and subterranean feelings of individuals, were suitable (Liamputtong 2007). A total of 38 semi-structured, open-ended, in-depth interviews were conducted with women from diverse racial and ethnical backgrounds from various cultural environments with different body shapes and sizes to obtain rich insight and thorough understanding of the present phenomenon (Cherrier and Murray 2007).

The findings of this study demonstrate three prominent themes regarding how a diverse group of women read the physiological, societal and psychological consequences of underrepresentation in the fashion industry, based on their everyday fashion experiences. The three implications that are discussed are 1) the fear of social exclusion, 2) body dissatisfaction, body shaming, and self-hatred, and 3) sexism and exoticism from racism.

First, many women who do not have the privilege of getting reaffirmation for their facial and physical features from the fashion media feel that their look is not a kind of beauty that is worth celebrating. The assumption of being perceived as ugly and different leads to the fear of social and romantic discrimination, the lack of access to economic and social power, and, overall, the dismay of social exclusion. The marginalization of women who do not fit into the socially constructed stereotypical images of beauty and fashion damages the self-conception by lowering self-esteem and increasing the feelings of body shame, anxiety, and depression and the fear of social exclusion.

Second, due to the fear of social exclusion, all women, regardless of their race and skin color, strive to change their physical appearances, become estranged from their bodies, and naturalize body shame and self-hatred. The consequences of insecurity and body dysmorphic disorders are devastating for women of minority groups, who are left to feel physically deformed, inadequate, and abnormal.

Third, in the context of fashion, exoticism displays non-White women as objects to be admired, and their racial identities "[become] something to work with, an aesthetic, a quality to be powered up or down," (Wissinger 2015, p. 241). Therefore, the racial identities of non-White models become subjects of Western cultural appropriation, and their races are treated as styling choices, rather than social identities.

Results of this study discuss the physical, social and psychological implications associated with the industry's assumption that fashion becomes aspirational and admirable because it is ultimately unattainable. By showing why representation in every form of beauty is so essential for women's physical, social and emotional well-being, this study acts as a powerful reminder for fashion professionals to promote diversity and for academia to conduct scholarly work on the subject.

REFERENCES

Bartky, S. L. 1997. Foucault, Femininity, and The Modernization of Patriarchal Power. In N. M. Katie Conboy (Ed.), *Writing on the Body: Female Embodiment and Feminist Theory* (Pp. 129-54). New York: Columbia University Press.

Cherrier, H. and J. Murray. 2007. *Reflexive Dispossession and The Self: Constructing A Processual Theory of Identity*. Consumption Markets and Culture*, 10*(1), 1-29.

Cunningham, M. R., Roberts, A. R., Barbee, A. P., Druen, P. B., Wu, C-H. 1995. *Their ideas of Beauty Are, on the Whole, The Same as Ours: Consistency and Variability in The Cross-Cultural Perception of Female Attractiveness.* Journal of Personality and Social Psychology, 68, 261–279.

Han, M. 2003. *Body image Dissatisfaction and Eating Disturbance Among Korean College Female Students: Relationships to Media Exposure, Upward Comparison, and Perceived Reality.* Communication Studies, 54, 65–78.

Isa, M. and E. Kramer. 2003. Adopting the Caucasian "Look": Reorganizing The Minorityfac. In E. M. Kramer (Ed.), *The Emerging Monoculture: Assimilation and the "Model Minority* (Pp. 41-74). Westport, CT: Praeger.

Jones, G. 2011. *Globalization and Beauty: A Historical and Firm Perspective.* Euramerica, 41(4), 885-916.

Kim, Y. 2010. *A Content Analysis of The Normalization of Plastic Surgery in The News: A Comparative Study Between Korea and the US.* Paper Presented at The Annual Meeting of The International Communication Association. Suntec City: Suntec Singapore International Convention and Exhibition Centre.

Liamputtong, P. 2007. *Researching the Vulnerable: A Guide to Sensitive Research Methods.* London: Sage Publications.

Mussell, M. P., R. B. Binford and J. A. Fulkerson. 2000. *Eating Disorders: Summary of Risk Factors, Prevention Programming, and Prevention Research*. Counseling Psychologist, 28, 764–96.

Renzetti, C. M. and R. M. Lee.1993. *Researching Sensitive Topics.* Newbury Park, CA: Sage Publications.

Taylor, P. C. 1999. *Malcolm's Conk and Danto's Colours; Or Four Logical Petitions Concerning Race, Beauty, and Aesthetics.* The Journal of Aesthetics and Art Criticism, 57(1), 16-20.

Wissinger, E. 2015. *This Year's Model: Fashion, Media, and The Making of Glamour.* New York: NYU Press.

Yan, Y. and K. Bissell. 2014. *The Globalization of Beauty: How is Ideal Beauty Influenced by Globally Published Fashion and Beauty Magazines?* Journal of Intercultural Communication Research, 43(3), 194–214.

Giving, Selling or Throwing Away Unused Objects: A Complex Decision

Eva Cerio, IRG, University of Gustave Eiffel, France

EXTENDED ABSTRACT

People have several choices for disposing of their unwanted object: throwing away, giving to charities, selling online or in flea markets. Why are some objects thrown away while others are eligible to reselling? This research exposes explanations of why people choose one of these options, and how they build their disposal practices. Disposition is viewed as all actions taken by an owner towards an unused item (Jacoby, Berning, and Dietvorst 1977) but I focus on practices involving the loss of a physical property - the object is no longer possessed by its owner.

Priori research in disposition identifies motivations of redistributing items instead of throwing them away (Bergadaà, 2006, De Ferran et al., 2020, Guillard and Del Bucchia, 2012; Lemaitre and De Barnier, 2015). Consumers want to reduce waste and preserve the environment – and for some of them, oppose the throwaway society (Ertz et al. 2017, Roux and Guiot 2011). They also reuse their items for saving money, meeting financial needs, or having fun and playing shopkeeper (Juge, Collin-Lachaud, and Roux 2019). Finally, redistributing objects favor social links. Other literature has shed light on several factors influencing disposal practices, such as product-related factors, individual factors, situational factors, and practices-related factors (Albinsson and Perera, 2009, Roster 2001, Paden and Stell 2005, Trudel et al., 2016) but without totally explaining how. This present research focuses on how people decide between disposal practices (online selling, online giving, flea markets, charities' donations, and garbage) and what are their meanings.

To do so, I conducted a 6-months ethnography with diversifying profile, data and collecting tools. The study occurred in Paris, France, from July to December 2019 and followed three steps: three introspective stories, thirteen in depth interviews and four participant-observations. The 2-pages introspective stories were about reselling a phone online, sorting clothing and donating them to a charity. This helped us prepare interviews. Then, a first sample of 13 consumers was interviewed. Nine interviews occurred at participants' home and four over the phone. They lasted 65 minutes on average and were about current objects they want to dispose of: what will they do about it, how and why. We started again with every object they want to cede. Interviews were completed with four participant-observations of sorting with intention to redistribute items: one sorting of clothing by a mom, one sorting of male clothing, one preparation for a move and one deceased person's possessions disposal. Those observations helped to understand choices between disposal practices and decisions regarding specific object. Each observation happened at participants' home and included the author's participation. Using a protocol analysis (Payne, 1976), participants called out any decisions, ideas and thoughts about what they would do with an object. Observations were recorded in notes, instant photos, and audio recording. We took 45 pictures and had seven hours and half of audio recording. I hold a logbook to note field reports and any feelings or theoretical ideas. All the data from interviews, introspective stories and observations were analyzed through a manual thematic analysis (Braun & Clarke, 2006). Several themes emerged for each disposal practices identified; we compared them to identify differences and commonalities.

The findings show that informants dispose of an object when they are not attached to it, do not used it anymore, consider that it takes up too much space or keep it stored for too long. Some consumers need to distance their objects spatially and temporally by stocking them in "cold" places for some time like basements, attics, or closets before to dispose them. This helps them forget about their link with their objects and be ready for disposition. When they agree to cede the object, this latter does not exist anymore for its owner. All participants agree to say that the more an object is affective, the more difficult it is to cede it. That is why they more dispose of everyday objects like clothing, toys or furniture than special ones like gifts, jewelry or family's possessions. We notice a growing interest for online reselling and donation: considered as easy, useful and planet friendly. Participants do not use only one disposal practice but sell, give to charities, or attend a flea market, several times a year. The choice of the most appropriate practice is driven by three dimensions, which are interrelated: (1) a product-related dimension, (2) skills and habits, (3) meanings according to the practice. These dimensions are linked together and the interactions between them influence the decision-making process. For comprehension matter, I will introduce the three dimensions separately.

First, disposal practices are different according to the physical characteristics of the object: the heavier or the more cumbersome or in high volume the object is, the more consumers will try to cede them easily and will give it, thrown away it or attend a flea market. For example, clothing, books, or toys are more often given to charity and relatives than sold. But when the object has emotional value or high market value, consumers will sell it online. Nowadays, consumers use C2C platforms for every type of objects which has a minimum market value, they will try to sell it. They will give objects they failed to sell online or on flea markets. We notice that donation increasingly becomes a fallback solution than the first one. Some intimate-related objects, such as underwear, mattress, or household linen, are more thrown away because of the object's perceived contamination. Besides, participants reuse objects with utilitarian or market value when they throw away worn down or old-fashioned objects.

I also notice that skills and habits matter in the disposition choice. Some people prefer to throw away or give to relatives and charities because they do not feel skilled enough to sell or to give online. It takes efforts to write classified ads and time to be available for answering and meeting. Flea markets require to store all the objects, to get up early, to fill the boxes or to think of all prices. Consumers perceive it as binding. To sell, people need to assess the potential price of the product and to have business skills for negotiating. In line with Denegri-Knott et al. (2009) selling requests a significant investment for maximizing the economic value. As several consumers think they do not have it, they rather give. Giving is based on habits; most of participants are used to give to charities because they saw their parents do it and perpetuate family pattern. Giving to relatives is a rooted behavior because their family does it as well.

Finally, the decision is related to the meanings of the disposal practice. Redistribution practices are considered as means to valuing and passing objects, to reducing environmental impacts and teaching kids the good manners. In this case, consumers prefer giving and selling than throwing away. However, they favor different practice according to what they want. They choose flea markets when they seek a friendly and sharing moment. They give to help citizens and promote social meetings while quickly disposing of bulky objects. Sometimes, not knowing the potential recipient of their object can be hard. Therefore, they favor online giving or relatives 'donation to have a look on the future of the object. For those who prefer to earn money or play shopkeeper, they focus on online selling.

This research makes several theoretical and managerial contributions. If past literature studied factors that influence redistribution instead of garbage (Albinsson and Perera, 2009 ; Paden and Stell, 2005), this research shows that the disposal decision is not only between throwing away or redistributing but also between the type of redistribution practices. I confirm products-related factor such as utilitarian, emotional, and/or financial value (Roster, 2001) but I also show that skills (efforts that need to be made), habits, and meanings need to be considered. This research reveals the complexity of the decision because consumers must deal with different factors to make their choice. Besides, I note an increasing progression of redistribution practice, which is a positive trend for environment. This research gives charities or C2C platforms some foods for thought to better develop their activities. For instance, people might be afraid of what their objects will become by giving them to charities. These later should favor communicate about how the objects will be used in the future. It could also help consumers to detach from their objects. Then, C2C platforms should facilitate the website's use and reassure people about how easy it is to sell or give online – by developing aps for example or guidelines about how to price their products.

REFERENCES

Albinsson, Pia A., and Perera Yasanthi B. (2009), "From trash to treasure and beyond: the meaning of voluntary disposition", *Journal of Consumer Behavior*, 8 (November), 340-353.

Bergadaà, Michelle (2006), «Le don d'objets : Dimensions centrales et profils de donneurs aux oeuvres de bienfaisance», *Recherche et Applications en Marketing*, 21 (March), 1939.

Braun, Virginia and Clarke Victoria (2006), "Using thematic analysis in psychology", *Qualitative Research in Psychology*, 3 (July), 77-101.

De Ferran, Florence, Robinot Elizabeth and Ertz Myriam (2020), "What makes people more willing to dispose of their goods rather than throwing them away?", *Resources, Conservation & Recycling*, 156.

Denegri-Knott, Janice and Molesworth Mike (2009), "'I'll sell this and I'll buy them that' : EBay and the management of possessions as stock", *Journal of Consumer Behaviour*, 8 (November), 305-315.

Ertz, Myriam, Durif, Fabien and Arcand Manon (2017), "Life after death? Study of second life practices", *Journal of Consumer Marketing*, 34 (March), 107-118.

Guillard, Valérie and Del Bucchia Céline (2012), "When Online Recycling Enables Givers to Escape the Tensions of the Gift Economy", *Research in Consumer Behavior*, 14, 47-65.

Jacoby, Jacob, Berning Carol K. and Dietvorst Thomas F. (1977), "What about Disposition?" *Journal of Marketing*, 41 (April), 22-28.

Juge, Elodie, Collin-Lachaud Isabelle and Roux Dominique (2019), «Extension du domaine de l'entrepreneurialité dans la pratique du vide-dressing», *Revue Française de Gestion*, 45 (October), 31-49.

Lemaitre, Nathalie and De Barnier Virginie (2015), «Quand le consommateur devient commerçant : Motivations, production d'expérience et perspectives», *Décisions Marketing*, 78 (April), 11-28.

Paden, Nita and Stell Rowanne (2005), "Consumer Product Redistribution", *Journal of Marketing Channels*, 12 (January), 105-123.

Payne, John W. (1976), "Task Complexity and Contingent Processing in Decision Making: an Information Search and Protocol Analysis", *Organizational Behavior and Human Performance*, 16 (August), 366-387.

Roster, Catherine A. (2001), "Letting Go: The Process and Meaning of Dispossession in the Lives of Consumers", in Advances in Consumer Research, Vol. 28, ed. Mary C. Gilly and Joan Meyers-Levy, GA: Association for Consumer Research, 425-430.

Roux, Dominique and Guiot Denis (2011), "Second-Hand Markets as Alternative Forms Of Retailing", In *Cultural Marketing Management: Strategies and Practices,* ed. Routledge, London, 427-442.

Trudel, Remi, Argo Jennifer J. and Meng Matthew D. (2016), "The Recycled Self: Consumers' Disposal Decisions of Identity-Linked Products", *Journal of Consumer Research*, 43 (August), 246-264.

Embarrassed by Calories: Joint Effect of Calorie Posting and Social Context

Melis Ceylan, Bilkent University, Turkey
Nilufer Z. Aydinoglu, Koc University, Turkey
Vicki G. Morwitz, Columbia University, USA

EXTENDED ABSTRACT

The mandatory posting of calories has been implemented since 2008 to lead consumers to make lower-calorie meal choices (Bollinger, Leslie, and Sorensen 2011). Prior research has shown that the results in regards to the effectiveness of the law are mixed (Krieger and Saelens 2013). For instance, Bollinger and colleagues (2011) showed that after the implementation of a calorie posting law, the average calories per transaction at New York City Starbucks fell by 6%. Contrarily, Elbel and colleagues (2009) did not detect a significant reduction in the total calorie of food purchases in New York City after the labeling mandate had been enacted.

Calorie information is difficult to evaluate (Chandon and Wansink 2007). The ease of use and diagnosticity of a piece of information like dish specific calorie information depends on how knowledgeable an individual is about the value of that attribute (Hsee 1996). Consumers who have a high concern for healthy eating are probably already well-informed about calories. Others may not be motivated to calculate their calorie intake accurately for everyday food consumption. Motivated by this, we argue that calorie posting may not be enough to encourage consumers to make lower-calorie choices unless they order food in the presence of others as social desirability concerns increase in public (White and Dahl 2006). In this research, thus, we examine the joint role of calorie posting and social context to explain these mixed results.

The presence of others at the point of food purchase influences food choice (Herman, Roth and Polivy 2003). For instance, impression management studies show that when individuals have a desire to convey a good self-image, both men and women decrease their food intake. Excessive eaters are usually perceived as heavy and unattractive individuals who do not have any self-control (Vartanian et al. 2007). Thus, eating less help individuals convey a desired self-image (Pliner and Chaiken 1990). Furthermore, Goldfarb and colleagues (2013) found that orders made in a restaurant have fewer calories than orders made through the restaurant's website. Their findings suggest that individuals try to refrain from others' social judgment of their food ordering since orders with high calories can result in negative judgments from others. Ordering food in private lowers the concern of being judged negatively due to a person's food choice and increases consumers' tendency to order high calorie food. Therefore, we formally make the following hypothesis:

Hypothesis 1: *The decrease in the total calorie of consumers' menu selection when calorie information is presented (vs. not) will be larger when the food is ordered in a more social context compared to when it is ordered in more private context.*

Violating social norms on food choice might elicit a potentially uncomfortable social situation as it might generate negative evaluations from others (Herman et al. 2003). The notion that individuals try to avoid those socially uncomfortable situations relies on Goffman's research on embarrassment. According to Goffman (1956), individuals feel embarrassed when the act of presenting a good self-image to others is disrupted. Thus, we predict that ordering excessive calories would increase the feeling of embarrassment when consumers are observed at the point of food purchase. This feeling should be heightened when calorie information is available at the point of

purchase. In order to manage their impressions and avoid the feeling, we posit that they would lower the total calorie of their meal orders. In others words, anticipated feelings of embarrassment due to getting negative evaluations regarding meal choice would enhance the strength of calorie posting in leading consumers to make lower-calorie meal choices in social food ordering context. Therefore, we formally make the following hypotheses:

Hypothesis 2: *The increase in feelings of embarrassment when calorie information is presented (vs. not) will be larger when the food is ordered in a more social context compared to when it is ordered in a more private context.*

Hypothesis 3: *Anticipated embarrassment due to ordering high calorie meal in the more social context will mediate the effect of calorie posting on meal choice.*

Overview Of Studies

We next report the results of four studies with MTurk participants and one restaurant field experiment with actual food choice data. All MTurk studies employ a scenario-based food ordering situation in which we manipulated the menu type as calorie-posted or regular menu and social context as more social or more private. Manipulation checks regarding how private the food ordering context was perceived by participants show that social context manipulation works as intended. Studies 1, 2, and 5 test H1. In these studies, we take the log of the total calorie of meal orders as the dependent variable, as it is not distributed normally; we represent the untransformed (i.e. raw) mean values for ease of interpretation. Study 3 tests H2 and Study 4 tests H3. According to H2 and H3, people will make lower-calorie meal choices from a calorie-posted menu in more social context; and ordering a lower-calorie meal will help them avoid potential embarrassment. This path creates a methodological challenge to show a full-model mediation on total order calories through anticipated embarrassment for two reasons. First, when embarrassment is measured after meal choice, making a lower-calorie meal choice removes or substantially decreases feelings of embarrassment. Second, measuring anticipated embarrassment before meal choice might increase the mediating effect of embarrassment. Thus, neither is a viable option. As a solution, instead of measuring anticipated embarrassment in Studies 1 and 2, we hold total order calories constant across conditions in Study 3 and measure felt embarrassment as an indirect demonstration of the role of anticipated embarrassment in meal choice.

We control for gender, BMI, age, and hunger level in Studies 1-4 as these factors might affect meal choice (Parker and Lehman 2014). Study 3 also controls for impression management concerns as a trait variable (Scheier and Carver 1985) as it measures participants' embarrassment due to ordering excessive calories. Importantly, neither gender nor impression management concerns interacted with calorie posting and social influence in any of the studies.

Study 1

All participants (N=82; 40% women, M_{age}=35) were asked to imagine that they were college students. Participants in more private

(social) context condition ordered food from an online tapas menu when they were alone (together with their recently met roommate) in their dorm room.

The analysis revealed a significant effect of calorie information ($F(1,70)=8.66$, $p<.01$). Calorie posting significantly reduced the total calorie of meal orders ($M_{calorie\_present}=1149.86$; $M_{calorie\_absent}=1608.88$). As expected, the two-way interaction between calorie information and social context was significant ($F(1,70)=3.98$, $p<.05$). In the more social context condition, total meal calories were significantly lower with calorie posting ($M_{calorie\_present}=944.23$; $M_{calorie\_absent}=1709.05$; $F(1,70)=13.57$, $p<.001$). However, in the more private context condition, total calories did not significantly differ between the two menu conditions ($p>.5$).

Study 2

Participants (N=176; 62% women; $M_{age}=39$) imagined that they were a management consultant and they had a meeting with an existing client. We indicated that it was an existing client to rule out the alternative explanation that the first study's results were derived from first impression concerns as participants were instructed to assume that they ordered food with a recently met friend. In this study, participants in the more social (private) context condition imagined that after the meeting it was dinner time and they decided to have dinner together with the client (alone). The analysis revealed a significant effect of calorie information on total calories ordered ($M_{calorie\_present}=2025.33$; $M_{calorie\_absent}=2425.24$; $F(1,165)=9.03$, $p<.01$). Age also had a marginally significant effect on calories ordered ($F(1,165)=2.9$, $p=.09$). As expected, the two-way interaction between calorie information and social context was significant ($F(1,165)=5.80$, $p<.05$). When participants were in the more social context conditions, disclosing calorie information significantly lead participants to make lower-calorie meal choices ($M_{calorie\_present}=1882.50$; $M_{calorie\_absent}=2588.72$; $F(1,165)=13.82$, $p<.001$). However, when participants were in the more private context condition, total calories did not significantly differ between the two menu conditions ($p>.6$).

Study 3

This study (N=128; 37.5% women, $M_{age}=36$) employed a similar scenario used in Study 2. First, all participants read that they were ordering a chicken and biscuits plate and a red velvet cake in the described food ordering scenario. Participants in the calorie-posted condition were informed that the main dish plate had 1800 calories and the dessert had 450 calories. Then, participants indicated their feeling of embarrassment (embarrassed, uncomfortable, and awkward; $\alpha=.97$, Dahl, Manchanda, and Argo 2001) about this experience. This study also controlled for how much participants liked chicken and cake because these might also affect their feelings.

The analysis revealed significant main effects of calorie information ($M_{calorie\_present}=3.87$; $M_{calorie\_absent}=3.04$; $F(1,114)=14.52$, $p<.001$) and social context ($M_{more\_social}=3.86$; $M_{less\_social}=3.12$; $F(1,114)=7.23$, $p<.01$) on embarrassment. Additionally, there were significant effects of liking for chicken ($F(1,114)=5.53$, $p<.05$), liking for red velvet cake ($F(1,114)=4.54$, $p<.05$) and the concern for impression management ($F(1,114)=70.35$, $p<.001$). More importantly, results revealed a marginally significant two-way interaction between calorie information and social context ($F(1,114)=2.85$, $p<.1$). When the context was more social, calorie posting significantly increased participants embarrassment due to ordering a high-calorie meal ($M_{calorie\_present}=4.37$; $M_{calorie\_absent}=3.33$; $F(1,114)=15.44$, $p<.001$). However, when the context was more private, participants' embarrassment did not differ with whether or not calorie counts were posted ($p>.1$).

Study 4

In this study, a one-way (eating alone vs. eating with a client vs. eating with a client w/o having impression management concerns) between-subjects design (N=133; 40% women, $M_{age}=36$) was used. First, participants assumed that they were having a meeting with an existing client. In the first (second and third) condition(s), participants were asked to imagine that after the meeting, they decided to have dinner alone (with their client). Also, participants in the client w/o impression concerns were asked to assume that they have been working with this client for a long time so while hanging out with this person they **do not have to worry about their public image,** they can do whatever they want and they **have no reason to be embarrassed about anything they do.** In the second part of the scenario, participants were asked to indicate how much they like to order a Fettuccini Alfredo chicken platter that contained 2230 calories.

Participants in the client condition indicated a significantly smaller willingness to order the plate than participants in the alone and client with concerns removed conditions ($M_{client}=3.48$; $M_{alone}=4.45$, $F(1,123)=7.77$, $p<.01$; $M_{client\_concerns\_removed}=4.40$; $F(1,123)=6.01$, $p<.05$). Participants in the alone and concerns removed conditions indicated similar willingness toward the platter ($p>.8$). There was also significant effects of liking of Chicken Fettuccine Alfredo ($F(1,123)=43.01$, $p<.0001$). The effects of BMI ($F(1,123)=3.19$, $p<.08$) and hunger level ($F(1,123)=2.87$, $p<.1$) were marginally significant.

Study 5

We collected data (N=546; 56% women, $M_{estimated\_age}=32$) in a time-span of two weeks at a restaurant that sells various kinds of grilled cheese sandwiches and beverages. We used the existing menu of the restaurant for the calorie-absent information condition. For the calorie-present condition, we created new menus that were printed by the typographer the restaurant currently works with. Both menus included the same food items and beverages and used exactly the same layout. The only difference was that the new menus also displayed actual calorie information for each of the items.

In the first (second) week of data collection, we used the original restaurant menus (new menus that displayed the calorie information). Two research assistants (blind to our hypotheses) observed customers' actual food choices in the restaurant. They recorded each customer's individual food order and whether they ate alone or in a group together with their gender, estimated age, estimated body type, date, start time and duration of the meal. We later calculated actual total calories of each customer's food choice based on their recorded orders, to serve as our dependent variable.

Results revealed a significant effect of gender ($M_{women}=668.56$; $M_{men}=788.74$; $F(1,532)=10.91$, $p=.001$). The duration of the meal ($F(1,532)=7.69$, $p<.01$) and age ($F(1,532)=7.90$, $p<.01$) had significant effects. More importantly, there was a significant interaction between menu type and social context ($F(1,532)=6.68$, $p=.01$). When customers ordered food alone, there was no significant difference in total meal calories whether or not calories were posted ($p>.1$). In contrast, when participants ordered food with others, total meal calories were significantly lower when calories were posted than when they were not ($M_{calorie\_absent}=762.23$, $M_{calorie\_present}=684.00$, $F(1,532)=11.03$, $p=.001$).

General Discussion

In this paper, we examined the joint effect of calorie posting and social context on consumers' food choices and feeling of embarrassment about ordering excessive calories. To the best of our best knowledge, there is no research in the literature that has investigated

this interactive effect to understand the effectiveness of calorie posting laws.

Studies 1, 2, and 5 demonstrated that calorie posting is effective in lowering the total calorie of meal choices only when the context is social. Study 3 showed that calorie posting leads to significantly higher embarrassment in the case of ordering excessive calories only when the context is more social. Study 4 found that when the fear of being embarrassed is removed from a social food ordering context, consumers' willingness to order a high-calorie meal in the presence of others becomes as high as their willingness to order the same meal in the absence of others. These results demonstrate that the social nature of a food ordering occasion increases the effectiveness of calorie posting. Calorie posting further highlights the inappropriateness of a meal choice and causes embarrassment if excessive calories are ordered in the presence of others. Therefore, this research contributes to the food choice research by showing under what conditions consumers become more motivated to process and integrate calorie information presented on menus into their food choice process.

Additionally, the results indicate that impression management concerns have a substantial role in enhancing the effectiveness of calorie posting on food choice. Thus, this research contributes to the embarrassment research. Embarrassment has mainly been studied as an emotion that occurs after more severe social norm transgressions such as making a body sound in public. However, we show that a relatively subtle transgression like ordering a high-calorie meal might increase the same feeling and affect subsequent behavior. Thus, a negative and aversive self-conscious emotion like consumer embarrassment can enhance self-control and increase well-being by encouraging consumers to make more informed food choices.

Motivated by our findings, we recommend policy makers to think about enhancing social aspects of a private dining experience to increase the effectiveness of calorie posting. People share hundreds of millions of photos every year on Instagram with using hashtag 'food' (Batat et al. 2019). Aesthetically served food increases consumers' pleasure and encourages them to share a moment from their dining experience with their followers on social media (Batat et al. 2019). We posit that aesthetically pleasing presentations of lower-calorie meal together with attractive hashtags designed for each lower-calorie food item on a menu can increase consumers' pleasure and lead them to share the picture of their meal on their social media. This can turn a private dining experience into a social experience by encouraging consumers to share pictures of their lower-calorie meals on their social media accounts.

REFERENCES

Batat, Wided, Paula C. Peter, Emily M. Moscato, Iana A. Castro, Steven Chan, Sunaina Chugani, and Adrienne Muldrow (2019), "The Experiential Pleasure of Food: A Savoring Journey to Food Well-being," *Journal of Business Research*, 100, 392-399.

Bollinger, Bryan, Phillip Leslie, and Alan Sorensen (2011), "Calorie Posting in Chain Restaurants," *American Economic Journal: Economic Policy,* 3 (1), 91-128.

Chandon, Pierre and Brian Wansink (2007), "The Biasing Health Halos of Fast Food Restaurant Health Claims: Lower Calorie Estimates and Higher Side-Dish Consumption Intentions," *Journal of Consumer Research*, 34 (October), 301–314.

Dahl Darren, W., Rajesh V. Manchanda, and Jennifer J. Argo (2001), "Embarrassment in Consumer Purchase: The Roles of Social Presence and Purchase Familiarity," *Journal of Consumer Research,* 28 (3), 473-481.

Elbel, Brian, Rogan Kersh, Victoria L. Brescoll, and L. Beth Dixon (2009), "Calorie Labeling and Food Choices: a first Look at the Effects on Low-income People in New York City," *Health Affairs (Millwood)*, 28 (6), 1110–21

Goffman, Erving (1956), "Embarrassment and Social Organization," *American Journal of Sociology,* 62 (3), 264-71.

Goldfarb, Avi, McDevitt Ryan, Samila Sampsa, and Silvermen Brian (2013), "The Effect of Social Interaction on Economic Transactions: An Embarrassment of Niches?," *AEA Annual Meeting*.

Herman, C. Peter, Deborah A. Roth, and Janet Polivy (2003), "Effects of the Presence of Others on Food Intake: A normative Interpretation," *Psychological Bulletin*, 129 (6), 873-86

Hsee, Christopher K. (1996), "The Evaluability Hypothesis: An Explanation for Preference Reversals between Joint and Separate Evaluations of Alternatives," *Organizational Behavior and Human Decision Processes*, 67 (September), 247–57.

Krieger, James and Brian E. Saelens (2013), "Impact of Menu Labeling on Consumer Behavior: A 2008–2012 Update," *Eating Healthy Research*, [available at http://www.rwjf.org/content/dam/farm/reports/reports/2013/rwjf406357/].

Parker, Jeffrey R. and Donald R. Lehmann (2014), "How and When Grouping Low-Calorie Options Reduces the Benefits of Providing Dish-Specific Calorie Information," *Journal of Consumer Research*, 41 (1), 213-235.

Pliner, Patricia, Shelly Chaiken, and Gordon L. Flett (1990), "Eating, Social Motives, and Self-presentation in Women and Men," *Journal of Experimental Social Psychology,* 26, 240–254

Scheier, Michael F. and Charles S. Carver (1985), "The Self-consciousness Scale: A Revised Version for use with General Populations," *Journal of Applied Social Psychology*, 15 (8), 687-699.

Vartanian, Lenny R., C. Peter Herman, and Janet Polivy (2007), "Consumption Stereotypes and Impression Management: How You are What You Eat." *Appetite*, 48 (3), 265-277.

White, Katherine, and Darren W. Dahl. (2006), "To Be or Not Be? The Influence of Dissociative Reference Groups on Consumer Preferences," *Journal of Consumer Psychology,* 16 (4), 404-414.

The Disposal Consideration Effect: How Thoughts of Disposal Influence Product Acquisition

Sylvia S. Chang, University of Washington, USA
Nidhi Agrawal, University of Washington, USA

EXTENDED ABSTRACT

Consumer behavior is defined as "acquisition, consumption, and disposition of goods, services, time, and ideas by decision-making units" (Jacoby, Berning, and Dietvorst 1977, 22), and as such, disposal constitutes a key aspect of consumption. Current research extends the understanding of disposal considerations on consumer decision-making by examining how disposal considerations influence product acquisition decisions. While past research on disposal has primarily sought to understand the role of product features on consumers' product disposal decisions (Trudel and Argo 2013; Trudel, Argo, and Meng 2016; Winterich, Reczek, Irwin 2017), our research illuminates the psychology of disposal by examining how the consideration of disposing a product influences consumers' willingness to acquire the product.

We argue that when people think about disposing a product, they will experience a sense of loss as they imagine throwing away the product. Building on mere ownership effect and endowment effect literature (Brasel and Gips 2014; Chatterjee, Irmak, and Rose 2013; Shu and Peck 2011), we propose that consumers who consider the process of disposing a product presumably see it from the perspective of owning it. Hence, the consideration of disposal will result in feelings of loss. This sense of loss then tells consumers that the product under consideration is one that is linked to their sense of self. Indeed, past research suggests that people extend their self-concepts to include their valued possessions and close others, and losing a valued product is equivalent to losing a part of oneself (Ahuvia 2005; Aron, Aron, and Smollan 1992; Belk 1988). Accordingly, we predict that the sense of loss experienced in imagining disposing the product will lead consumers to infer a link between the self and the product. Putting these insights together, we propose that thinking about product disposal at the time of product acquisition will lead to a higher sense of loss, which in turn will highlight the possession-self link, resulting in higher purchase likelihood.

We further test our theoretical links by examining factors that might influence the extent to which consumers feel a sense of loss while considering the disposal of a product. Based on past research that individual differences exist in the degree to which possessions are used to define one's sense of self, we propose that people who are not strongly tied to their possessions (i.e., have a low self-extension tendency; Ferraro, Escalas, and Bettman 2010), should be less impacted by considering disposing a product. Therefore, we predict that self-extension tendency will moderate whether disposal considerations will influence consumers' product acquisition. Additionally, building on the literature on temporal selves, we argue that people who have difficulty in connecting to their future self (i.e., have a low future-self-continuity; Ersner-Hershfield et al. 2009), should be less likely to feel a sense of loss at the prospect of disposing a possession at a future time. Hence, we expect that future-self continuity will be another moderating variable by influencing whether consumers feel a sense of loss in considering product disposal. We test our predictions across four studies and three product categories.

Study 1 (N = 161) provided initial support for our disposal consideration effect and began with disposal consideration manipulation, where participants in the disposal condition were asked to write about their thoughts and feelings related to disposing a tablet, whereas those in the control condition wrote about the general pros and cons of purchasing the tablet. Next, participants were asked to respond to our dependent measure of likelihood to purchase the tablet (1 = not likely at all, 7 = very likely). The results indicated a significant effect of disposal consideration, with those in the disposal condition (M = 4.88, SD = 1.52) more likely to purchase the tablet compared to those in the control condition (M = 4.35, SD = 1.62), F(1, 159) = 4.52, p = .035.

Study 2 (N = 179) replicated study 1 findings as well as demonstrate that feelings of loss and possession-self link serially mediate the disposal consideration effect, b = .23, SE = .07, 95% CI [.11, .38]. Thinking about product disposal led individuals to feel a sense of loss, which in turn indicated that the product is tied to their sense of self, and ultimately influencing their purchase intentions.

Study 3 (N = 303) demonstrated a boundary condition for the disposal consideration effect, self-extension tendency of using possessions to define one's sense of self, B = .24, SE = .08, t = 3.26, p = .004. For individuals who are high on self-extension tendency, thinking about disposing a painting led them to want the painting more, replicating our disposal consideration effect. But for individuals who are low on self-extension tendency and thus do not use possessions in conceptualizing who they are, thinking about disposing the painting did not have an effect in terms of purchasing the painting.

Study 4 (N = 250) demonstrated another boundary condition for the disposal consideration effect, of how connected individuals perceive their future selves to be in relation to their current selves, B = .59, SE = .23, t = 2.60, p = .010. For individuals who are high on future self-continuity, thinking about disposing a CD set increased their purchase likelihood, replicating our disposal consideration effect. However, for individuals who do not have a sense of continuity to their future selves (i.e., low on future self-continuity), thinking about disposing the CD set had no effect on purchase likelihood.

In documenting a novel effect of considering product disposal on product acquisition decisions, our research makes several theoretical contributions. First, our work extends the product disposal literature in showing that disposal considerations influence consumer decisions before the disposal phase. We also advance understanding of how feelings of loss shape consumer decision-making in showing that feelings of loss increases willingness to acquire a product. Lastly, we enrich work on how the link between consumers' sense of self and their products influence their consumption decisions by demonstrating that thoughts about disposal make the link between the consumer and the possession more salient through feelings of loss.

REFERENCES

Ahuvia, A. C. (2005). Beyond the extended self: Loved objects and consumers' identity narratives. *Journal of Consumer Research*, *32*(1), 171-184.

Aron, Arthur, Elaine N. Aron, and Danny Smollan (1992), "Inclusion of other in the self scale and the structure of interpersonal closeness," *Journal of Personality and Social Psychology,* 63 (4), 596-612.

Belk, Russell W (1988), "Possessions and the extended self," *Journal of Consumer Research,* 15 (2), 139-168.

Brasel, S. A., & Gips, J. (2014). Tablets, touchscreens, and touchpads: How varying touch interfaces trigger psychological ownership and endowment. *Journal of Consumer Psychology*, *24*(2), 226-233.

Chatterjee, Promothesh, Caglar Irmak, and Randall L. Rose (2013), "The endowment effect as self-enhancement in response to threat," *Journal of Consumer Research,* 40 (3). 460-476.

Ersner-Hershfield, H., Garton, M. T., Ballard, K., Samanez-Larkin, G. R., & Knutson, B. (2009). Don't stop thinking about tomorrow: Individual differences in future self-continuity account for saving. *Judgment and Decision Making*, 4(4), 280-286.

Ferraro, Rosellina, Jennifer Edson Escalas, and James R. Bettman (2010), "Our possessions, our selves: Domains of self-worth and the possession–self link." *Journal of Consumer Psychology,* 21 (2), 169-177.

Jacoby, Jacob, Carol K. Berning, and Thomas F. Dietvorst (1977), "What about disposition?," *Journal of Marketing,* 41 (2), 22-28.

Shu, Suzanne B., and Joann Peck (2011), "Psychological ownership and affective reaction: Emotional attachment process variables and the endowment effect." *Journal of Consumer Psychology,* 21 (4), 439-452.

Trudel, Remi, and Jennifer J. Argo (2013), "The effect of product size and form distortion on consumer recycling behavior," *Journal of Consumer Research,* 40 (4), 632-643.

Trudel, Remi, Jennifer J. Argo, and Matthew D. Meng (2016), "The recycled self: consumers' disposal decisions of identity-linked products," *Journal of Consumer Research,* 43 (2), 246-264.

Winterich, Karen Page, Rebecca Walker Reczek, and Julie R. Irwin (2017), "Keeping the memory but not the possession: memory preservation mitigates identity loss from product disposition," *Journal of Marketing,* 81 (5), 104-120.

Give a "Hand"! How Giver/Receiver Hand Image Affects Consumer Charitable Behavior

Chun-Tuan Chang, National Sun Yat-sen University, Taiwan
Hsiao-Ching Lee, National Kaohsiung University of Science and Technology, Taiwan
Yi-Jing Chen, National Sun Yat-sen University, Taiwan
Chia-Han Chang, National Sun Yat-sen University, Taiwan

EXTENDED ABSTRACT

Images of hands are commonly used in charity advertising to demonstrate the importance of helping behavior and then promote charitable donation behaviors. Observations from massive amount of ads suggest numerous ways to present a giver's hand and a receiver's hand. Receivers (beneficiaries) may be humans (e.g., children or elder people in need) or non-humans (e.g., animals). A common way is to present a giver's hand in an upper position and a receiver's hand in a lower position (called as giver's hand up hereafter). On the other hand, some advertisers choose to present a receiver's hand over a giver's hand (called as giver's hand down hereafter).

Researchers have conceptualized power and dominance link to the vertical metaphor (Lakoff and Johnson, 1980). Drawing on the conceptual metaphor theory, we propose that the hand positions of a giver's hand together with a receiver's hand may generate different metaphoric associations. People metaphorically link power with high vertical positions and think of powerlessness in terms of low vertical positions (Koo and Im, 2019; Schubert, 2005).

We propose that hand images can evoke conceptual metaphors in charity advertising. Showing a giver's hand in an upper position relative a receiver's hand makes the giver look stronger, more dominant, and assertive, and taking control of the encounter. This will facilitate the metaphor of "power-is-up," and increase the perceive power and status of a giver. Such perceived power will lead to perceived inequality. Perceived inequity from the image of a giver's hand up will enhance givers' perceived competence. On the other hand, showing a giver's hand down will not make donors feel powerful. Inequality will be less likely to be evoked. Perceived competence will not occur. Nevertheless, the down position of a giver's hand will make the psychological distance between the giver and the receiver closer. Submissive and equal feelings will occur. Givers will tend to feel warm regarding the giving behavior. The warm concerns will then prompt charitable giving behaviors.

In addition, hand gestures play an important role in human communication (Church, Alibali, and Kelly, 2017). Hand gestures serve to increase activation on items in their mental lexicons, therefore facilitating lexical access (Krauss, Chen, and Gottesman, 2000). Pease and Pease (2006) suggested that hands can signal as authority, control-taking, and threatening feelings which are associated with the conceptual metaphor of power. A grabbing gesture shows a palm down, and people project immediate authority. In charity advertising, an image of a giver's hand grabbing a receiver's hand can reinforce the giver's power in the giver-receiver relationship. The conceptual metaphor of "power" shown by a grabbing gesture will be congruent with the image of giver's hand up. On the other hand, a holding gesture is the giver's palm facing up, which is used as a submissive, non-threatening gesture. The receiver will not feel pressured into the relationship and are unlikely to feel threatened by the giver (Pease and Pease, 2006). The palm-up makes people feel equal for the statuses of the giver and the receiver, and promote the closeness between them. It is thus expected that the conceptual metaphor shown by a holding gesture will be congruent with the image of giver's hand down.

Three experiments were conducted. Study 1 was to understand consumers' feeling (e.g., perceived competence and warmth) about the donor's hand position. A two conditions (hand position: a giver's hand up vs. a giver's hand down) between-subjects experimental design was conducted with helping elderly living alone as Stimuli. The aim of Study 2 was to examine the interactive effect of hand position and hand gesture on donate intention. A 2 (hand position: a giver's hand up vs. a giver's hand down) x 2 (hand gesture: holding vs. grabbing) between-subjects design was conducted used dogs as receiver. Study 3 examines the mediation effects of perceived competence and warmth between the interaction of hand position and hand gesture on willingness to donate (WTD). A 2 (hand position: a giver's hand up vs. a giver's hand down) x 2 (hand gesture: holding vs. grabbing) between-subjects design was conducted with helping abused children as Stimuli. We found that the participants perceived higher competence when the giver's hand up (vs. hand down), whereas the participants perceived higher warmth when the giver's hand down (vs. hand up). Furthermore, a grabbing gesture is more persuasive than a holding gesture when presenting a giver's hand up. A holding gesture (vs. grabbing gesture) works better when presenting a giver's hand down. Finally, in the grabbing gesture condition, the indirect effect of the two-way interaction on WTD was through perceived competence, but not through perceived warmth. In the holding gesture condition, the indirect effect of the interaction on WTD was through perceived warmth but not though perceived competence.

Our findings have theoretical contributions. First, drawing on and extending the research on conceptual metaphor theory, our study demonstrates that images of hand shown in charity advertising can affect people's perceptions and behaviors. Second, this research contributes to the power literature by displaying hand position and hand gesture to enhance or reduce power perceptions. Third, conceptual fluency can be maximized by either increasing perceived competence or warmth subject to the combination of hand position and hand gesture.

REFERENCES

Church, R. Breckinridge, Martha W. Alibali, and Spencer D. Kelly (2017), Why Gesture? How the Hands Function in Speaking, Thinking and Communicating, John Benjamins Publishing Company.

Koo, Jayoung, and Hyunjoo Im (2019), "Going Up or Down? Effects of Power Deprivation on Luxury Consumption," *Journal of Retailing and Consumer Services*, 51, 443-449

Krauss, Robert M., Yihsiu Chen, and Rebecca F. Gottesman (2000), "13 Lexical Gestures and Lexical Access: A Process," *Language and Gesture*, 2, 261-282.

Lakoff, George, and Mark Johnson (1980), "The Metaphorical Structure of the Human Conceptual System," *Cognitive Science*, 4(2), 195-208.

Pease, Barbara, and Allan Pease (2006), *The Definitive Book of Body Language: The Hidden Meaning behind People's Gestures and Expressions*. New York, NY: Bantam Press.

Schubert, Thomas W. (2005), "Your Highness: Vertical Positions as Perceptual Symbols of Power," *Journal of Personality and Social Psychology*, 89(1), 1-21.

Care in Consumption

Andreas Chatzidakis, Royal Holloway University of London, UK
Giana Eckhardt, Royal Holloway University of London, UK
Katharina Husemann, Royal Holloway University of London, UK

EXTENDED ABSTRACT

We are in the midst of an unprecedented "crisis of care," for both people and the planet. There is widespread acknowledgment, from sources as diverse as the World Economic Forum, Extinction Rebellion, and pundits such as Naomi Klein (*On Fire,* 2019) that the earth is in a state of emergency, and urgent action is needed for society not to fall into collapse. Influential academics such as Nancy Fraser (2016) have referred to the current societal and environmental crisis as a systemic failure of care. The consumer's prominence in popular culture discourses of care has also been high; veganism, for example, is framed as a way individuals can express their care for the environment, and has resulted in fast food chains such as Subway, KFC and Burger King launching high profile vegan options.

Meanwhile, care is increasingly marketized and commoditised, from the growth of the wellness and self-care industries to new platforms such as www.care.com. The need to care, and for it to be offered via commercial services, is becoming more prominent. Because of the socially accelerated nature of contemporary modernity (Husemann and Eckhardt 2019), consumers no longer have time to provide intimate, non-market mediated care for their loved ones. Thus, care is outsourced. While care for others or for oneself have always existed, we are currently seeing a marked rise in market-mediated care in consumption.

Yet, the full theoretical scope of what care can mean for consumption has yet to be explored. Although implicit references to care are commonly made within various consumer studies (Shaw, McMaster and Newholm, 2016), more explicit understandings fall within three relatively small traditions including the role of care in therapeutic (e.g. Tian et al. 2014; Mittal and Griskevicius, 2016) and familial settings (e.g. Epp and Valagaleti, 2014) as well as within ethical consumption (e.g. Chatzidakis et al. 2018). While these studies have usefully increased understanding of health care provision, family dynamics and how consumers' morality can be informed by a care ethic, we suggest that care can be understood at a more fundamental level within consumer research.

Based on a review of care across disciplines, we build on care theory (Tronto and Fisher, 1990; Tronto, 2020; Eisler, 2008) to define care in consumption as everything consumers do to cultivate, maintain or redress the wellbeing of themselves, others or the environment. We foreground *care as an organizing perspective*, which allows us to see consumption in a new theoretical light. That is, care is not a motivator or variable which fluctuates among consumers (as in the consumer ethics and family consumption literatures, where some consumers are more caring than others; e.g. Shaw, Carrington and Chatzidakis, 2016; Epp and Valagaleti 2014). Rather, care entails everything that ensures our welfare and enables our flourishing (e.g. from a safe and loving home to high quality care in education and health sectors) across different scales of everyday activity, from the home to the local to the national to transnational (e.g. Chatzidakis et al., 2020). Care in consumption has three characteristics: interdependence, vulnerability and ambivalence. The care diamond, which is a prominent conceptual framework within care economics, introduced by Shahra Razavi (2007), captures this broadening of care systematically and explains how care, in any given society, is provisioned by four key pillars: families, communities (including voluntary and non-profit sectors), markets, and states. According to this model, every care need an individual has is addressed (whether paid or unpaid) by one or a combination of all four.

We build on the care diamond to develop a model of care in consumption which makes the market a more central pillar. Our rationale is that beyond individual country differences, markets and logics of marketization have consistently played a far more central role in care provision across the global North (e.g. Farris and Marchetti, 2017). That is, markets are not simply one among four pillars that consumers access. Rather, over the last four decades, markets have (also) infiltrated the traditional spaces and underlying logics of the other three pillars by introducing buyer-seller relationships and market-like mechanisms.

A broadened conceptualisation of care in consumption that highlights both the central role of markets and the dynamics and contradictions entailed in consuming marketized familial, community and state care provision will help consumer researchers to contribute to the multidisciplinary conversation on care as it relates to environmental and social concerns; and to develop consumption-specific understandings of how care manifests in the market. In particular, we make the following contributions to consumer research and marketing thought.

Understanding consumption from a caring perspective allows us to challenge and move forward well-established domains in consumer research. We push current understandings of the sovereign consumer by illustrating how interdependency underpins any type of consumption activity, reliant as it is on dynamic reconfigurations of familial, community, market and state provision. Our care perspective also challenges current conceptualizations of the vulnerable consumer as restricted to particular demographic segments (Baker et al., 2005; Hill and Stamey, 1990) or critical episodes (Humphreys and Thompson, 2014). In contrast, a caring perspective emphasises the latency of vulnerability: all consumers are potentially vulnerable at all times but whether they experience their vulnerabilities depends on the depth and breadth of their care provision, or lack thereof. Finally, we also contribute to literature on consumer ambivalence (Otnes et al., 1997; Sipilä et al., 2018) by foregrounding a more profound and stubbornly pervasive role for ambivalence. It is inherent to all consumer caring relationships and practices and can be particularly unpleasant, daunting and exhausting.

By examining the broader role of care in consumption, we also offer a series of public policy implications, both with respect to the central role of markets and consumption in enabling and undermining specific forms of care, and the dynamics and contradictions entailed in marketizing familial, community and state care provision.

REFERENCES

Arnould, Eric and Julien Cayla (2015), "Consumer Fetish: Commercial Ethnography and the Sovereign Consumer," *Organization Studies,* 36(10), 1361–1386.

Aulenbacher, Brigitte, Helma Lutz and Birgit Riegraf, B. (2018). „Introduction: Towards a global sociology of care and care work,", *Current Sociology,* 66(4), 495-502.

Baker, Stacey Menzel, Debra L. Stephens, and Ronald P. Hill (2001), "Marketplace Experiences of Consumers with Visual Impairments: Beyond the Americans with Disabilities Act," *Journal of Public Policy & Marketing*, 20(2), 215–224.

Baker, Stacey Menzel, James W. Gentry, and Terri L. Rittenburg (2005), "Building Understanding of the Domain of Consumer Vulnerability," *Journal of Macromarketing,* 25(2), 128–139.

Belk, Russell (2010), "Sharing," *Journal of Consumer Research* 36 (5), 715-734.

Belk, Russell. and Llamas, R. (2012), "The nature and effects of sharing in consumer behavior", in Mick, D.G., Pettigrew, S., Pechmann, C.C. and Ozanne, J.L. (Eds),Transformative Consumer Research for Personal and Collective Well-Being, Routledge, New York, NY, pp. 625-664.

Bone, Sterling A., Glenn L. Christensen, and Jerome D. Williams (2014), "Rejected, Shackled, and Alone: The Impact of Systemic Restricted Choice on Minority Consumers' Construction of Self," *Journal of Consumer Research,* 41(2), 451–474.

Bowlby, Sophie (2012), "Recognising the Time—Space Dimensions of Care: Caringscapes and Carescapes," *Environment and Planning A*, 44(9), 2101–2118.

Butler, Judith. (2020). *The Force of Nonviolence: The Ethical in the Political*. Verso Books.

Chatzidakis, Andreas, Jamie Hakim, Jo Littler, Catherine Rottenberg and Lynne Segal and (2020), *The Care Manifesto,* London: Verso.

Chatzidakis, Andreas, Deidre Shaw, and Matthew Allen (2019), "A Psycho-Social Approach to Consumer Ethics," *Journal of Consumer Culture*, 1469540518773815.

Dalai Lama (2015), "Foreword", in *Caring Economics,* Tania Singer and Matthieu Ricard (eds), New York: Picador, pgs ix – 1.

Dowling, Emma. (2020). *Care: The Political Economy of Intimacy*. London: Verso.

Eckhardt, Giana M. and Susan Dobscha (2019), "The Consumer Experience of Responsibilization: The Case of Panera Cares," *Journal of Business Ethics,* 159(3), 651–663.

Edgar, Iain R and Andrew Russell (Eds.). (1998). *The anthropology of welfare*. London and New York: Routledge.

Eisler, Riane (2008), *The Real Wealth of Nations: Creating a Caring Economics*. San Francisco, CA: Berrett-Koehler Publishers.

Federici, Sylvia (2012). *Revolution at point zero: Housework, reproduction, and feminist struggle*. Brooklyn, NY: PM press.

Folbre, Nancy (2001). *The invisible heart: Economics and family values*. New York: New Press.

Fraser, Nancy (2016), "Capitalism's Crisis of Care," *Dissent*, *63*(4), 30–37.

Giesler, Markus and Ela Veresiu (2014), "Creating the Responsible Consumer: Moralistic Governance Regimes and Consumer Subjectivity," *Journal of Consumer Research, 41*(3), 840–857.

Gilligan, Carol. (1993). *In a different voice: Psychological theory and women's development*. Harvard: Harvard University Press.

Heath, Teresa, Lisa O'Malley, Matthew Heath and Vicky Story (2016), "Caring and Conflicted: Mothers' Ethical Judgments about Consumption. *Journal of Business Ethics*, 136(2), 237–250.

Hill, Ronald P. and Mark Stamey (1990), "The Homeless in America: An Examination of Possessions and Consumption Behaviors," *Journal of Consumer Research,* 17(3), 303–321.

Hirschman, Elisabeth C. (1991). Presidential Address Secular Mortality and the Dark Side of Consumer Behavior: Or How Semiotics Saved My Life. *ACR North American Advances,* 18, 1-4.

Hochschild, Arlie R. (2010), "Global care chains and emotional surplus value" In *On the Edge: Living with Global Capitalism* (eds. Will Hutton and Anthony Giddens), LondonL Jonathan Cape (pp. 130–146).

Hollway, Wendy (2007), *The capacity to care: Gender and ethical subjectivity*. London: Routledge.

Horton, Amy (2019), "Financialization and Non-Disposable Women: Real Estate, Debt and Labour in UK Care Homes," *Environment and Planning A: Economy and Space*, 0308518X19862580.

Humphreys, Ashlee and Craig J. Thompson (2014), "Branding Disaster: Reestablishing Trust through the Ideological Containment of Systemic Risk Anxieties," *Journal of Consumer Research,* 41(4), 877–910.

Jenner, Elizabeth A. (2008), "Unsettled Borders of Care: Medical Tourism as a New Dimension in America's Health Care Crisis," *Res Soc Health Care*, 26, 235–149.

Karanika, Katerina and Margaret Hogg (2016), "Consumption Through the Ambivalent Prism of Intergenerational Support", *European Journal of Marketing*, 50(3/4) 575–601.

Klein, Naomi, (2019). *On Fire: The (burning) Case for a Green New Deal*, New York: Simon & Schuster.

Miller, Danny (1998). *A Theory of Shopping*, Cambridge, UK: Polity Press.

Morgan, Kevin (2010), "Local and Green, Global and Fair: the Ethical Foodscape and the Politics of Care," *Environment and Planning A*, *42*(8), 1852–1867.

Moschis, George P. (2017), "Research Frontiers on the Dark Side of Consumer Behaviour: The Case of Materialism and Compulsive Buying," *Journal of Marketing Management*, *33*(15-16), 1384–1401.

Nelson, Julie A. (2010). The relational economy: A Buddhist and feminist analysis. *Global Development and Enviroment Institute Working Paper* 10-03.

Noddings, Neil (2012), "The Language of Care Ethics," *Knowledge Quest*, *40*(5), 52–57.

Olsen, Niklas (2019), *The Sovereign Consumer,* New York: Palgrave.

Otnes, Cele, Tina M. Lowrey and L. J. Shrum (1997), "Toward an Understanding of Consumer Ambivalence," *Journal of Consumer Research*, *24*(1), 80–93.

Parker, Rozsika (2005). *Torn in two: The experience of maternal ambivalence*. London: Virago.

Phillips, Adam (2015). "Against Self-Criticism"*, London Review of Books,* 37(5), 13-16.

Ruddick, Sara (1980). Maternal thinking, *Feminist Studies,* 6(2), 342-367.

Scuzzarello, Sara, Catarina Kinnvall, and Kristen, R. Monroe, (2009). *On behalf of others: The psychology of care in a global world*. Oxford, UK: Oxford University Press.

Shaw, Deirdre Carrington, Michal, & Chatzidakis, Andreas (Eds.). (2016). *Ethics and morality in consumption: interdisciplinary perspectives*. London: Routledge.

Sipilä, Jenni, Anssi Tarkiainen and Sanna Sundqvist (2018), "Toward an Improved Conceptual Understanding of Consumer Ambivalence," *AMS Review*, *8*(3-4), 147–162.

Skeggs, Bev (2014), "Values Beyond Value? Is Anything Beyond the Logic of Capital?," *The British Journal of Sociology*, *65*(1), 1–20.

Striphas, Ted (2019). "Caring for Cultural Studies", *Cultural Studies*, 33:1, 1-18,

Thompson, Craig J. (1996). Caring consumers: Gendered consumption meanings and the juggling lifestyle. *Journal of consumer research*, *22*(4), 388-407

Tronto, Joan C and Berenice Fisher (1990) "Toward a feminist theory of caring", In Emily K. Abel and Margaret K. Nelson (eds), *Circles of care,* Albany NY: SUNY Press (pp. 36-54).

Tronto, Joan C. (1993). *Moral boundaries: A political argument for an ethic of care*. New York and London: Routledge.

Tronto, Joan C. (2013). *Caring democracy: Markets, equality, and justice*, New York and London: NYU Press

Vargo, Stephen, L. (2019). "Moving forward…." *AMS Review*, 9(3-4), 133-135.

Yadav Manjit, S. (2018), "Making emerging phenomena a research priority". *Journal of the Academy of Marketing Science* 46: 361–365.

Yeates, Nicola, (2009). *Globalizing care economies and migrant workers: Explorations in global care chains*. Basingstoke, UK: Palgrave Macmillan.

The Hidden Cost of Conspicuous Consumption for Job Applicants

Charlene Y Chen, Nanyang Technological University, Singapore
Andy J Yap, INSEAD, Singapore
Stefan J Thau, INSEAD, Singapore

EXTENDED ABSTRACT

This research shows that job applicants are less likely to be hired when they conspicuously consume because they are seen as having lower need for the job and therefore less motivated to work hard. The effect is mitigated when the job is high-status and when applicants' high motivation is signaled.

Conspicuous consumption refers to the consumption of luxury goods that, intentionally or inherently, signal one's desire for superior social status (Bagwell & Bernheim, 1996; Veblen, 1899). Our research examines the effects of conspicuous consumption by job candidates on their hiring outcomes (person-to-job fit, hirability). Examining this question is important for several reasons. There is an intimate connection between consumption and work. Most people work to earn money, and people need money for consumption. In turn, consumption experiences are then shared with social systems consumers interact with (e.g. family, workplaces, clubs). It is noteworthy that the intersection between work and consumption has received little attention while for example, the intersection between work and family, and the problems that come with it, has defined an entire stream of research in organizational behavior. People often communicate a preference for luxury goods by, for example, wearing expensive clothes and watches, posting pictures of themselves and their luxury possessions on social media, and talking about high-end vacations experiences. Job candidates are no exception. Indeed, entire discussion threads in online forums (e.g., Quora, 2017; Reddit, 2016; Rolexforums, 2009) are dedicated to debates on what to wear to job interviews and which brands make more positive impressions on employers. In a pilot study we found that more than a third of the participants chose to display conspicuous consumption at job interviews.

The lack of attention on conspicuous consumption and its effects for interactions with organizations is also surprising because conspicuous consumption is becoming more widespread. Materialism—the importance placed on wealth and conspicuous consumption—is at historically high levels, especially among millennials (Twenge & Kasser, 2013) who are now the largest generation in the US labor force (Fry, 2018). Finally, compared to other goods, luxury goods are more salient to people because these goods tend to be costly and not everyone can afford them (Bagwell & Bernheim, 1996; Veblen, 1899). Hence, conspicuous consumption is likely to draw the attention of social observers, especially those who are seeking to form social impressions of others (Fiske & Taylor, 2013). This makes it very likely that decision makers will attend to conspicuous consumption by job candidates and use this in their evaluation. Overall, it is important to address if conspicuous consumption by job candidates have a positive or negative impact on their job-seeking outcomes.

Why would job candidates engage in conspicuous consumption? Are there any benefits from doing so? Research suggests that people often use consumption as a means to communicate a desired identity and a positive impression to others (Aspers & Godart, 2013; Belk, 1988). Job candidates may do so to show that they are more competent, intelligent, and successful than those who cannot afford to consume conspicuously (Christopher & Schlenker, 2000). According to costly signaling theory, wasteful behavior that has little functional utility accords social status (Miller, 2009; Zahavi, 1975). The ability to own products whose price far exceeds their utilitarian value signals that one can afford what others cannot and therefore one's superior ability to acquire such wealth. However, we propose that engaging in conspicuous consumption may penalize job candidates, particularly when they apply for low-paying jobs. We build our theory on prior research suggesting that employees whose needs are not met by their job tend to be less motivated at work (Cable & DeRue, 2002; Saks & Ashforth, 1997; Vroom, 1964) and power dependence theory which postulates that organizations can extract more value from employees who are more dependent on the job to fulfill their needs (Blau, 1964; Emerson, 1962). Based on this literature, we posit that organizational decision makers would be less favorable toward job candidates who conspicuously consume because these candidates would be seen as having lower need for the job to earn money and therefore less motivated to work hard. We argue that this is because job candidates who conspicuously consume are seen as being able to afford an expensive lifestyle and thus not needing the job to make a living, especially when money is the most salient incentive that this job provides (e.g., low-paying jobs). Consistent with expectations, our studies show that compared to candidates who do not conspicuously consume, candidates who conspicuously consume tend to be perceived as having poorer fit to the job and therefore less hirable. In summary, we develop and test a theoretical model which explicates how candidates' conspicuous consumption would lead decision makers to form these negative impressions of them, which correspondingly undermine their chances of getting hired. In addition, we examine boundary conditions for our basic effect by considering jobs that differ on job salary and job status. We describe next our theoretical model, hypotheses and findings.

Needs and Supplies Fit

Organizational decision makers often ascertain job candidates' fit with the organization in terms of their person-organization fit, needs-supplies fit, and demands-abilities fit (Cable & DeRue, 2002). Our research focuses on needs-supplies fit which is the perceived degree to which the candidates' needs will be adequately rewarded by the organization for their work. We propose that in the selection context, job candidates' need for money becomes particularly salient when they display conspicuous consumption because of the inherent connection between luxury consumption, money, and larger prices (Veblen, 1899). We argue that this leads organizational decision makers to consider whether the job can fulfill this candidate's need. By definition, a low-paying job is less likely than a high-paying job to provide enough wages for their employees to sustain a luxurious lifestyle. In addition, candidates who conspicuously consume (vs. those who do not) would be deemed as already possessing the financial resources to afford such a lifestyle and therefore not needing the low-paying job to make money. If the job cannot supply the incentives that are needed and valued by candidates, they will be less motivated to work (Vroom, 1964) and thus employers will be unable to extract maximum value from them (Emerson, 1962). Hence, we propose that this misalignment in needs-supplies fit would undermine candidates' chance of getting hired. In sum, we predict that the display of conspicuous consumption by job candidates would lower their chance of being hired for low-paying jobs (H1). We further predict that this relationship would be sequentially mediated by decision makers' per-

ception of the candidates' need for the job to earn money and their evaluation of the candidates' fit with the job (H2).

We report six studies that adopted a hiring simulation paradigm in which participants played the role of organizational decision makers who evaluated a job candidate for a particular position. They were shown information that is typically provided to interviewers (i.e., job scope, candidate's resume) and then presented with either information about the candidate's luxurious consumption behavior (conspicuous consumption condition) or information that did not depict such consumption behavior (control condition). For example, they were told that they were scheduled to interview a job candidate that day and happened to notice that this candidate drove a particular car (e.g., BMW vs. Toyota) and wore a certain attire to the interview (e.g., Rolex vs. Casio watch). Finally, they were asked to evaluate the candidate and indicate their likelihood of hiring this person for the job. Studies 1-3 tested H1 and H2. We varied the way conspicuous consumption was presented (photos, Facebook, conversations), the type of jobs (administrative assistant, junior sales representative), and participant sample (working adults in the US and Singapore, and Students) across these studies. All three studies found strong support for H1 and H2.

High-Paying Jobs: When Conspicuous Consumption Is A Weaker Cue For Need

We expand our theoretical model by examining whether our hypotheses would also hold for high-paying jobs. Unlike low-paying jobs, these jobs often require employees to make executive decisions that impact the organization's performance (Amason, 1996; Hambrick & Mason, 1984), and therefore tend to employ people who are more educated, highly-skilled, and/or have considerable experience and track record in the industry. Given that high-paying jobs pay well enough for employees to afford luxury goods, there is no violation of expectations when candidates for such jobs conspicuously consume. Organizational decision makers will attribute conspicuous consumption by candidates for high-paying jobs to income from a high-paying job.

By contrast, they will attribute conspicuous consumption by candidates of low-paying jobs to financial sources other than income from working in a low-paying job because these jobs do not pay enough for such luxurious consumption. Hence, while conspicuous consumption is a strong signal of candidates' (low) need for the job to earn money when the job is low-paying, it is less diagnostic of whether candidates need the job to earn money when the job is high-paying. Thus, we posit that (H3) Job pay interacts with conspicuous consumption to impact organizational decision makers' perceptions of job candidates' need for the job to earn money. For low-paying jobs, decision makers would perceive candidates who conspicuously consume as needing the job less to earn money compared to candidates who do not conspicuously consume. However, this effect is weaker for high-paying jobs. In Study 4, HR Professionals from the US participated in an experiment which employed a 2 (conspicuous consumption vs. control) × 2 (low-paying; administrative assistant vs. high-paying job; senior vice-preseident) between-subjects design.

Results supported H3. We also found preliminary support that conspicuous consumption can benefit candidates who apply to high-paying jobs.

High-Status Jobs: When Conspicuous Consumption Is A Cue For Need For Money But Not Other Needs

We further expand our theoretical model by examining another moderator of our basic effect—the social status ascribed to the job.

We define job status as how respected people generally perceive the job to be (Cheng, Tracy, & Anderson, 2014). Although job pay and job status often go hand-in-hand, in some instances low-paying jobs attract societal respect. For example, a person employed as a paramedic or a high-school football coach may be relatively more respected compared to a dishwasher or shelf stacker yet these are also jobs which provide relatively little pay. People may choose to work in these high-status jobs that offer less pay because these jobs supply other forms of rewards (e.g., opportunity to help or benefit others) that fulfill other needs that may be important to them (e.g., respect). Hence, we posit that conspicuous consumption by job candidates applying to a low-paying/high-status job would still signal that these candidates do not need this job to earn money because this job will not pay enough for them to afford an expensive lifestyle. However, organizational decision makers would perceive these candidates to be a good fit for the job insofar that these candidates are presumed to be applying to this job to fulfill other needs that can be met by the job. Thus, we propose that (H4) keeping low-pay constant, job status interacts with conspicuous consumption to impact organizational decision makers' evaluation of job candidates' fit for the job. For low-status jobs which offer pay as the main incentive, decision makers would evaluate candidates who conspicuously consume as having poorer fit for the job compared to candidates who do not conspicuously consume. However, this effect would be weaker for high-status jobs. Study 5 found support for H4 using an experiment that employed a 2(conspicuous consumption vs. control) × 2(low-status job; dishwasher vs. high-status job; paramedic) between-subjects design.

Signaling Candidate's High Motivation

Finally, we explicitly test our theory's mechanism that job candidates for low-paying jobs are penalized when they display conspicuous consumption because they are perceived as being less motivated to work hard in the job they are applying to. We adopt two approaches to test this account: 1) attenuating the negative effect of conspicuous consumption on evaluations of fit and hirability by introducing a cue to signal candidates' high motivation; and 2) measuring perceived motivation of candidates and examining whether it mediates the effect of conspicuous consumption on evaluation of the candidates' fit for the job and hirability. In Study 6, we predicted and found that decision makers evaluating candidates who conspicuously consumed would judge the candidates to have better fit and be more hirable when the cue about the candidates' motivation is present than when this cue is absent (H5). In addition, we found a sequential mediation effect with candidates' need for money, perceived motivation, and fit with the job mediating the relationship between conspicuous consumption and hirability (H6). The recruitment context is a critical setting where job candidates generally try to impress organizational decision makers. Displaying luxury consumption may seem like a reasonable impression management strategy to candidates to create a positive impression in decision makers. Consistent with this argument, both anecdotal evidence from online discussions and data from our pilot study suggest that many people choose to display their conspicuous consumption when interviewing for jobs. However, contrary to the largely positive and status- enhancing effects of conspicuous consumption described in past research, we found that such behavior is detrimental when candidates apply to jobs that pay less and have lower status because they would be seen as having lower need for the job to earn money and therefore being less motivated to work hard at the job. We contribute to the literature on the effects of consumption behavior in organizational settings by studying how job candidates' conspicuous consumption behavior may adversely impact their hiring outcomes.

While it is plausible that participants in our studies deemed the candidates who displayed conspicuous consumption as showing hubris, this alternative account cannot fully explain the current results. In particular, candidates for high-paying jobs and low-paying/high-status jobs were not penalized for displaying conspicuous consumption compared to candidates for low- paying/low-status jobs. In fact, conspicuous consumption was beneficial to candidates for high-paying jobs. We believe that our theoretical framework on needs-supplies fit is more parsimonious and considers more clearly the instrumental concerns salient for decision-makers in the selection context. One may also question the external validity of our conclusions given that job candidates for low-paying-low-status jobs likely comprise individuals who are relatively less able to afford luxury goods. According to a survey conducted by Deutsche Bank Research (Albrecht, 2017), the lowest-income households in the US devote 40% of their consumption expenditure to luxury goods, purchasing, for example, expensive cars on credit and incurring substantial debt as a consequence. Hence, it is quite realistic for individuals at the bottom of the hierarchy to conspicuously consume to elevate their social status and impress others. Finally, one alternative explanation for our results is that displaying conspicuous consumption is

counter-stereotypical for individuals who are from a lower social class. Given that candidates who apply to low-paying/low-status jobs tend to be financially less well-off, they are not expected to be able to afford expensive luxury goods. This stereotype violation in turn negatively influences organizational decision makers' evaluations of fit. While we believe this is a plausible account for our basic finding, it is less tenable for our pattern of results in Study 5 and thus cannot fully explain the data. Specifically, stereotype violation should apply to conspicuously consuming candidates for the paramedic job, but they were not penalized.

REFERENCES

Albrecht, L. (2017). 40% of America's lowest-income families' consumption goes on luxuries. *Market Watch*. Retrieved from http://www.marketwatch.com/story/low-income-families-spend-40-of-their-money-on-luxuries-2017-06-28

Amason, A. C. (1996). Distinguishing the effects of functional and dysfunctional conflict on strategic decision making: Resolving a paradox for top management teams. *Academy of Management Journal, 39*, 123-148.

Aspers, P., & Godart, F. (2013). Sociology of fashion: Order and change. *Annual Review of Sociology, 39*, 171-192.

Bagwell, L. S., & Bernheim, B. D. (1996). Veblen effects in a theory of conspicuous consumption. *The American Economic Review, 86*, 349-373.

Belk, R. W. (1988). Possessions and the extended self. *Journal of Consumer Research, 15*, 139- 168.

Blau, G. J. (1987). Using a person-environment fit model to predict job involvement and organizational commitment. *Journal of Vocational Behavior, 30*, 240-257.

Cable, D. M., & DeRue, D. S. (2002). The convergent and discriminant validity of subjective fit perceptions. *Journal of Applied Psychology, 87*, 875-884.

Cheng, J. T., Tracy, J. L., & Anderson, C. (2014). The psychology of social status. In. Verlag New York: Springer.

Christopher, A. N., & Schlenker, B. R. (2000). The impact of perceived material wealth and perceiver personality on first impressions. *Journal of Economic Psychology, 21*, 1-19.

Emerson, R. M. (1962). Power-dependence relations. *American sociological review, 27*, 31-41. Fiske, S. T., & Taylor, S. E. (2013). *Social cognition: From brains to culture*: Sage.

Fry, R. (2018). Millennials are the largest generation in the U.S. labor force. *Pew Research center*. Retrieved from http://www. pewresearch.org/fact-tank/2018/04/11/millennials-largest-generation-us-labor-force/

Hambrick, D. C., & Mason, P. A. (1984). Upper echelons: The organization as a reflection of its top managers. *Academy of Management Review, 9*, 193-206.

Miller, G. (2009). *Spent. Sex, Evolution, and Consumer Behavior*. New York: Viking Penguin.

Quora. (2017). Would you wear a Rolex watch to a job interview? Retrieved from https://www.quora.com/Would-you-wear-a-Rolex-watch-to-a-job-interview

Reddit. (2016). [Question] Rolex at work? Retrieved from https://www.reddit.com/r/Watches/comments/3l7g5t/question_rolex_at_work/

Rolexforums. (2009). Job interview rolex? What should you wear? Retrieved from https://www.rolexforums.com/showthread.php?t=120202

Saks, A. M., & Ashforth, B. E. (1997). A longitudinal investigation of the relationships between job information sources, applicant perceptions of fit, and work outcomes. *Personnel Psychology, 50*, 395-426.

Twenge, J. M., & Kasser, T. (2013). Generational changes in materialism and work centrality, 1976-2007: Associations with temporal changes in societal insecurity and materialistic role modeling. *Personality and Social Psychology Bulletin, 39*, 883-897.

Veblen, T. (1899). *The theory of the leisure class: An economic study in the evolution of institutions*. New York: MacMillan.

Vroom, V. H. (1964). *Work and motivation*. New York: Wiley.

Zahavi, A. (1975). Mate selection—a selection for a handicap. *Journal of theoretical Biology, 53*, 205-214.

When Do People Pay It Forward: The Positive Effect of Disclosing Help Provider's Name on Generalized Reciprocity

Yunqing Chen, The Chinese University of Hong Kong, China
Leilei Gao, The Chinese University of Hong Kong, China

EXTENDED ABSTRACT

We all had the experience of receiving help from strangers. Prior research on helping behavior has suggested that, after receiving a help, people could reciprocate the favor back to the help provider, or choose to forward the favor to a third party (Greiner and Levati 2005; Stanca 2009; Tsvetkova and Macy 2014). The former is referred to as direct reciprocity (if A helps B then B helps A; Cialdini 2009; Nowak 2006) whereas the latter is termed as generalized reciprocity (if A helps B then B helps C; Nowak 2006). While research has demonstrated the conditions that facilitate direct reciprocity (Gergen et al. 1975; Gouldner 1960; Greengberg 1980), it is not clear what factors would promote help recipients' tendency to engage in generalized reciprocity.

In this research, we examine the influence of name disclosure of a help provider on the help recipient's likelihood of forwarding the kindness to a third party in subsequent situations. Across four studies, we find that compared to receiving help from a stranger whose name is not disclosed, merely knowing the name of the help provider leads people to perceive the help provider as a salient and unique individual. This process results in an elevated motivation to reciprocate and subsequent an engagement in generalized prosocial behavior, especially when direct reciprocity is not available.

Studies 1a and 1b provided initial evidence of the proposed effect. In study 1a (N = 132), we designed a blind taste test as our cover story and observed participants' disposal of used paper cups. Participants first participated in a blind taste test in which they were provided with two small cups of sports drink. In the second task, participants read a scenario in which they posted an online message in a local forum asking for recommendations on haircut. They received a reply from another user whose name was either displayed or not. After completing both tasks, participants were instructed to "dispose of the used papers cups on the way out". And the results showed that participants were more likely to recycle the cups when the help provider's name was disclosed than when the person was anonymous (47.1% vs. 26.6%, p = .016).

In study 1b (N = 132), participants first read a scenario in which they were raising money on GoFundMe.com. Participants were presented with the 15 most recent donations. To manipulate name disclosure, in one condition, all 15 donors' names were disclosed, and in the other condition, the donors were all marked as "anonymous". In the next task, participants were asked to help a charity, World Wildlife Foundation (WWF), to design new slogans. As expected, participants in the name disclosure condition provided more slogans than those in the no name disclosure condition (3.29 vs. 2.60; p = .035).

Study 2 (N = 217) provided support for the proposed mechanism by manipulating the recipient's motivation to reciprocate. Previous research has suggested that the recipient's motivation to reciprocate could be affected by the locus of causality of the help provider's action (Greenberg 1980). That is, if a person offers help because s/he is supposed to do so (not because s/he wants to do so), the recipient is less motivated to reciprocate. This study used a 2 (name disclosure: yes vs. no) × 2 (help provider's role: user vs. staff) between-subjects design. Participants first read a scenario in which they asked a question on a website and received an answer either from a website user or from a website support staff. The name of the helper was either disclosed or not. Then participants read a short article about a char-ity organization, and indicated their willingness to contribute to the charity upon winning a prize draw of $20. As predicted, when the help provider was a user of the website, name disclosure led the recipient to donate more money to the charity (8.95 vs. 6.83). However, when the help provider was a support staff, name disclosure had no influence on the recipient's donation amount (5.67 vs. 7.12).

Study 3 (N = 295) provided more evidence on the underlying mechanism of reciprocity motivation. According to our theory, recipients engage in generalized reciprocity because direct reciprocity is not available. If, however, people can reciprocate the kindness back to the help provider, even in the form of expressing their gratitude, the positive effect of name disclosure will be attenuated. This study used a 2 (name disclosure: yes vs. no) × 2 (gratitude expression: present vs. absent) + 1 control condition between-subject design. We adopted the same scenario and manipulation of name disclosure as in Study 1a. In addition, one group of participants was asked to imagine that they had replied to the help provider with a thank-you note. The other group of participants was not provided the information. Participants in the control condition did not read the scenario and directly proceeded to the next task. Next, participants indicated their likelihood of engaging in 18 different consumption behaviors which composed of six positive behaviors (e.g., "donate used items/clothing to a charitable organization to help those families in need"; adapted from Cavanaugh, Bettman, and Luce 2015; α = .73), six negative behaviors (e.g., "say nothing when the waitress miscalculates the bill in your favor"; adapted from Babakus et al. 2004; α = .83) and six neutral behaviors (e.g., "see a foreign film"; adapted from Cavanaugh et al. 2015; α = .71). As predicted, when gratitude was expressed, the positive effect of name disclosure on prosocial tendency was attenuated. In addition, compared to the control condition, those participants who knew the help provider's name but had no chance to express their gratitude indicated stronger prosocial behavior tendency.

To summarize, this research contributes to reciprocity literature by demonstrating the condition in which generalized reciprocity exists. In addition, our findings highlight the key role or reciprocity motivation in driving generalized reciprocity. Finally, our research has practical implications on "how" people should offer help to those in need.

REFERENCES

Babakus, Emin, T. Bettina Cornwell, Vince Mitchell and Bodo Schlegelmilch (2004), "Reactions to Unethical Consumer Behavior across Six Countries," *Journal of Consumer Marketing,* 21 (4), 254-63.

Cialdini, Robert B. (2009), *Influence: Science and Practice* (Vol. 4), Boston, MA: Pearson Education.

Cavanaugh, Lisa A., James R. Bettman and Mary Frances Luce (2015), "Feeling Love and Doing More for Distant Others: Specific Positive Emotions Differentially Affect Prosocial Consumption," *Journal of Marketing Research*, 52 (5), 657-73.

Gergen, Kenneth J., Phoebe Ellsworth, Christina Maslach and Magnus Seipel (1975), "Obligation, Donor Resources, and Reactions to Aid in Three Cultures," *Journal of Personality and Social Psychology,* 31 (3), 390-400.

Gouldner, Alvin W. (1960), "The Norm of Reciprocity: A Preliminary Statement," *American Sociological Review,* 25 (2), 161-78.

Greenberg, Martin S. (1980), "A Theory of Indebtedness," in *Social Exchange: Advances in Theory and Research*, ed. K. J. Gergen, M. S. Greenberg, and R. H. Willis, Boston, MA: Springer US, 3–26.

Greiner, Ben and M. Vittoria Levati (2005), "Indirect Reciprocity in Cyclical Networks: An Experimental Study," *Journal of Economic Psychology,* 26 (5), 711-31.

Nowak, Martin A. (2006), "Five Rules for the Evolution of Cooperation," *Science,* 314 (5805), 1560-563.

Stanca, Luca (2009), "Measuring Indirect Reciprocity: Whose Back Do We Scratch?," *Journal of Economic Psychology,* 30 (2), 190-202.

Tsvetkova, Milena and Michael W. Macy (2014), "The Social Contagion of Generosity," *PloS one,* 9 (2), e87275.

"The Wellness Religion": Consuming Purity as an Aspirational Lifestyle

Tianqi Chen, Boston University, USA
Anat Keinan, Boston University, USA
Neeru Paharia, Georgetown University, USA

EXTENDED ABSTRACT

The glories of living an indulgent lifestyle have long been celebrated. However, over the last decade, it has been hard to ignore the growing emergence of an opposing trend, one that celebrates treating one's mind and body as a temple, rather than a vehicle for indulgence; one that prioritizes investing in one's physical and mental wellness over investing in extravagant products and luxurious experiences. Wellness consumption has transformed from a niche practice to a \$4.2 trillion-dollar global industry in 2017 (Global Wellness Institute 2018).

In the present research, we explore the phenomenal rise of brands, products, and services representing a wellness lifestyle. We propose that the wellness lifestyle has become a new form of aspirational living for consumers. We argue this trend is driven in part by consumers' motivations to find ways to center and detoxify themselves from an increasingly chaotic world. The frantic pace of modern life, the polluted environment, and the number of things competing for our digital attention at any one time are making consumers feel overwhelmed and ungrounded. While historically many dealt with the chaos of the world through religion (e.g. attending services, rituals, praying, fasting, etc.) (Cutright 2012: Mathras, et al. 2016; Preston, & Ritter, 2012), the rise of secularism has created a vacuum where the need for purity and self-actualization has gone unmet. Wellness acts a new type of religion, one that exists in the commercial sphere, but that also allows consumers to achieve the need to detoxify their minds and bodies as it classifies the "sacred" (e.g., organic food, meditation, nature.) from the "profane" (e.g., unhealthy food with preservatives, ; Douglas, 1966).

Hypothesis 1:   *Compared to other traditionally aspirational lifestyles (i.e., indulgent lifestyle, luxury lifestyle, intellectual lifestyle, busy-at-work lifestyle, religious lifestyle), a wellness lifestyle is more aspirational.*

Hypothesis 2:   *The aspirational appeal of a wellness lifestyle, compared to other lifestyles, is mediated by perceived purity.*

Hypothesis 3:   *The aspirational appeal of a wellness lifestyle will be positively moderated by cuing people to think about the toxins of modern life.*

Hypothesis 4:   *A wellness lifestyle will satisfy nonreligious people's need for purity. A wellness lifestyle and a religious lifestyle will satisfy religious people's need for purity.*

Pilot study analyzed 200 twitter posts that use the #wellness hashtag and identified four main categories of wellness practices: 1. Mindfulness and relaxation techniques 2. Exercise and fitness 3. Nutritious food and healthy diet, and 4. Sleep quality and quantity, which validated our definition of wellness consumption and suggested that wellness practices as an effective way to deal with negative and toxic elements in the world and in one's life, body, and mind, and that purity is a central objective.

In Study 1a we interviewed both church goers (N = 15) and wellness consumers (N = 15) to document the similarities and differences between the practices. A few themes emerged from the interviews, which highlighted the purpose of purification that was once predominantly realized through religious practices, and now also achieved by wellness practices. We then generalized the findings to a broader and more diverse population with a lab survey (N = 140) and again documented the similarities between wellness and religious practices, and derived the major theme of purity that motivates the dedication to wellness lifestyle.

In Study 2a (N = 404), we conducted a lab experiment and compared wellness lifestyle to two other traditionally aspirational lifestyles, an indulgent luxury lifestyle and an intellectual lifestyle. Participants read a description of a fictitious NFL player's weekend regular activities that imply his overall lifestyle. Consistent with H1, participants rated the NFL player's lifestyle significantly different in terms of its aspirational appeal across the three conditions ($F_{(2,401)} = 101.14$, $p < .001$, $\eta_p^2 = .34$). Participants perceived the NFL player's lifestyle as more aspirational in the wellness condition (M = 5.44, SD = .97) than in the indulgent lifestyle (M = 3.49, SD = 1.45; 95% Confident interval: 1.67 to 2.24), or in the intellectual lifestyle (M = 5.08, SD = 1.12; 95% Confident interval: .08 to .65). We replicated the result with a broader population (N = 278) on mTurk in support of H1 ($F_{(2,275)} = 70.91$, $p < .001$, $\eta_p^2 = .34$). Participants were also more interested in purchasing the NFL players' book featuring his lifestyle when he had a wellness lifestyle (M = 3.74, SD = 1.77), than an indulgent lifestyle (M = 2.27, SD = 1.75, 95% CI: .95 to 1.99), or an intellectual lifestyle (M = 3.13, SD = 1.90, 95% CI: .083 to 1.13).

Study 3a (N = 322) compared wellness lifestyle to three other lifestyles (i.e., busy-at-work, entertainment, and beauty) and examined the mediating role of perceived purity. Confirming both H1 and H2, the wellness lifestyle was rated as more aspirational than the busy-at-work lifestyle (M = 5.02, SD = 1.23 vs. M = 4.14, SD = 1.50, $p <.001$), the entertainment lifestyle (M = 5.02, SD = 1.23 vs. M = 3.35, SD = 1.34, $p <.001$), and more aspirational than the beauty lifestyle (M = 5.02, SD = 1.23 vs. M = 3.79, SD = 1.49, $p <.001$; $F_{(3, 317)} = 21.29$, $p < .001$, $\eta_p^2 = .17$). Mediation analysis showed that perceived purity fully mediated such effect (.26; 95% CI [.18, .35]; Hayes, 2015). The effect of different lifestyles on aspiration became insignificant after including purity as the mediator (-.029; 95% CI [-.16, .10]). Study 3b (N = 335) replicated the result with a different context by using different collections of products to represent different lifestyles. Compared to a luxury lifestyle, or a mainstream lifestyle, wellness lifestyle was rated as more aspirational ($F_{(2,332)} = 13.93$, $p < .001$, $\eta_p^2 = .08$). A mediation analysis showed a significant indirect effect for the mediation path through purity, comparing the wellness lifestyle and the luxury lifestyle (.51; 95% CI [.29, .79]), and comparing the wellness lifestyle and the average lifestyle ((.15; 95% CI [.02, .31]).

In Study 4 (N = 264), we further tested the role of purity by directly manipulating consumers' world view that results in different level of need for purity (i.e., priming consumers to consider the toxins of modern life vs. control). We used a realistic measure to assess consumers' intention – New Year's resolutions for 2020, and conducted this experiment on the first week of 2020. In support of H3, a 2 (world view prime: toxic world vs. convenient world) by 2 (New year resolution type: wellness resolutions vs. money and career resolutions) mixed ANOVA showed a significant interaction between

the prime condition and the type of resolutions ($F(1, 262) = 4.91$, $p = .028$, $\eta_p^2 = .02$). when primed with the world view that modern life is becoming more and more toxic, participants listed more wellness resolutions (M = 1.53, SD = .91), compared to the control condition where participants were primed with the world view that modern life is becoming more convenient (M = 1.22, SD = .89; 95% CI [.097, .532]). There was no significant difference between the two priming conditions for the number of money and career related resolutions listed (M_{toxic} = .56, SD_{toxic} = 67 vs. $M_{convenient}$ = .60, $SD_{convenient}$ = .72, 95% CI [-.211, .125]).

To test H4, we prescreened participants based on their religiosity in Study 5 (N = 473) and compared wellness lifestyle to religious lifestyle and a mainstream lifestyle. The result replicated the main effect that the wellness lifestyle (M = 5.49, SD = 1.31) was seen as significantly more aspirational than both the religious lifestyle (M = 4.85, SD = 1.84; 95% CI[.31, .98]) and the mainstream lifestyle (M = 4.23, SD = 1.35, 95% CI[.93, 1.6]; $F(2,470) = 27.15$, $p < .001$, $\eta_p^2 = .104$). Religiosity moderated participants' aspiration for different lifestyles ($F(2, 470) = 5.06$, $p < .01$, $\eta_p^2 = .021$). Non-religious participants found the wellness lifestyle (M = 5.35, SD = 1.30) significantly more aspirational than either the religious lifestyle (M = 4.26, SD = 1.76; 95% CI[.62, 1.54]) or the mainstream lifestyle (M = 4.12, SD = 1.28; 95% CI [.77, 1.69]). Religious participants saw wellness lifestyle (M = 5.65, SD = 1.33) as equally aspirational as the religious lifestyle (M = 5.44, SD = 1.73, 95% CI [-.25, .68]), which were both more aspirational than the mainstream lifestyle (M = 4.33, SD = 1.42; 95% CI = [.85 to 1.78], and [.64, 1.57]). A similar pattern of results was found for purity. Religious participants saw both the wellness and religious lifestyles as purer than the mainstream lifestyle, which mediated the view of being an aspirational lifestyle (wellness vs. mainstream: indirect effect =.51; 95% CI: .28 to .76; religious vs. mainstream: indirect effect =.24; 95% CI: .11 to .37). Non-religious participants saw the wellness lifestyle more aspirational than the mainstream lifestyle due to its increased level of purity (indirect effect =.55; 95% CI: .31 to .77). There was no mediating effect of purity for the religious lifestyle (compared to mainstream) on aspirations (indirect effect =.06; 95% CI: -.02 to .16).

Study 6 (N = 226) examined the effect of wellness positioning and labeling of products on consumer behavior and marketing relevant measures (i.e., influencer effectiveness, and conspicuous display). We also examined the response of different market segments that are commonly stereotyped as more or less interested in wellness products by establishing the broad appeal of wellness among consumers across genders and different political orientations. Across conditions (wellness vs. control, we either labeled the product (e.g., juice) as wellness product or not and create a regular consumer of this product. The result showed a significant main effect of wellness positioning on the three dependent variables: the wellness product was perceived to be associated with a more aspirational lifestyle ($F(1, 224) = 43.19$, $p < .001$, $\eta_p^2 = .16$; $M_{wellness}$ = 4.90, $SD_{wellness}$ = 1.36, $M_{control}$ = 3.81, $SD_{control}$ = 1.13); participants were more interested in learning more about and purchasing products when the regular consumer recommended a wellness product ($M_{wellness}$ = 4.35, $SD_{wellness}$ = 1.67) than control ($M_{control}$ = 3.53, $SD_{control}$ = 1.52; $F(1, 224) = 14.86$, $p < .01$, $\eta_p^2 = .062$); wellness positioning significantly increased interest in conspicuous display of the product (talking about the product and posting pictures of it on social media) ($M_{wellness}$ = 3.24, $SD_{wellness}$ = 1.79, $M_{control}$ = 2.48, $SD_{control}$ = 1.56; $F(1, 224) = 11.65$, $p = .001$, $\eta_p^2 = .049$). Purity mediated such effects (Aspiration: .19; 95% CI [.05, .36]; Influencer effectiveness: (.39; 95% CI [19, .63]; Conspicuous display: .24; 95% CI [07, .44]). The effect of wellness positioning was quite similar and consistent across different demographic seg-

ments (i.e., liberal men, conservative men, liberal women, conservative women).

Our findings contribute to four streams of research. Our work contributes to the literature of luxury marketing and symbolic consumption; while past research has demonstrated that indulgent and luxurious lifestyles are more appealing (Ordabayeva and Chandon 2011; Wang and Griskevicius 2014; Ward and Dahl 2014), we find evidence that today, a wellness lifestyle has become more aspirational. Second, we build off past work in consumer behavior which documents how themes of religion are reflected in consumer behavior (Mathras, Cohen, Mandel, and Mick 2016; Belk, Wallendorf, and Sherry 1989; Muniz and Schau 2005; Shachar, Erdem, Cutright, and Fitzsimons 2010). Our work demonstrates that wellness carries religious undertones and serves to satisfy consumers' needs for purity. Third, we conceptualize purity more in a broader context than previous literature (Graham et al. 2011) that does not condemn certain practices, but rather is enabled through the pursuit of detoxification which is central to the promise of the wellness lifestyle. We show that wellness is a commercially viable vehicle for purity, and also one that may appeal to a wider set of individuals. Our research also contributes to current research on the consumption of healthy food products (Andre, Chandon, and Haws 2020; Cadario and Chandon 2020; Haws, Walker, and Sample 2017; Juhl, Fenger, and Thøgersen 2017; Scott, Rozin, and Small 2020, Tangari, Bui, Haws, and Liu 2020) by identifying religious elements and themes in how consumer perceive and consume wellness related products.

REFERNCES

André, Q., Chandon, P., & Haws, K. (2019). Healthy Through Presence or Absence, Nature or Science?: A Framework for Understanding Front-of-Package Food Claims. *Journal of Public Policy & Marketing*, *38*(2), 172-191.

Belk, R. W., Wallendorf, M., & Sherry Jr, J. F. (1989). The sacred and the profane in consumer behavior: Theodicy on the odyssey. *Journal of consumer research*, *16*(1), 1-38.

Cadario, R., & Chandon, P. (2017). *Which healthy eating nudges work best? A meta-analysis of behavioral interventions in field experiments*. INSEAD Working Paper series 2017/77/MKT.

Cutright, K.M. (2012). The Beauty of Boundaries: When and Why We Seek Structure in Consumption. *Journal of Consumer Research*, Vol. 38, Issue 5, 1 February 2012, 775–790.

Douglas, M. (2013). Purity and Danger: An Analysis of Concepts of Pollution and Taboo. United Kingdom: Taylor & Francis.

Global Wellness Institute, https://globalwellnessinstitute.org/pressroom/statistics-and-facts/

Hayes, A. F. (2015). An index and test of linear moderated mediation. *Multivariate behavioral research*, *50*(1), 1-22.

Graham, J., Haidt, J., Motyl, M., Meindl, P., Iskiwitch, C., & Mooijman, M. (2016). Moral Foundations Theory: On the advantages of moral pluralism over moral monism. Gray K, 9.

Haws, K. L., Reczek, R. W., & Sample, K. L. (2017). Healthy diets make empty wallets: The healthy= expensive intuition. *Journal of Consumer Research*, *43*(6), 992-1007.

Juhl, H. J., Fenger, M. H., & Thøgersen, J. (2017). Will the consistent organic food consumer step forward? An empirical analysis. *Journal of Consumer Research*, *44*(3), 519-535.

Mathras, D., Cohen, A. B., Mandel, N., & Mick, D. G. (2016). The effects of religion on consumer behavior: A conceptual framework and research agenda. *Journal of Consumer Psychology*, *26*(2), 298-311.

Muniz Jr, A. M., & Schau, H. J. (2005). Religiosity in the abandoned Apple Newton brand community. *Journal of consumer research*, *31*(4), 737-747.

Ordabayeva, N., & Chandon, P. (2011). Getting ahead of the Joneses: When equality increases conspicuous consumption among bottom-tier consumers. *Journal of Consumer Research*, *38*(1), 27-41.

Preston, J. L., & Ritter, R. S. (2012). Cleanliness and godliness: Mutual association between two kinds of personal purity. Journal of Experimental Social Psychology, 48(6), 1365-1368.

Scott, S. E., Rozin, P., & Small, D. A. (2017). Consumers Prefer "natural" more for preventatives than for curatives. *Journal of Consumer Research*.

Shachar, R., Erdem, T., Cutright, K. M., & Fitzsimons, G. J. (2011). Brands: The opiate of the nonreligious masses?. *Marketing Science*, *30*(1), 92-110.

Tangari, A. H., Bui, M., Haws, K. L., & Liu, P. J. (2019). That's not so bad, I'll eat more! Backfire effects of calories-per-serving information on snack consumption. *Journal of Marketing*, *83*(1), 133-150.

Wang, Y., & Griskevicius, V. (2014). Conspicuous consumption, relationships, and rivals: Women's luxury products as signals to other women. *Journal of Consumer Research*, *40*(5), 834-854.

Ward, M. K., & Dahl, D. W. (2014). Should the devil sell Prada? Retail rejection increases aspiring consumers' desire for the brand. *Journal of Consumer Research*, *41*(3), 590-609.

How Do Natural Disasters Affect Consumers' Desire for Luxuries?

Ning Chen, Zhejiang University of Finance and Economics, China
Francine E. Petersen, HEC Lausanne, Switzerland

EXTENDED ABSTRACT

Natural disasters are defined as rapid, instantaneous or profound impact of the natural environment upon the socio-economic system (Alexander 1993), or as a sudden disequilibrium of the balance between the forces released by the natural system and the counteracting forces of the social system (Alcántara-Ayala 2002). Previous research reveals effects of natural disasters in opposing directions for different types of hedonic consumption. For example, disaster victims of Hurricane Katrina engaged in more impulsive purchases (Sneath, Lacey, and Kennett-Hensel 2009), and after the 2013 Ya'an (in Sichuan Province, China) earthquake, victims increased their uses of hedonic apps on mobiles (Jia et al. 2016). Yet, alcohol consumption decreased after the Great Hanshin earthquake in Japan (Shimizu et al. 2000). As far as we know, little research has directly investigated the effect of natural disasters on luxury consumption. Inferred from previous research results, the effects of natural disasters on luxury consumption could be either positive or negative (Jia et al. 2016; Mauchauffée, Lemaire, and Magnier-Watanabe 2012). According to a survey launched by McKinsey in 2011, 20% of Japanese luxury clients reported that they were less interested in purchasing luxuries after the 2011 Great East Japan earthquake. But is it so?

We introduce conspicuousness as a moderator of the effect of natural disasters on luxury consumption. Conspicuous consumption can be defined as "the act of buying a lot of things, especially expensive things that are not necessary, in a way that people notice" (Longman American Dictionary, 2000, p. 296). For consumers, the main purpose of buying conspicuously branded goods is to signal to the masses that they are different from them, while consumers who buy inconspicuously branded goods aim to signal to high-status peers that they are like them (Han, Nunes, and Drèze 2010).

From the perspective of increased interpersonal trust, we would expect natural disasters to decrease desire for conspicuous (vs. inconspicuous) luxuries. Conspicuous consumption results from people's desire to enhance social prestige, to show social status, and to signal their wealth and achievements (Chaudhuri and Majumdar 2006; O'Cass and Frost 2002; Shukla 2008; Wong and Ahuvia 1998). So it is inevitable that conspicuous consumption reinforces social hierarchy and social comparison (Kapferer 2010; Shukla 2008). From the perspective of risk reduction, however, we would expect natural disasters to either increase or do not affect desire for conspicuous luxuries because enhancing status could reduce perceived (social) risk.

This research contributes by investigating the effect of natural disasters on desire for luxury brands and by suggesting brand conspicuousness as a moderator. We find that natural disasters have a negative impact on desire for conspicuous luxuries, but not for inconspicuous luxuries or non-luxuries. Under some conditions, which need to be further investigated, we found a positive effect.

Using search engine query data (real behavioral data from Google), we find that the conspicuousness of luxuries moderates the effect of natural disasters on consumers' desire for luxury consumption. We used the 2011 Great East Japan earthquake and the 2012 Hurricane Sandy in the U.S. as two naturally occurring events to explore the effect. We operationalized consumers' desire for conspicuous luxuries via the search volume for luxury fashion brands on Google (Armani, Burberry, Chanel, D&G, Hermes, Louis Vuitton, Ralph Lauren). These brands usually use "loud signals" (e.g., logos) that everyone can see. Consumers' desire for inconspicuous luxuries was measured via the search volume for luxury hotels (Hilton, Ritz-Carlton, Sheraton, InterContinental, Four Seasons, Hyatt, The Peninsula) and makeup brands (Estee Lauder, La Mer, la Prairie, Lancome, Shiseido, Sisley, SK-II). These are less conspicuous because they are more experiential and others cannot see/recognize the consumption of these brands by looking at the consumer. Consumers' desire for non-luxuries (baseline) was measured via search volume for standard fashion brands (Forever21, H&M, Muji, Onitsuka, Topshop, Uniqlo, Zara).

From Google Trends, we collected weekly/monthly search volumes for the groups of brands across more than a decade (2004-2016/2019). We constructed time series of the total search volume for each brand type in each country. We standardized the data for analysis and removed the seasonal component of the time series.

Results show that the search volume for conspicuous luxuries had been increasing up to the point of the natural disaster, when it started to significantly decrease, both in Japan (Δb=-7.72 volume/year, 95% CI [-10.40, -5.04]) and in the U.S. (Δb=-5.06 volume/year, 95% CI [-6.11, -4.01]).

For luxury hotels (inconspicuous luxuries), the slope of search volume did not change after the earthquake in Japan (Δb=0.46 volume/year, 95% CI [-0.81, 1.68]) and became significantly less steep after the hurricane in the U.S. (Δb=1.92 volume/year, 95% CI [1.34, 2.51]), but still in the same direction. For makeup brands (inconspicuous luxuries), the slope of search volume became steeper but in the same direction in Japan (Δb= -2.37 volume/year, 95% CI [-4.05, -0.68]) and started to (non-significantly) increase in the U.S. (Δb= 1.26 volume/year, 95% CI [-0.57, 3.08]). For non-luxury brands, the search volume was increasing both before and after the disaster in Japan, with no significant slope change ((Δb=1.18 volume/year, 95% CI [-0.76, 3.13]), and in the U.S., with a less steep but still positive slope (Δb=-2.43 volume/year, 95% CI [-3.54, -1.31]).

The results show that consumers' desire for conspicuous luxuries decreases significantly after natural disasters when compared with desire for inconspicuous luxuries or non-luxuries. For further examination, a causal impact analysis should be applied and more factors should be considered. To increase the generalizability of the results, we plan to expand the analyses to additional events, countries, and brands. It would also be interesting to investigate the distinction between "search" and "purchase intention". For example, what's the conversion rate from "search" to "purchase"?

REFERENCES

Alcántara-Ayala, Irasema (2002), "Geomorphology, Natural Hazards, Vulnerability and Prevention of Natural Disasters in Developing Countries," *Geomorphology*, 47(2), 107–24.

Alexander, D. (1993), *Natural Disasters*, New York: UCL Press and Chapman & Hall.

Chaudhuri, Himadri Roy and Sitanath Majumdar (2006), "Of Diamonds and Desires: Understanding Conspicuous Consumption from a Contemporary Marketing Perspective," *Academy of Marketing Science Review*, 1(11), 1–18, http://www.amsreview.org/articles/chaudhuri09-2006.pdf.

Han, Young Jee, Joseph C Nunes, and Xavier Drèze (2010), "Signaling Status with Luxury Goods: The Role of Brand Prominence," *Journal of Marketing*, 74(July), 15–30.

Jia, J. S., J. Jia, C. K. Hsee, and B. Shiv (2016), "The Role of Hedonic Behavior in Reducing Perceived Risk: Evidence From Postearthquake Mobile-App Data," *Psychological Science*, 28(1), 23–35, http://pss.sagepub.com/lookup/doi/10.1177/0956797616671712.

Kapferer, Jn (2010), "Luxury after the Crisis: Pro Logo or No Logo?," *The European Business Review*, (October), 42–46, http://www.4thavenue.org/ProNoLogo_JNKapferer-sept2010EBR.pdf.

Longman American Dictionary (2000), Upper Saddle River, NJ: Pearson Education, 296.

Mauchauffée, Mika Tamura, Jean-Paul Lemaire, and Remy Magnier-Watanabe (2012), "Crisis Impact on Mature Economies ' Sectors : Luxury in Japan," in *9th International Congress Marketing Trends*, 1–30.

O'Cass, Aron and Hmily Frost (2002), "Status Brands: Examining the Effects of Non-Product-Related Brand Associations on Status and Conspicuous Consumption," *Journal of Product & Brand Management*, 11(2), 67–88, http://0-www.emeraldinsight.com.innopac.up.ac.za/doi/pdfplus/10.1108/10610420210423455.

Shimizu, S, K Aso, T Noda, S Ryukei, Y Kochi, and N Yamamoto (2000), "Natural Disasters and Alcohol Consumption in a Cultural Context: The Great Hanshin Earthquake in Japan," *Addiction*, 95(February 1999), 529–36, http://onlinelibrary.wiley.com/store/10.1046/j.1360-0443.2000.9545295.x/asset/j.1360-0443.2000.9545295.x.pdf?v=1&t=iagn9ce4&s=e8fb9274c8e2a0c174a877929053d4f74d5f5a81.

Shukla, Paurav (2008), "Conspicuous Consumption among Middle Age Consumers: Psychological and Brand Antecedents," *Journal of Product & Brand Management*, 17, 25–36, http://www.emeraldinsight.com/doi/10.1108/10610420810856495.

Sneath, Julie Z., Russell Lacey, and Pamela a. Kennett-Hensel (2009), "Coping with a Natural Disaster: Losses, Emotions, and Impulsive and Compulsive Buying," *Marketing Letters*, 20, 45–60.

Wong, Nancy Y. and Aaron C. Ahuvia (1998), "Personal Taste and Family Face: Luxury Consumption in Confucian and Western Societies," *Psychology and Marketing*, 15(August 1998), 423–41.

How Donor's Regulatory Focus Changes the Effectiveness of a Sadness-Evoking Charity Appeal

Jungsil Choi, Cleveland State University, USA
Hyun Young Park, CEIBS, China

EXTENDED ABSTRACT

Despite the prevalent use of sadness appeals in charity ads, past research offers inconsistent findings on whether sadness appeals motivate or demotivate charitable giving (e.g., Oveis et al. 2010; Pancer et al. 1979a, 1979b; Pancer 1988; Piff et al. 2010; Seu and Orgad 2014; Small and Vorrochi 2009). To reconcile these findings, we introduce prospective donors' regulatory focus as a moderator for understanding when and why sadness appeals motivate or discourage giving. Specifically, we propose that the sense of low personal control associated with sadness appeals (Garg and Lerner 2013) increases donors' sensitivity to advertiser's manipulative persuasion tactics, as those tactics can threaten donors' control over their donation decision. To maintain their control, persuasion knowledge is activated among prevention-oriented donors who tend to be vigilant against losses (Kirmani and Zhu 2007). Consequently, compared to promotion-oriented donors, prevention-oriented donors experience greater skepticism against a sadness appeal, while feelings less sympathy for the charitable cause, which as a result reduces charitable giving. In contrast, when a charity appeal induces an emotion whose cognitive appraisals are not associated with a low personal control (e.g., happiness or guilt), regulatory focus is less likely to influence skepticism, sympathy, and charitable giving.

We tested our predictions in six main studies and two supplementary studies. Study 1 demonstrated the impact of donors' regulatory focus on a real donation behavior. Participants ($n = 247$; MTurk) were assigned to view a charity advert that adopted one of the two emotion appeals (sadness vs. happiness) and indicated the amount they were willing to donate out of $1 bonus payment. Afterwards, their chronic regulatory focus was measured (Higgins et al. 2001). We found that a prevention focus decreased the donated amount compared to a promotion focus when a sadness appeal was used to solicit the donation, whereas regulatory focus did not affect the amount when a happiness appeal was used. Two supplementary studies ($n = 111$, undergraduate students; $n = 119$, MTurk) replicated these effects using different ads while regulatory focus was primed, instead of being measured, in one of those studies.

Study 2 compared sadness with guilt, to show that the decreased donation under a prevention focus is a unique response toward a sadness appeal, rather than a general response towards any negative emotion appeals. Participants ($n = 527$, MTurk) were randomly assigned to view one of the three emotion appeals (sadness, guilt, or happiness) and then indicated the amount they wished to donate out of hypothetical $100. Next, their chronic regulatory focus was measured. Although guilt is associated with an appraisal of a negative outcome (similar to sadness), the control over the outcome is still with the self (i.e., an appraisal of high personal control; Smith and Ellesworth 1985; Weiner et al. 1982). Accordingly, we expected that guilt appeals (vs. sadness appeals) are less likely to increase sensitivity to sources that pose threat to donor's control (i.e., manipulative tactics) and thus are less likely to activate persuasion knowledge among prevention (vs. promotion) oriented donors who tend to be vigilant against such potential threats. Consistent with our expectation, we found that a prevention (vs. promotion) focus decreased donation amount uniquely for the sadness appeal, and not for the guilt or happiness appeal.

Study 3 examined the causal chain of psychological mechanism underlying our effect. After assigning participants ($n = 134$, MTurk) to either a sadness appeal or a happiness appeal condition, participants reported their donation intention, skepticism towards the appeal, and sympathy. Their chronic regulatory focus was also measured. We conducted a moderated serial mediation analysis (Blanchard et al. 2016; Hayes 2015, PROCESS model 6) and found that a prevention (vs. promotion) focus activated persuasion knowledge against a sadness appeal that increased skepticism, which in turn disrupted the feelings of sympathy and demotivated giving; but this multi-chain mediation was not observed in the happiness appeal condition.

Studies 4 and 5 substantiated this mechanism by demonstrating the boundary conditions of our effect. In study 4, participants ($n = 241$, MTurk) were randomly assigned to one of the two cognitive capacity conditions (low vs. high), which was manipulated through a memory rehearsal task (Wegner et al. 1993; Yost and Weary 1996). After completing the task, all participants saw a sadness appeal and specified the amount (out of $10 lottery winnings) they were willing to pre-commit to the featured charity. Next, their chronic regulatory focus was measured. We found that constraining participants' cognitive capacity deactivated their persuasion knowledge, and as a result, regulatory focus no longer affected charitable giving even when the donation was solicited using a sadness appeal.

Study 5 ($n = 393$; MTurk) adopted a 2 (primed regulatory focus: promotion vs. prevention) x 2 (emotion appeal: sadness vs. happiness) x 2 (charity reliability: low vs. high) between-subjects design and demonstrated that persuasion knowledge against a sad charity appeal can be attenuated when the charity has a reputation as a reliable organization. Specifically, we conducted a moderated serial mediation analysis (with two moderators: W_1 = emotion appeal, W_2 = charity reliability) and find that skepticism (M1) and sympathy (M2) mediated the effect of regulatory focus on charitable giving only when the sadness appeal was used by a low reliability charity. When a charity is perceived to be reliable, participants' regulatory focus does not affect donor skepticism, feelings of sympathy, and charitable giving even when a sadness appeal is used to solicit the donation.

Finally, study 6 ($n = 234$, undergraduate students) validated the practical utility of understanding regulatory focus as a moderator for the effect of sadness appeal on charitable giving. Using an observable variable highly correlated with donors' regulatory orientation (i.e., cultural differences; Lee et al. 2000), we show that a sadness appeal demotivates giving among donors from an Eastern culture who tend to be prevention-oriented, compared to donors from a Western culture who tend to be promotion-oriented. The results highlight the importance of segmenting prospective donors based on observable donor characteristics correlated with regulatory focus when utilizing a sadness appeal to solicit a donation.

REFERENCES

Blanchard, S. J., Carlson, K. A., & Hyodo, J. D. (2016). The favor request effect: requesting a favor from consumers to seal the deal. *Journal of Consumer Research*, 42(6), 985-1001.

Garg, N., & Lerner, J. S. (2013). Sadness and consumption. *Journal of Consumer Psychology*, 23(1), 106-113.

Higgins, E. T., Friedman, R. S., Harlow, R. E., Idson, L. C., Ayduk, O. N., & Taylor, A. (2001). Achievement orientations from subjective histories of success: Promotion pride versus prevention pride. *European Journal of Social Psychology*, 31(1), 3-23.

Hayes, A. F. (2015). An index and test of linear moderated mediation. *Multivariate Behavioral Research*, 50(1), 1-22.

Lee, A. Y., Aaker, J. L., & Gardner, W. L. (2000). The pleasures and pains of distinct self-construals: the role of interdependence in regulatory focus. *Journal of Personality and Social Psychology*, 78(6), 1122-1134.

Oveis, C., Horberg, E. J., & Keltner, D. (2010). Compassion, pride, and social intuitions of self-other similarity. *Journal of Personality and Social Psychology*, 98(4), 618-630.

Pancer, S. M. (1988). Salience of appeal and avoidance of helping situations. *Canadian Journal of Behavioural Science/Revue canadienne des sciences du comportement*, 20(2), 133-139.

Pancer, M., Deforest, C., Rogers, I., & Schmirler, D. (1979a). The use of displays in soliciting charitable donations, *Social Behavior and Personality: An International Journal*, 7(1), 33-37.

Pancer, S. M., McMullen, L. M., Kabatoff, R. A., Johnson, K. G., & Pond, C. A. (1979b). Conflict and avoidance in the helping situation. *Journal of Personality and Social Psychology*, 37(8), 1406-1411.

Piff, P. K., Kraus, M. W., Côté, S., Cheng, B. H., & Keltner, D. (2010). Having less, giving more: the influence of social class on prosocial behavior. *Journal of Personality and Social Psychology*, 99(5), 771-784.

Seu, I.B. & Orgad, S. (2014). *Mediated humanitarian knowledge: Audiences' reactions and moral actions,* Birkbeck, University of London.

Small, D. A., & Verrochi, N. M. (2009). The face of need: Facial emotion expression on charity advertisements. *Journal of Marketing Research*, 46(6), 777–787.

Smith, C. A., & Ellsworth, P. C. (1985). Patterns of cognitive appraisal in emotion. *Journal of Personality and Social Psychology*, 48(4), 813-838.

Wegner, D. M., Erber, R., & Zanakos, S. (1993). Ironic processes in the mental control of mood and mood-related thought. *Journal of Personality and Social Psychology*, 65(6), 1093-1104.

Weiner, B., Graham, S., & Chandler, C. (1982). Pity, anger, and guilt: An attributional analysis. *Personality and Social Psychology Bulletin*, 8(2), 226-232.

Yost, J. H., & Weary, G. (1996). Depression and the correspondent inference bias: Evidence for more effortful cognitive processing. *Personality and Social Psychology Bulletin*, 22(2), 192-200.

Justified by Ideology: Why Conservatives Care Less About Corporate Social Irresponsibility

Fabian Christandl, Hochschule Fresenius - University of Applied Sciences Cologne, Germany
Anna Jasinenko, HHL - Leipzig Graduate School of Management, Germany
Timo Meynhardt, HHL - Leipzig Graduate School of Management, Germany

EXTENDED ABSTRACT

With growing political polarization, political ideology becomes increasingly important when trying to gain a deeper understanding of consumers and their motivations (e.g., Jost, 2017; Jost, Langer, and Singh, 2017). Recent studies imply that political conservatism predicts consumers' differences, for example, in brand preferences (Khan, Misra, and Singh, 2013), luxury consumption motivation (Kim, Park, and Dubois, 2018), consumer differentiation preferences (Ordabayeva and Fernandes, 2018), variety seeking (Fernandes and Mandel, 2014), anti-counterfeit ad influence (Septianto, Northey, and Dolan, 2019), financial risk-taking (Han, Jung, Mittal, Zyung, and Adam, 2019) and complaining behaviors (Jung, Garbarino, Briley, and Wynhausen, 2017). In the current research, we are interested in the impact of conservatism on consumers' corporate social responsibility (CSR) perceptions and reactions.

Building upon political psychology (Jost, 2017), motivated social cognition approaches (Jost, Glaser, Kruglanski, and Sulloway, 2003) and system justification theory (Jost, Banaji, and Nosek, 2004), we propose that conservatives indulge in a relatively high security-motivated social cognition and, therefore, justify the market system with all its irresponsible processes and outcomes, including irresponsible business behavior. Accordingly, we expect that conservatives perceive the CSR of irresponsible companies to be higher than liberals do and, in turn, are less motivated to penalize them. Moreover, we expect this justifying effect to be weaker when consumers evaluate rather responsible versus rather irresponsible companies. This reasoning is based on the finding that system justification translates mainly into the justification of system-threatening (i.e., irresponsible business behavior) but not system-supporting (i.e., responsible business behavior) aspects.

Study 1 tests whether MSJ mediates the effect of conservatism on the CSR perception of irresponsible companies. For this purpose, we conduct an online survey in Germany that was part of the Public Value Atlas project (Public Value Atlas, 2019). Our sample consists of 2,476 participants with at least 258 participants per company. The age of participants is between 18 and 88 (M=50.67, SD=17.3), and 54% are male. We allocate political party affiliation to conservatism based on the right-left and market-state (same results) allocation of German political parties by Decker (2018). Participants had to rate at least one of 12 companies, that were preselected based on media reports and international consumer websites for ethical consumption. As measure of CSR perception, participants answered four public value items (Meynhardt, 2009; α≥.83). Next, participants completed the fair market ideology short scale (Jost, Blount, et al., 2003; α=.77, which measures consumers' MSJ tendency. In line with our conceptual model, the overall estimate of the mediation effect of MSJ on the effect of conservatism on CSR perception of rather irresponsible companies (see table) corroborates that, owing to a stronger MSJ, conservatives perceive rather irresponsible organizations to be more socially responsible than their liberal counterparts do.

Study 2 aims at replicating this finding in another country (Switzerland) to test the robustness and generalizability of the effect to other cultures and political systems. Moreover, we investigate whether this ideologically influenced difference in CSR perception, in turn, affects consumers' reactions to irresponsible companies.

The final sample consists of 826 participants aged between 18 and 89 (M=49.66, SD=17.90), 52.2% of whom are female. For all three company cases, MSJ mediates the effect of consumers' conservatism on CSR perceptions of irresponsible companies, thus corroborating the findings from study 1. In addition, it shows for all three company cases that MSJ (M1) and consumers' CSR perceptions (M2) sequentially mediate the negative effect of conservatism on consumers' penalizing reactions to low CSR, thus corroborating the proposed relationships from our conceptual model (see table).

Study 3 aimed at testing the full conceptual model, which hypothesizes that MSJ and CSR perception sequentially mediate the effect of conservatism on consumers' reactions more strongly for irresponsible companies than for responsible companies. Moreover, Study 3 aimed at testing the robustness of our findings from the previous studies regarding irresponsible companies by using additional measures for our main variables. The study used a convenience sample of 168 German consumers, aged between 18 and 59 (M=27.04, SD=6.08), of whom 64.9% are female.). Participants indicated the perceived CSR of each of the three presented companies as measured by public value (α≥.79). As an alternative measure of CSR perception, we include a CSR scale (Currás-Pérez, Bigné-Alcañiz, and Alvarado-Herrera, 2009; α≥.91). Next, participants indicated the past consumption frequency of each company's products or services (α≥.78) and intention to penalize or reward each company (α≥.77). The questionnaire continued with the full fair market ideology scale to measure MSJ (α=.85). Next, participants indicated their conservatism by evaluating ideologically laden claims (Roberts, 1996; α=.71). We tested the proposed relationships with a moderated sequential mediation analysis (Hayes, 2018; Model 91), which accounts for the complete conceptual model. Overall, the pattern of results (see table) corroborates our full conceptual model.

Study 4 aimed at testing the full conceptual model and addressed a number of unsolved issues from previous studies. First, the mediator MSJ is contrasted to other forms of system justification in order to test whether MSJ in fact provides the best fitting form of system justification underlying the conservatism-CSR perception relationship. Second, we aim to control for company-specific confounders by looking at just one company and experimentally manipulating the overall CSR performance of this specific company. Third, we add consumers' boycotting intentions as an additional form of expected penalizing reactions to low CSR to address a broader range of consumer reactions. The sample consists of 149 German consumers, aged between 18 and 59 (M=29.07, SD=7.98), 45% female, who were recruited via Prolific. First, the results of a parallel mediation analysis show that MSJ remains the only significant mediator among the four system justification scales. Second, we replicate the moderated sequential mediation analysis from Study 3, which accounts for our complete conceptual model. The pattern of results corroborates our conceptual model for different measures used as mediators and DVs.

Future research could delve deeper into the question of whether the conservatism effect equally accounts for every type of CSR. From a managerial perspective, the findings from our research could help to address different segments of consumers more appropriately when dealing with CSR.

REFERENCES

Currás-Pérez, R., Bigné-Alcañiz, E., and Alvarado-Herrera, A. (2009), "The role of self-definitional principles in consumer identification with a socially responsible company," *Journal of Business Ethics*, 89(4), 547.

Decker, F. (2018), "Jenseits von links und rechts. Lassen sich Parteien noch klassifizieren?" *Aus Politik und Zeitgeschichte,* 46–47. Retrieved from https://www.bpb.de/apuz/279819/lassen-sich-parteien- noch-klassifizieren?p=all Accessed on 20 June 2019.

Fernandes, D. and Mandel, N. (2014), „Political conservatism and variety-seeking.," *Journal of Consumer Psychology*, 24(1), 79-86.

Han, K., Jung, J., Mittal, V., Zyung, J. D., and Adam, H. (2019), "Political Identity and Financial Risk Taking: Insights from Social Dominance Orientation," *Journal of Marketing Research*, 86(4), 581-601.

Hayes, A. F. (2018), "Introduction to Mediation, Moderation, and Conditional Process Analysis: A Regression-Based Approach," Second Edition. New York, NY: The Guilford Press.

Jost, J. T. (2017), "The marketplace of ideology: "Elective affinities" in political psychology and their implications for consumer behavior," *Journal of Consumer Psychology*, 27(4), 502–520.

Jost, J. T., Banaji, M. R., and Nosek, B. A. (2004), "A decade of system justification theory: Accumulated evidence of conscious and unconscious bolstering of the status quo," *Political Psychology*, 25(6), 881–919.

Jost, J. T., Blount, S., Pfeffer, J., and Hunyady, G. (2003), "Fair market ideology: Its cognitive-motivational underpinnings," *Research in Organizational Behavior,* 25, 53–91.

Jost, J. T., Glaser, J., Kruglanski, A. W., and Sulloway, F. J. (2003), "Political conservatism as motivated social cognition," *Psychological Bulletin*, 129(3), 339-375.

Jost, J. T., Langer, M., and Singh, V. (2017), "The Politics of Buying, Boycotting, Complaining, and Disputing: An Extension of the Research Program by Jung, Garbarino, Briley, and Wynhausen," *Journal of Consumer Research*, 44(3), 503–510.

Jung, K., Garbarino, E., Briley, D. A., and Wynhausen, J. (2017), "Blue and red voices: effects of political ideology on consumers' complaining and disputing behavior," *Journal of Consumer Research*, 44(3), 477-499.

Khan, R., Misra, K., and Singh, V. (2013), "Ideology and brand consumption," *Psychological Science*, 24(3), 326-333.

Kim, J. C., Park, B., and Dubois, D. (2018), "How Consumers' Political Ideology and Status-Maintenance Goals Interact to Shape Their Desire for Luxury Goods," *Journal of Marketing*, 82(6), 132-149.

Meynhardt, T. (2009), "Public value inside: What is public value creation?" *International Journal of Public Administration,* 32(3-4), 192–219.

Meynhardt, T. and Gomez, P. (2019), "Building blocks for alternative four-dimensional pyramids of corporate social responsibilities," *Business & Society*, 58(2), 404–438.

Ordabayeva, N. and Fernandes, D. (2018), "Better or different? How political ideology shapes preferences for differentiation in the social hierarchy," *Journal of Consumer Research*, 45(2), 227-250.

Public Value Atlas (2019), "Public Value Atlas Ranking Overview," Retrieved from: https://www.gemeinwohlatlas.de/en/atlas. Accessed on 23 June 2019.

Roberts, J. A. (1996), "Green consumers in the 1990s: profile and implications for advertising," *Journal of Business Research*, 36(3), 217–231.

Septianto, F., Northey, G., and Dolan, R. (2019), "The effects of political ideology and message framing on counterfeiting: The mediating role of emotions," *Journal of Business Research*, 99(June), 206-214.

Larger Screen, Inaccurate Perceptions: Investigating Visual Framing Effects on Online Shoppers' Product-Size Estimation

Sorim Chung, Rochester Institute of Technology, USA
Maria Karampela, University of Strathclyde, Scotland

EXTENDED ABSTRACT

Incorrect size is often a principal reason behind e-commerce returns. This research investigates the visual framing effects of screen size on e-shoppers' accuracy of product-size estimations. Three experiments reveal the mechanism behind screen size effects and inform practical recommendations about optimization of e-retailers' websites.

Introduction

As size issues are a common complaint for returns of online purchases (Reagan 2019), accurate product-size evaluations emerge as a key challenge for consumers and retailers, particularly as consumers nowadays use various devices for online shopping. We believe that the size of consumers' digital space, which varies by device type, may influence their accurate product-size estimations. However, screen-size research on the accuracy of online shoppers' visual information processing remains scant. Screen-size effects have been studied mostly in non-e-commerce environments, where a larger screen has been shown to positively influence consumers' emotional responses toward TV clips (Lombard et al. 2000; Reeves et al. 1999) and advertisements (Kim and Sundar 2016). In three experiments, we examine the impact of screen size on consumers' product attitudes, confidence, and product-size estimation errors, in e-commerce settings.

Theoretical Background & Hypotheses

According to visual frame theories (Künnapas 1955; 1959), the larger a square-shaped frame surrounding an object is, the shorter and thinner the object is perceived to be (Künnapas 1955). As a computer screen may work as a visual frame, we propose instead that larger-screen (e.g., PC) users perceive products to be larger than small-screen (e.g., smartphone) users (**H1**), as most websites tend to proportion the size of product images automatically.

Larger screens induce higher levels of excitement (Lombard et al. 2000) and arousal (Reeves et al. 1999) when viewing TV content. Similarly, online shopping using a large screen may lead to more positive product attitudes (**H2a**). We also expect that hedonic motivations (vs. utilitarian) strengthen the positive screen-size effects on attitudes (**H2b**) because hedonic-driven shopping experiences are perceived more positively (Childers et al. 2001; van Noort et al. 2012). As a larger screen leads to more positive affect in non-ecommerce settings (e.g., Lombard et al. 2000), large-screen users may pay less attention to product details, resulting in less accurate estimations (**H3a**), and this heuristic, rather than cognitive, effect may be stronger with hedonic shopping motivations (**H3b**).

Furthermore, a larger display holds more information (Dilon et al. 1990), making it easier to review lengthy product specifications, which may increase consumers' confidence about their decisions (Wang et al. 2015), as does product fluency (Deng et al. 2016; Tsai and McGill 2011). Therefore, in online shopping, a large screen may increase confidence about product size (**H4a**), and familiarity with products may strengthen the effects of screen size on the accuracy of product-size estimations (**H4b**). Finally, we propose that large-screen users' positive product attitudes and stronger confidence about the product size mediate the impact of screen size on product-size estimations, resulting in less accurate product-size estimation (**H5**).

Experiment 1: Basic Size Estimation

Experiment 1 involved a one-way between-subjects design (small 14"/large 22" screen), with 93 individuals (49.5% women; 83% aged 18–24). To test base effects, participants estimated sizes (in inches) for an identical set of basic black-colored shapes (rectangle, oval, triangle, line) and indeed perceived them all to be longer in the large screen condition ($F(1, 92)=22.37$, $p<.0001$), confirming H1.

Experiment 2: Product Familiarity

To examine screen-size effects when evaluating product sizes, we used a 2 (screen size: small/large)×2 (product familiarity: familiar/unfamiliar) between-subjects design, with 150 individuals (42% women; 37% aged 25–34). The product familiarity manipulation was successful ($p<.0001$). Large-screen users were less accurate only in unfamiliar conditions ($p=.024$), supporting H4b. They were also more confident about their estimations ($F(1, 146)=25.20$, $p<.0001$), supporting H4a, in both familiar ($p<.001$) and unfamiliar conditions ($p=.01$). The mediation analysis (PROCESS; model 6;10,000 bootstrap samples; Hayes 2018) showed a significant serial mediation effect ($b=.45$, CI 95% [.002, 1.25]) of attitudes and confidence between screen size and product-size estimation, supporting H5.

Experiment 3: Shopping Motivations

To test the role of shopping motivations, we used a 2 (screen size: large/small)×2 (shopping motivation: hedonic/utilitarian) between-subjects design with 169 individuals (53.3% women; 48% aged 35-44). The manipulation was successful; the hedonic condition found the task more fun (p=.008). Large-screen users displayed more positive attitudes ($F(1, 165)=11.28$, $p=.001$), and even more so with a hedonic motivation ($p=001$), supporting H2a and H2b. Large-screen users made less accurate product-size estimations ($F(1, 165)=7.95$, $p=.005$); this was significant in hedonic conditions only ($p<.003$), supporting H3a and H3b. Large-screen users also felt more confident about their estimations ($F(1, 165)=20.72$, $p<.001$) in both hedonic ($p<.001$) and utilitarian conditions ($p=.018$), supporting H4a. The proposed serial-mediation analysis (PROCESS; model 6;10,000 bootstrap samples; Hayes 2018) was not significant.

General Discussion And Implications

Overall, this research introduces screen sizes as online retail cues that influence the accuracy of product-size evaluations in e-commerce. Larger screens led to more positive attitudes, stronger confidence, and less accurate size estimations. Moreover, our findings are also in line with the previous findings on the positive associations between screen size and emotional responses in non-e-commerce settings (e.g., Chae and Kim 2004; Lombard et al. 1997; Kim and Sundar 2014, 2016).

The findings highlight that screen size functions like a visual sensory cue, influencing customers' emotional status and ultimately product evaluations. Businesses should improve the experience of consumers using smaller screens by providing tools to improve their confidence. Providing more videos may enable businesses to better promote products to small-screen users while advanced technologies

(e.g. AR) may also help businesses in reducing negative screen-size effects and increasing consumer confidence.

Future research may want to examine visual framing effects on different visual measures such as volume estimation, whether such screen size effects are consistent in VR/AR environments, and whether they have spill-over effects on offline product evaluations.

REFERENCES

Chae, Minhee and Jinwoo Kim (2004), "Do Size and Structure Matter to Mobile Users? An Empirical Study of the Effects of Screen Size, Information Structure, and Task Complexity on User Activities with Standard Web Phones," *Behaviour & Information Technology*, 23(3), 165–81.

Childers, Terry L., Christopher L. Carr, Joann Peck, and Stephen Carson (2001), "Hedonic and Utilitarian Motivations for Online Retail Shopping Behavior," *Journal of Retailing*, 77(4), 511–35.

Deng, Xiaoyan, Barbara E. Kahn, H. Rao Unnava, and Hyojin Lee (2016), "A 'Wide' Variety: Effects of Horizontal Versus Vertical Display on Assortment Processing, Perceived Variety, and Choice," *Journal of Marketing Research*, 53(5), 682–98.

Dillon, A., Richardson, J., & Mcknight, C. (1990). The effects of display size and text splitting on reading lengthy text from screen. *Behaviour & Information Technology*, 9(3), 215–227.

Hayes, Andrew F. (2018), *Introduction to Mediation, Moderation, and Conditional Process Analysis: A Regression-Based Approach*. New York: Guilford Press.

Kim, Ki Joon and S Shyam Sundar (2014), "Does Screen Size Matter for Smartphones? Utilitarian and Hedonic Effects of Screen Size on Smartphone Adoption.," *Cyberpsychology, behavior and social networking*, 17(7), 466–73.

Kim, Ki Joon and S. Shyam Sundar (2016), "Mobile Persuasion: Can Screen Size and Presentation Mode Make a Difference to Trust?," *Human Communication Research*, 42(1), 45–70.

Künnapas, Theodor M. (1955), "Influence of Frame Size on Apparent Length of a Line," *Journal of Experimental Psychology*, 50(3), 168–70.

Künnapas, Theodor M. (1959), "The Vertical-Horizontal Illusion in Artificial Visual Fields," *The Journal of Psychology*, 47(1), 41–48.

Lombard, Matthew, Theresa B. Ditton, Maria Elizabeth Grabe, and Robert D Reich (1997), "The Role of Screen Size in Viewer Responses to Television Fare," *Communication reports*, 10(1), 95–106.

Lombard, Matthew, Robert. D. Reich, Maria Elizabety Grabe, Cheryl Campanella Bracken, and Theresa Bolmarcich Ditton (2000), "Presence and Television," *Human Communication Research*, 26(1), 75–98.

Reagan, Courtney (2019), "That sweater you don't like is a trillion-dollar problem for retailers. These companies want to fix it," available at: https://www.cnbc.com/2019/01/10/growing-online-sales-means-more-returns-and-trash-for-landfills.html

Reeves, Byron, Annie Lang, Eun Young Kim, and Deborah Tatar (1999), "The Effects of Screen Size and Message Content on Attention and Arousal," *Media Psychology*, I, 49–67.

Tsai, Claire I. and Ann L. McGill (2011), "No Pain, No Gain? How Fluency and Construal Level Affect Consumer Confidence," *Journal of Consumer Research*, 37(5), 807–21.

van Noort, Guda, Hilde a.M. Voorveld, and Eva a. van Reijmersdal (2012), "Interactivity in Brand Web Sites: Cognitive, Affective, and Behavioral Responses Explained by Consumers' Online Flow Experience," *Journal of Interactive Marketing*, 26(4), 223–34.

Wang, Rebecca Jen Hui, Edward C. Malthouse, and Lakshman Krishnamurthi (2015), "On the Go: How Mobile Shopping Affects Customer Purchase Behavior," *Journal of Retailing*, 91(2), 217–34.

A Bird in the Hand is Yours:
The Relationship Between Psychological Ownership and Psychological Distance

Bart Claus, IESEG School of Management, France
Jiska Eelen, Vrije Universiteit Amsterdam, The Netherlands
Luk Warlop, BI Norwegian Business School, Norway

EXTENDED ABSTRACT

Ownership largely determines the house and bed we pick to sleep in, whether we take a car, bike, or taxi to work, and what kind of coffee we drink. As ownership organizes our attention (Ashby, Dickert, and Glockner 2012; Turk et al. 2011) and memory (Cunningham et al. 2008; van den Bos et al. 2010), it is critical that what drives these effects is not legal ownership but the perception and psychological *experience* of ownership (Carmon, Wertenbroch, and Zeelenberg 2003; Morewedge and Giblin 2015; Morewedge et al. 2009). Psychological possessions are included in the extended self as concentric layers around the core self, ordered according to their centrality (Belk (1988). Varying degrees of psychological ownership correspond to varying positions of the ownership target on these concentric layers, each with its distance from the core self. Combining this distance with the referent position of the self, we propose that a schematic match exists between the cognition of ownership and that of psychological distance.

Psychological distance is the subjective remoteness of an experienced stimulus (Amit, Algom, and Trope 2009). As with ownership, the self is a central reference point. Research has identified four dimensions of psychological distance from a target to the self: time (Liberman, Sagristano, and Trope 2002; Liberman and Trope 1998), probability (Wakslak et al. 2006), spatial distance, and social distance (Fujita et al. 2006; Liberman and Trope 2008). By definition, the self is psychologically close (Malär et al. 2011). We propose that possessions as extensions of the self can be mapped on psychological distance, and that ownership itself is associated with psychological proximity. Four studies test this prediction.

Study 1 applied a scenario based on a road trip with a rented car, we find that participants who feel greater ownership of the car also feel closer to the location ($r = .47$, $p < .001$), feel that the trip is closer in time ($r = .42$, $p < .001$), and feel that the trip is more certain to take place ($r = .36$, $p < .001$). Based on control measures, we conclude that effort and ease of retrieval are unlikely explanations of these results.

Study 2 used an implicit association test (IAT) (Greenwald, McGhee, and Schwartz 1998; Greenwald, Nosek, and Banaji 2003) to assess the implicit association between words related to ownership (vs. non-ownership) and words related to proximity (vs. remoteness) for each psychological distance dimension. We found significantly positive D-biep scores for the association between ownership and spatial proximity ($D = .81$, $SD = .33$, $n = 38$; $t(37) = 17.97$, $p < .001$), probability ($D = .78$, $SD = .27$, $n = 35$; $t(34) = 17.17$, $p < .001$), social proximity ($D = 1.051$, $SD = .31$, $n = 33$; $t(32) = 19.48$, $p < .001$), and temporal proximity ($D = .73$, $SD = .31$, $n = 31$; $t(30) = 12.98$, $p < .001$). This result indicate a stronger implicit association between ownership and psychological proximity than between ownership and remoteness, with the reverse true for non-ownership.

For study 3, we focused more on a marketing practitioner point of view. Several marketing variables (delivery time, procurement, purchase risk, social proof) can be thought of as mapping on psychological distance dimensions. Studies 3A and 3B investigate whether temporal and spatial distance can affect ownership in a retail context.

Study 3.A focused on time. Participants were asked to choose their preferred lamp from a list of twelve – each with picture and description – as if they were considering buying it (Peck, Barger, and Webb 2013). In the close time condition, information was added that the lamp would be delivered the next day. In the distant time condition, the lamp would be delivered 11 days later. Controlling for attractiveness, a planned comparison for close time versus far time indicated that a closer delivery time yielded more ownership ($M = 5.00$, $SD = 1.82$, $n = 42$) than when delivery was further in the future ($M = 4.26$, $SD = 2.00$, $n = 42$; $t(116) = 1.94$, $p = .055$, Cohen's $d = .42$). The baseline condition yielded ownership levels between those of the close and the far condition ($M = 4,77$, $SD = 1.94$, $n = 48$).

Study 3.B focused on physical distance, and used a scenario similar to the one in Study 3A. A lamp found in a web shop from a store close to home yielded more ownership ($M = 4.42$, $SD = 1.91$, $n = 38$) than when the store and lamp were located at the US Coast opposite to where participants were closest ($M = 3.42$, $SD = 2.42$, $n = 31$ $t(113) = 2.37$, $p < .05$, Cohen's $d = .57$). While the contrast between the baseline condition and the close space condition was not significant, the far condition seemed to reduce ownership compared to the baseline condition ($t(113) = 1.90$, $p = .06$, Cohen's $d = .44$). In line with literature (Liberman and Trope 2008), participants apparently assume proximity when evaluating products without information to the contrary (e.g., delivery times or shipping locations).

General Discussion

Our findings extend the egocentric categorization model of ownership. The idea that possessions are included in the (extended) self (Belk 1988; Weiss and Johar 2013) is one of the most influential ideas in consumer research literature. While the egocentric categorization model of ownership discussed similarities between ownership and social categorization (Weiss and Johar 2013), we now show that ownership is more generally associated with various dimensions (space, time, probability, sociality) of psychological distance, adding to the operational meaning of the extended self (Cohen 1989).

Our causal paradigm highlights an intrinsic challenge for contemporary online and on-demand retailing that necessarily comprises psychological remoteness. Increasingly, items are not available for physical inspection (are physically remote). They cannot be received immediately (are temporally remote) and are chosen on the basis of strangers' ratings instead of friends' advice (are socially remote). Our studies indicate that relying on proximity cues can to some extent attenuate these intrinsic challenges of contemporary retailing.

REFERENCES

Amit, Elinor, Daniel Algom, and Yaacov Trope (2009), "Distance-Dependent Processing of Pictures and Words," *Journal of Experimental Psychology: General*, 138 (3), 400.

Ashby, N. J. S., S. Dickert, and A. Glockner (2012), "Focusing on What You Own: Biased Information Uptake Due to Ownership," *Judgment and Decision Making*, 7 (3), 254-67.

Belk, Russell W. (1988), "Possessions and the Extended Self," *Journal of Consumer Research*, 15 (2), 139-68.

Carmon, Ziv, Klaus Wertenbroch, and Marcel Zeelenberg (2003), "Option Attachment: When Deliberating Makes Choosing Feel Like Losing," *Journal of Consumer Research*, 30 (1), 15-29.

Cohen, Joel B. (1989), "An over-Extended Self?," *Journal of Consumer Research*, 16 (1), 125-28.

Cunningham, Sheila J., David J. Turk, Lynda M. Macdonald, and C. Neil Macrae (2008), "Yours or Mine? Ownership and Memory," *Consciousness and Cognition*, 17 (1), 312-18.

Fujita, Kentaro, Marlone D. Henderson, Juliana Eng, Yaacov Trope, and Nira Liberman (2006), "Spatial Distance and Mental Construal of Social Events," *Psychological science*, 17 (4), 278-82.

Greenwald, Anthony G, Debbie E McGhee, and Jordan LK Schwartz (1998), "Measuring Individual Differences in Implicit Cognition: The Implicit Association Test," *Journal of Personality and Social Psychology*, 74 (6), 1464.

Greenwald, Anthony G, Brian A Nosek, and Mahzarin R Banaji (2003), "Understanding and Using the Implicit Association Test: I. An Improved Scoring Algorithm," *Journal of Personality and Social Psychology*, 85 (2), 197.

Liberman, Nira, Michael D. Sagristano, and Yaacov Trope (2002), "The Effect of Temporal Distance on Level of Mental Construal," *Journal of Experimental Social Psychology*, 38 (6), 523-34.

Liberman, Nira and Yaacov Trope (1998), "The Role of Feasibility and Desirability Considerations in near and Distant Future Decisions: A Test of Temporal Construal Theory," *Journal of Personality and Social Psychology*, 75 (1), 5-18.

--- (2008), "The Psychology of Transcending the Here and Now," *science*, 322 (5905), 1201-05.

Malär, Lucia, Harley Krohmer, Wayne D Hoyer, and Bettina Nyffenegger (2011), "Emotional Brand Attachment and Brand Personality: The Relative Importance of the Actual and the Ideal Self," *Journal of Marketing*, 75 (4), 35-52.

Morewedge, Carey and Colleen Giblin (2015), "Explanations of the Endowment Effect: An Integrative Review," *Trends in cognitive sciences*, 19 (6), 339-48.

Morewedge, Carey K., Lisa L. Shu, Daniel T. Gilbert, and Timothy D. Wilson (2009), "Bad Riddance or Good Rubbish? Ownership and Not Loss Aversion Causes the Endowment Effect," *Journal of Experimental Social Psychology*, 45 (4), 947-51.

Peck, Joann, Victor A Barger, and Andrea Webb (2013), "In Search of a Surrogate for Touch: The Effect of Haptic Imagery on Perceived Ownership," *Journal of Consumer Psychology*, 23 (2), 189-96.

Turk, David J., Kim van Bussel, Joanne L. Brebner, Andreea S. Toma, Olav Krigolson, and Todd C. Handy (2011), "When "It" Becomes "Mine": Attentional Biases Triggered by Object Ownership," *Journal of Cognitive Neuroscience*, 23 (12), 3725-33.

van den Bos, Mirjam, Sheila J. Cunningham, Martin A. Conway, and David J. Turk (2010), "Mine to Remember: The Impact of Ownership on Recollective Experience," *The Quarterly Journal of Experimental Psychology*, 63 (6), 1065-71.

Wakslak, Cheryl J., Yaacov Trope, Nira Liberman, and Rotem Alony (2006), "Seeing the Forest When Entry Is Unlikely: Probability and the Mental Representation of Events," *Journal of Experimental Psychology-General*, 135 (4), 641-53.

Weiss, Liad and Gita V Johar (2013), "Egocentric Categorization and Product Judgment: Seeing Your Traits in What You Own (and Their Opposite in What You Don't)," *Journal of Consumer Research*, 40 (1), 185-201.

Followers and the Impact of Social Media Influencers: A Construal Level Perspective

Kirsten Cowan, University of Edinburgh, Scotland
Eric Boyd, University of Edinburgh, Scotland

EXTENDED ABSTRACT

Managing brands is a critical aspect of marketing, more so for marketers using social media influencers (SMIs). A SMI is a person possessing a loyal following to content they create and share online (Bailis 2019). Voorveld (2019) and others have challenged researchers to identify what makes SMIs effective. Recent research has primarily taken a power perspective. For instance, Kupfer et al. (2018) emphasize the expert and referent-based power a SMI on social media. Specifically, Kupfer et a;. (2018) find that SMIs who promote composite brands are more persuasive when they have high power (i.e. have more followers) because consumers can satisfy their desire to be close to a SMI with the composite brand product involving the SMI. Contrary to this research, we argue that recommendations to use brand with a larger SMI following is not always the most effective strategy. Rather, in a single brand context no involving a SMI, we argue that the SMI with lower (vs. higher) followers can be more persuasive in certain cases. We aim to respond to the following research questions. Under which conditions are SMIs with fewer (vs. higher) followers more persuasive? Does consumers' perceived connection to the brand mediate?

Drawing from construal level theory, we argue that the perceived social distance between the consumer and the SMI is based on the number of followers in a single brand situation not involving a SMI's brand. When SMIs have a higher (lower) following, greater (less) social distance should be perceived, which should result in consumers experiencing an abstract (concrete) mindset. The effectiveness of a SMI is then argued to depend upon matching the diagnosticity of information in the decision-context with the consumer's construal mindset evoked by the SMI's number of followers.

We also argue that self-brand connection, reflecting the extent consumers integrate the brand into their sense of self (Escalas 2004), mediates the effect of the construal matchup on brand responses. Kupfer et al. (2018) propose that a SMI's number of followers increases their power base and strengthens the identification people feel towards a composite brand. We focus on single brand situations and argue that it is the construal matching that facilitates feelings of brand identification, and can occur for SMIs with fewer followers, as long as the information in the context is more diagnostic.

Study 1, using field data on Instagram, examines likes to SMI posts. Diagnosticity is facilitated by attribute-level information like brand tagging, which is heuristic (e.g. Kelting et al. 2019). The quasi-experiment mixed design included one between-subjects factor (SMI following: low vs. high) and one within-subjects factor (brand: tagged vs. untagged). Contrasts for the low (high) follower SMIs showed that tagged (untagged) were more liked, supporting a match-up effect between SMI following and information diagnosticity.

Study 1 integrates media diagnosticity (e.g. Colicv et al. 2018), where earned (vs. owned) media is more diagnostic. Additionally, we rule out credibility as an alternative explanation. A between subjects experiment included two manipulated factors: media (owned vs. earned) and SMI following (low vs. high). Respondents viewed one of four posts and responded to purchase intentions and covariates (e.g. product involvement and SMI familiarity). A MANCOVA with the source characteristics yielded no significant main effects or interactions. A 2-way ANCOVA examining purchase intentions ($F(1, 209) = 7.75$; $p < .01$) revealed that the SMI with the high (low) following had higher purchase intentions when appearing on owned (earned) media. This study extends construal match up to the channel and reports no differences in credibility.

The goal of study 2 is to provide more robust evidence with a more (vs. less) innovative products to match construal (e.g. Alexander et al., 2008). An experimental study manipulated product innovativeness (low vs. high) and SMI following (low vs. high). Participants indicated their purchase intentions, followed by the same covariates. The 2-way ANCOVA on purchase intentions ($F(1,157) = 5.09$; $p < .03$) was significant. For the SMI with low following, purchase intentions were higher when product innovativeness was low (vs. high). Interestingly, the SMI with more followers did not gain persuasiveness with high product innovativeness, indicating an ordering of effects.

In study 3, we created a fictitious SMI and posts, holding earned media constant, and examining self-brand connection as a mediator. A between-subjects experiment manipulated SMI following (low vs. high) and brand tagging (present vs. absent). Respondents viewed one post and indicated their purchase intentions, self-brand connection, and covariates. A 2-way ANCOVA on purchase intentions ($F(1, 154) = 12.62$; $p = .001$) suggested that for the low (high) power SMI, purchase intentions were higher when the brand was tagged (untagged). PROCESS Model 8 provided support for self-brand connection as a partial mediator for purchase intentions. This final study demonstrates that in the presence of the matchup, consumers feel more connected to the brand, which then facilitates positive consumer responses.

Overall, a field study and three experiments supported the novel theoretical framework focusing on construal level theory. Furthermore, the research offers a new mediator to CL matching, that of self-brand connection. These results make several contributions. First, we introduce construal level theory as a valuable theoretical framework to understand the impact of SMI following. Contrary to Kupfer et al. (2018), we document instances where a SMI with high power may be less helpful for branding. Second, we provide early evidence of the differential impact of different media channels in the construal matching effect. Third, we identify a new mechanism underlying the construal level matchup- self-brand connection. Several recommendations are offered for marketing managers who use SMIs.

REFERENCES

Alexander, D. (2008). Consumers' elaboration of really-new-product messages. *Advances in Consumer Research*, *35*, 1011-1012.

Bailis, R (2019). The state of SMI marketing: 10 SMI marketing statistics to inform where you invest. *Big Commerce*, https://www.bigcommerce.com/blog/SMI-marketing-statistics/#what-is-SMI-marketing (accessed 11/22/2019).

Colicev, A.i, Malshe, A., Pauwels, K., & O'Connor, P. (2018) Improving consumer mindset metrics and shareholder value through social media: The different roles of owned and earned media. *Journal of Marketing*, *82*(1), 37-56.

Escalas, J. E. (2004). "Narrative Processing" building consumer connections to brands. *Journal of Consumer Psychology*, 14 (1&2), 168-180.

Hughes, C., Swaminathan, V., & Brooks, G. (2019). Driving brand engagement through online social influencers: An empirical investigation of sponsored blogging campaigns. *Journal of Marketing, 83*(5), 78–96.

Jin, L., Hu, B., & He, Y. (2014). The recent versus the out-dated: An experimental examination of the time-variant effects of online consumer reviews. *Journal of Retailing*, *90*(4), 552-566.

Kelting, K., Berry, C., & Van Horen, F. (2019). The presence of copycat private labels in a product set increases consumers' choice ease when shopping with an abstract mindset. *Journal of Business Research, 99*, 264-274.

Kim, K., Lee, S., & Choi, Y. K. (2019). Image proximity in advertising appeals: Spatial distance and product types. *Journal of Business Research, 99*, 490-497.

Kupfer, A-K., Holte, N., Kübler, R., & Hennig-Thurau, T. (2018). The role of the partner brand's social media power in brand alliances. *Journal of Marketing, 82*(3), 25–44.

Magee, J. & Smith, P. (2013). The social distance theory of power. *Personality and Social Psychology Review, 17,* 158-186.

Namkoong, J.E., Ro, J. H., & Henderson, M. D. (2019). Responding to causal uncertainty in the Twitterverse: When abstract language and social prominence increase message engagement. *Journal of Interactive Marketing*, *45*(1), 81-98.

Petty, R. & Cacioppo, J. (1986). The elaboration likelihood model of persuasion. *Advances in Experimental Social Psychology, 19*, 123-205.

Roose, G. , Vermeir, I. , Geuens, M., & Van Kerckhove, A. (2019). A match made in heaven or down under? The effectiveness of matching visual and verbal horizons in advertising. *Journal of Consumer Psychology*, *29*, 411-427.

Tsai, C. I. & McGill, A. L. (2011). No pain, no gain? How fluency and construal level affect consumer confidence. *Journal of Consumer Research, 37*(5), 807–821.

Voorveld, H. A. M. (2019). Brand communication in social media: A research agenda. *Journal of Advertising, 48*(1), 14-26.

Consumers Respond to Artificial Intelligence Recommendations: Experiential vs. Material Framing

Nadia Danienta, University of Illinois at Urbana-Champaign, USA
Aric Rindfleisch, University of Illinois at Urbana-Champaign, USA

EXTENDED ABSTRACT

Artificial intelligence (AI), powered by algorithms, has begun to transform the way consumers shop (Kahn, Inman, and Verhoef, 2018). The use of AI as a shopping tool is projected to grow rapidly as the computers and software that enable their algorithms are getting smarter, faster, and cheaper (Bohn, 2019). Thus, understanding how consumers respond to AI recommendations is an important issue for both research and practice.

Although algorithms outperform humans, people are reluctant to rely on algorithm's due to "algorithm aversion," which makes individuals less likely to comply with its recommendations, leading to suboptimal outcomes (Dzindolet et al., 2002; Beck et al., 2011; Dietvorst, Simmons, & Massey, 2015; Dietvorst, Simmons, & Massey, 2016; Yeomans et al., 2017; Bonaccio & Dalal, 2006; Yaniv & Kleinberger, 2000; Yaniv, 2004).

A handful of empirical experiments have examined people's aversion toward AI due to an absence of the sense of self. In subjective domains governed by personal taste, participants relied on friends over recommender systems for book, movie, and joke recommendations (Sinha & Swearingen, 2001; Yeomans, Shah, Mullainathan, & Kleinberg, 2017). After seeing an algorithm err, people relied more on themselves than the algorithm, (Dietvorst et al., 2015; Dzindolet, Pierce, Beck, & Dawe, 2002). Therefore, offerings with a greater degree of connection to the self should allow consumers to overcome algorithm aversion. Our research takes a different approach, instead of changing perceptions of AI, we focus on changing perceptions of the purchase experience itself in relation to one's self.

Prior research suggests that consumers regard recommendations made by AI as externally generated and thus, are unlikely to regard these recommendations as attributable to the self (Schmitt 2019). As a result, these recommendations may threaten consumer identity and sense of agency (Leung et al., 2018; Longoni, Bonezzi, & Morewedge 2019). However, previous research on experiential consumption finds that experiences enhance consumers' sense of self-connection because they reveal insights to their true selves (Carter & Gilovich, 2012; Kim et al., 2016). Experiences become part of our autobiographical memory and become part of who we are as individuals. Using real-world AI interfaces, we find that AI assistance lowers evaluations for material purchases (study 1), but increases evaluations for experiential purchases (study 2). Underlying this AI effect is an enhanced self-connection, even when the same purchase (book subscription service) is framed experientially versus materially (study 3).

In study 1, 129 undergraduates (50.4% female; M_{age} = 20.33 years, SD = 1.33) from an American university were randomly assigned to conditions: control vs. AI. First, all participants imagined that they planned to purchase a rain jacket from The North Face brand. Control participants were asked to search online on The North Face website to select a rain jacket (https://www.thenorthface.com/). In the AI condition, used AI technology (https://www.thenorthface.com/xps). The AI narrowed their search results, but participants still chose among those options similar to the control. Afterward, participants evaluated the material purchase on 7-point scales (good, appeal, desire, favorable). As predicted there was a main effect of condition on mean rain jacket evaluations ($F(1, 127)$ = 8.44, p = .004) where participants lowered their evaluations of the rain jacket in the AI-assisted condition (M_{AI} = 4.62) compared to the control condition ($M_{control}$ = 5.27).

In study 2, 136 undergraduates (51.5% female; M_{age} = 20.37 years, SD = 1.34) were randomly assigned to conditions: control vs. AI. In all conditions, participants imagined that they planned to purchase movie tickets and were seeking out more information (i.e. the closest movie theaters, etc.), which was standardized. Control participants read information on the computer in order to answer specific questions. In contrast, participants in the AI condition asked Alexa the same questions using an Amazon Echo Dot in the laboratory, then evaluated the movie. Finally, we examined participants' sense of self-connection (2-item measure) with the movie.

As predicted, we found a main effect of condition on mean movie evaluations ($F(1, 134)$ = 4.26, p = .040) where participants increased their evaluations in the AI-assisted condition (M_{AI} = 4.60) compared to the control condition ($M_{control}$ = 4.25). AI predicted a sense of self-connection with the movie (b = .53, SE = .26, $t(134)$ = 2.08, p = .039), which in turn predicted movie evaluations (b = .29, β_{exp} = 3.51, p = .014). Bootstrapping analysis with 5,000 samples suggested that the conditional indirect effect of AI on movie evaluations via a sense of self-connection was positive and significant with a 95% confidence interval that did not include zero (a x b = 0.15; SE = .078; 95% CI: .017 - .32).

In study 3, we framed the same book subscription service as a material or experiential purchase and manipulated the origin of the recommendations (human vs. AI). We randomly assigned 177 MTurk participants (51.4% female; M_{age} = 38.26 years, SD = 20.42) in a 2 (recommender: human vs. AI) x 2 (purchase frame: material vs. experiential) design. Participants either read a description that emphasized how the books would look on their bookshelf (material frame) or the experience of reading the books (experiential frame; Rosenzweig & Gilovich, 2012). Next, participants indicated their preferences (i.e. genre, book length, etc.). Then, participants either read that a human or AI generated the same book recommendations. Finally, the books were evaluated.

Results revealed a significant interaction on mean book evaluations ($F(1, 173)$ = 5.62, p = .019). When the books were recommended by an AI, evaluations were significantly higher in the experiential frame condition ($M_{experiential}$ = 4.00) compared to the material frame condition ($M_{material}$ = 3.33; $F(1, 173)$ = 7.93, p = .046). However, there was no effect of framing when the books were recommended by a human ($F < 1$). Bootstrapping analyses indicated that the mediating effect of self-connection was significant when the purchase was framed as an experience.

In sum, AI assistance lowers evaluations for material purchases, but increases evaluations for experiential purchases because of an enhanced sense of self-connection. Framing purchases as experiences serves as an inexpensive strategy to enhance recommendations from algorithms.

REFERENCES

Beck, A. H., Sangoi, A. R., Leung, S., Marinelli, R. J., Nielsen, T. O., van de Vijver, M. J., ... & Koller, D. (2011). Systematic analysis of breast cancer morphology uncovers stromal features associated with survival. *Science Translational Medicine*, 3(108), 108ra113-108ra113.

Bonaccio, S., & Dalal, R. S. (2006). Advice taking and decision-making: An integrative literature review, and implications for the organizational sciences. *Organizational Behavior and Human Decision Processes*, 101(2), 127-151.

Carter, T. J., & Gilovich, T. (2012). I am what I do, not what I have: The differential centrality of experiential and material purchases to the self. *Journal of Personality and Social Psychology*, 102(6), 1304.

Dietvorst, B. J., Simmons, J. P., & Massey, C. (2015). Algorithm aversion: People erroneously avoid algorithms after seeing them err. *Journal of Experimental Psychology: General*, 144(1), 114.

Dietvorst, B. J., Simmons, J. P., & Massey, C. (2016). Overcoming algorithm aversion: People will use imperfect algorithms if they can (even slightly) modify them. *Management Science*, 64(3), 1155-1170.

Dzindolet, M. T., Pierce, L. G., Beck, H. P., & Dawe, L. A. (2002). The perceived utility of human and automated aids in a visual detection task. *Human Factors*, 44(1), 79-94.

Kahn, B. E., Inman, J. J., & Verhoef, P. C. (2018). Introduction to special issue: Consumer response to the evolving retailing landscape. *Journal of the Association for Consumer Research*, 3(3), 255-259.

Kim, J., Seto, E., Christy, A. G., & Hicks, J. A. (2016). Investing in the real me: Preference for experiential to material purchases driven by the motivation to search for true self-knowledge. *Self and Identity*, 15(6), 727-747.

Leung, E., Paolacci, G., & Puntoni, S. (2018). Man versus machine: Resisting automation in identity-based consumer behavior. *Journal of Marketing Research*, 55(6), 818-831.

Longoni, C., Bonezzi, A., & Morewedge, C. K. (2019). Resistance to medical artificial intelligence. *Journal of Consumer Research*, 46(4), 629-650.

Rosenzweig, E., & Gilovich, T. (2012). Buyer's remorse or missed opportunity? Differential regrets for material and experiential purchases. *Journal of Personality and Social Psychology*, 102(2), 215.

Schmitt, B. (2019). Speciesism: An obstacle to AI and robot adoption. *Marketing Letters*: 1-4.

Sinha, R. R., & Swearingen, K. (2001, June). Comparing recommendations made by online systems and friends. In *DELOS*.

Yaniv, I., & Kleinberger, E. (2000). Advice taking in decision making: Egocentric discounting and reputation formation. *Organizational Behavior and Human Decision Processes*, 83(2), 260-281.

Yaniv, I. (2004). The benefit of additional opinions. *Current directions in psychological science*, 13(2), 75-78.

Yeomans, M., Shah, A. K., Mullainathan, S., & Kleinberg, J. (2016). Making sense of Recommendations. Working Paper.

Insights into the Black Box: Input Explainability of
Algorithmic Decisions Drives Consumer Satisfaction in the Digital World

Ipek Demirdag, University of California Los Angeles, USA
Suzanne Shu, University of California Los Angeles, USA

EXTENDED ABSTRACT

It has been long acknowledged that computational prediction procedures may yield more accurate predictions than human judges (Dawes 1979; Meehl 1954). Nevertheless, people are often algorithm averse, that is, they are less willing to rely on algorithms than humans in tasks such as forecasting (Dietvorst, Simmons, and Massey 2015). Previous research on algorithm aversion has largely examined algorithmic *forecasts* or *recommenders* and not algorithmic *decisions*. This paper explores an uninvestigated facet of algorithm aversion: consumer attitudes and behavior regarding decisions that algorithms make on their behalf.

We explore consumers' conceptualizations of human and algorithmic decision processes. We suggest that consumers perceive algorithms as *black boxes*, but they perceive their own decision processes as more transparent. This distinction drives algorithm aversion for decision-making. Specifically, we propose that lower *perceived process transparency* (i.e., a decision characteristic whereby a decision process is perceived to be understood) explains the lower trust in and preference against algorithmic decision-makers relative to human (either self or other) decision-makers. Importantly, we test whether *input explainability* (i.e., the consumer's ability to know relevant input information regarding a decision) increases perceived process transparency and trust, leading to higher satisfaction with the decisions made in the digital world.

Study 1: Does Process Transparency Explain Preferences For Self Choice Over Algorithmic Choice?

The experiment involved a 2 (Choice Type: Self Choice (SC), Algorithmic Choice (AC)) x 3 (Choice Context: AirBnB, Vending Machine, Uber) between-subjects design, in which participants (N = 957) were randomly assigned to one of six conditions.

There was a significant main effect of choice type on process transparency: Self Choice participants thought their decision was more process transparent than Algorithmic Choice participants ($F(1, 955) = 150.70$, $p < .001$). Self (vs. Algorithmic) Choice participants trusted their (vs. algorithm's) decisions more ($F(1, 955) = 136.20$, $p < .001$) and were more satisfied ($F(1, 955) = 23.90$, $p < .001$).

A serial mediation analysis uncovered an indirect effect of the algorithmic (vs. self) choice on satisfaction through process transparency and trust, indirect effect = .055, 95% CI = [.041, .072]. This indicated that the effect of algorithmic choice on satisfaction is driven by lower trust in the algorithm, which result from people's belief that the algorithm's decision is less process transparent than one's own decisions.

Study 2: Input Explainability As A Way To Increase Process Transparency

Participants (N = 960) were randomly assigned in a 2 (Choice Type: SC, AC) x 2 (Explainability: Explainable (X), Unexplainable (UnX)) between-subjects design in a t-shirt shopping scenario.

SC (vs. AC) was more process transparent ($F(1, 958) = 11.55$, $p < .001$). SC was more satisfactory ($F(1, 958) = 22.22$, $p < .001$) and trustworthy ($F(1, 958) = 698.90$, $p < .001$) than AC. The number of other t-shirts looked at was greater for AC than for SC ($F(1, 958) = 26.14$, $p < .001$). SC and AC did not significantly differ on the predicted time looking at other t-shirts.

Explainable (vs. unexplainable) decisions were more process transparent ($F(1, 958) = 354.30$, $p < .001$), more satisfactory ($F(1, 958) = 57.12$, $p < .001$), and trustworthy ($F(1, 958) = 14.01$, $p < .001$). There was no difference on the predicted time looking at other t-shirts or the predicted number of other options looked at.

In a serial mediation analysis found that explainable (vs. unexplainable) decisions were more process transparent and, consequently, more trustworthy, resulting in higher satisfaction. The indirect effect was .10, with standard error .01 and 95% CI = [.073, .123].

Study 3: What About Other Humans' Choice?

Participants (N = 1083) were randomly assigned to one of twelve conditions following a 3 (Choice Type: SC, Other's Choice (OC), AC) x 2 (Explainability: Explainable, Unexplainable) x 2 (Choice Outcome: Sparing Self (SS), Sparing Pedestrian (SP)) between-subjects design.

All twelve conditions involved an inevitable car accident. SC participants imagined that they were driving their car. OC participants imagined that they were in an Uber. AC participants imagined that they were in a self-driving car. Explainable (vs. Unexplainable) participants read an explanation for the accident.

SC was rated more favorably than OC, which was rated more favorably than AC for process transparency, appropriateness, and trust. Algorithmic Choice was viewed as less acceptable and less fair than both Self Choice and Other's Choice. Explainable (vs. Unexplainable) decisions were more process transparent ($F(1, 1081) = 64.27$, $p < .001$), acceptable ($F(1, 1081) = 40.70$, $p < .001$), appropriate ($F(1, 1081) = 44.07$, $p < .001$), and trustworthy ($F(1, 1081) = 27.25$, $p < .001$).

In order to test the process whereby choice type, specifically OC versus AC, affects decision appropriateness via process transparency and trust, we conducted a serial mediation analysis. We found an indirect effect ($a_1*d_{21}*b_2$) of .06, with standard error .01, 95% CI = [.033, .083]. AC (vs. OC) was less process transparent ($a_1 = .31$, SE = .06, $p < .001$) and hence less trustworthy ($d_{21} = .32$, SE = .02, $p < .001$), leading to lower decision appropriateness ($b_2 = .55$, SE = .04, $p < .001$).

General Discussion

We find that input explainability increases process transparency and, thus, individuals' enjoyment of a decision, whether it is made by themselves, another human, or an algorithm. Explainability information conveyed to people shapes the perceived trustworthiness of the human or algorithmic decision-maker. Having the algorithmic decision-maker tell us why it has made a certain decision is essential, because otherwise we will not understand the processes behind such decisions, which reduces acceptance of algorithms.

While it is difficult for consumers to explain the reasoning behind every decision they make, they value explainability when it comes to self, other, or algorithmic choice. Bridging the gap between algorithmic decisions and people's understanding of those decisions through explainability can promote adoption and continued use of algorithms. Across three studies reported in this paper and three other completed studies that are not included here, our results suggest that digital platforms and automated systems should implement

techniques that enhance process transparency and trust via input explainability.

REFERENCES

Dawes, Robyn M. (1979), "The Robust Beauty of Improper Linear Models in Decision Making," *American Psychologist*, 34(7), 571–82.

Dietvorst, Berkeley J., Joseph P. Simmons, and Cade Massey (2015), "Algorithm Aversion: People Erroneously Avoid Algorithms after Seeing Them Err," *Journal of Experimental Psychology: General*, 144(1), 114–26.

Meehl, Paul E. (1954), *Clinical versus Statistical Prediction: A Theoretical Analysis and a Review of the Evidence.*, University of Minnesota Press, University of Minnesota Press.

Mere Packaging and Consumer Choice: How Unnecessary Packaging Can Increase Product Value

Tim P. Doering, University of Michigan, USA
Katherine Burson, University of Michigan, USA
Andrew D. Gershoff, University of Texas at Austin, USA

EXTENDED ABSTRACT

Though packaging can benefit marketers and consumers (Kotler and Keller 2011), a large percentage is superfluous. Indeed, pilot participants believed packaging was mostly unnecessary (10 products, table 1). But packaging is one-third of household waste (US EPA 2015). We examine psychological barriers to abandoning unnecessary packaging - a "mere" packaging effect.

Packaging reduces contamination fears (Argo, Dahl, and Morales 2006; White et al. 2016), though not entirely (Castro, Morales, and Nowlis 2013; Morales and Fitzsimons 2007). We hypothesize that packaging preserves a product's essence. Products can acquire human (Newman, Diesendruck, and Bloom 2011; Smith, Newman, and Dhar 2016) or brand essence (Newman and Dhar 2014). Here we ask if essence can also be lost and whether packaging can mitigate this effect. Because consumers imagine that essence follows physical laws (Nemeroff and Rozin 2018), packaging might help to prevent its escape. Five experiments reveal a preference for "mere" packaging (studies 1a, 1b), that essential physical qualities are lost via unpackaging (studies 2, 3), and that packaging increases product value and purchase intention (study 4). Means for all studies are reported in table 1.

In study 1a (N = 172) and 1b (N = 141), participants stated their preference for a packaged (1a soccer ball, 1b USB stick) over an unpackaged product. Study 1a tested three conditions (product available unpackaged, unpackaged by customer, unpackaged by salesperson) and study 1b introduced a fourth condition where a salesperson had removed packaging before shelving. We find a mere packaging effect that is attenuated by participation in unpacking. An ANOVA showed that, given simply a choice between unpackaged and packaged balls, participants preferred a packaged ball more than in the other two conditions ($F(2, 169) = 10.52$, $p < .001$). For the USB stick, preference for a packaged product was greater if it was available packaged and unpackaged compared to when it was unpackaged at the point of purchase ($F(3, 137) = 16.82$, $p < .001$). Notably, there was no difference between participating in versus witnessing packaging removal.

Study 2 explored the reason for a preference for mere packaging. We hypothesize that mere packaging prevents escape of product essence. 193 participants rated the value and weight of 8 products from the pilot and all of its packaging. Half saw and rated the product inside the package and half next to the package but including it. Two individual difference measures, the Paranormal Belief Scale (Tobacyk and Wilkinson 1990) and Individual Differences in Anthropomorphism Questionnaire (Waytz, Cacioppo, and Epley 2014) did not interact with the condition variable and will not be discussed further. A linear mixed model (LMM) on value and weight revealed that products in packaging were perceived as heavier compared to products next to packaging ($z = 2.22$, $p = .026$). This pattern is consistent with a perception that essence is lost when packaging is removed, and this negatively impacts the product value.

Study 3 (N = 419) followed a 2 (between subjects: remained in packaging vs. removed and put back) x 2 (within subjects: measurement 1 and 2) study. Participants received a baseball in a transparent box and two bottles, one empty and one filled with 300g of sand. They poured sand from the full bottle into the empty bottle until the empty bottle felt equivalent to the weight of the baseball and its box. Half of participants then removed and replaced the ball from the box. After a delay, all participants repeated the sand-pouring exercise. An LMM on estimated weight revealed a significant effect of packaging ($z = 2.63$, $p = .01$). Participants estimated higher weight when the baseball remained in its packaging compared to when it was removed and put back in. Importantly, the predicted interaction of packaging and measurement was observed ($z = 2.30$, $p = .02$), suggesting essence is perceived as following physical laws. A product in unopened packaging was perceived as heavier than one in previously opened packaging.

Study 4 (N = 192) further explores the relationship between packaging, essence, and perceptions of weight. This study follows a 2 (text type: narrative vs. control) x 2 (packaging: present vs. absent) between subjects design. Narratives can imbue an object with essence (Gelman 2003). Participants were asked to imagine evaluating a wooden duck on eBay and indicated whether they would like to own, keep, or purchase the item. Following Newman (2018), these three measures were averaged into an "object valuation" measure ($\alpha = .69$). We also collected weight, essence, and intangible value. An ANOVA revealed that a narrative increased valuation ($F(1, 188) = 23.68$, $p < .001$) and intangible value ($F(1, 188) = 6.56$, $p = .011$) while packaging increased perceived weight ($F(1, 188) = 4.10$, $p = .044$), intangible value ($F(1, 188) = 7.97$, $p = .005$), and the amount of essence in the product ($F(1, 188) = 6.05$, $p = .015$). A mediation analysis (Model 4, Hayes 2017) further revealed a significant indirect effect of packaging on product valuation through perceived essence ($ab = 1.54$, 95% C.I. [.37, 3.13]). Study 4 showed that essence was always higher if a product was packaged.

While previous essence research was mainly concerned with the transfer of an outside essence into a product, our research suggests that essence can also be lost. We find a preference for a mere packaging: Consumers prefer a packaged product even when they believe packaging is unnecessary (study 1a, b). A packaged product is perceived as heavier compared to an unpackaged product and its packaging (study 2), even if it was just briefly removed (study 3). To the extent that it can contain essence, packaging can increase product valuation (study 4). Of course, essence loss is not the only potential driver of the devaluation of unpackaged products. This research paints a more complete picture of the psychological utility mere packaging provides as a bidirectional barrier, and a way to reduce consumer desire for it by giving them control over unpackaging a product.

REFERENCES

Argo, Jennifer J., Darren W. Dahl, and Andrea C. Morales (2006), "Consumer Contamination: How Consumers React to Products Touched by Others," *Journal of Marketing*, 70(2), 81–94.

Castro, Iana A., Andrea C. Morales, and Stephen M. Nowlis (2013), "The Influence of Disorganized Shelf Displays and Limited Product Quantity on Consumer Purchase," *Journal of Marketing*, 77(4), 118–33.

Gelman, Susan A. (2003), *The Essential Child: Origins of Essentialism in Everyday Thought*, Oxford, United Kingdom: Oxford University Press.

Hayes, Andrew F. (2017), *Introduction to Mediation, Moderation, and Conditional Process Analysis, Second Edition: A Regression-Based Approach*, New York, NY: Guilford Publications.

Kotler, Philip T. and Kevin Lane Keller (2011), *Marketing Management*, 14th Edition, Upper Saddle River, N.J: Pearson.

Morales, Andrea C. and Gavan J. Fitzsimons (2007), "Product Contagion: Changing Consumer Evaluations through Physical Contact with 'Disgusting' Products," *Journal of Marketing Research*, 44(2), 272–83.

Nemeroff, Carol and Paul Rozin (2018), "Back in Touch with Contagion: Some Essential Issues," *Journal of the Association for Consumer Research*, 3(4), 612–24.

Newman, George E. (2018), "Bringing Narratives to Life: Animism, Totems, and Intangible Value," *Journal of the Association for Consumer Research*, 3(4), 514–26.

Newman, George E. and Ravi Dhar (2014), "Authenticity Is Contagious: Brand Essence and the Original Source of Production," *Journal of Marketing Research*, 51(3), 371–86.

Newman, George E., Gil Diesendruck, and Paul Bloom (2011), "Celebrity Contagion and the Value of Objects," *Journal of Consumer Research*, 38(2), 215–28.

Smith, Rosanna K., George E. Newman, and Ravi Dhar (2016), "Closer to the Creator: Temporal Contagion Explains the Preference for Earlier Serial Numbers," *Journal of Consumer Research*, 42(5), 653–68.

Tobacyk, Jerome J. and Lamar V. Wilkinson (1990), "Magical Thinking and Paranormal Beliefs," *Journal of Social Behavior and Personality*, 5(4), 255–264.

US EPA (2015), "Advancing Sustainable Materials Management: Facts and Figures Report," https://www.epa.gov/facts-and-figures-about-materials-waste-and-recycling/advancing-sustainable-materials-management.

Waytz, Adam, John Cacioppo, and Nicholas Epley (2014), "Who Sees Human? The Stability and Importance of Individual Differences in Anthropomorphism," *Perspectives on psychological science : a journal of the Association for Psychological Science*, 5(3), 219–32.

White, Katherine, Lily Lin, Darren W. Dahl, and Robin J. B. Ritchie (2016), "When Do Consumers Avoid Imperfections? Superficial Packaging Damage as a Contamination Cue," *Journal of Marketing Research*, 53(1), 110–23.

Food Choices And Food Socialization By Lower-Income Chilean Mothers Following Major Legislation Changing Labelling Standards

Raquel Donskoy, Universidad Adolfo Ibáñez, Chile
Flavia Cardoso, Universidad Adolfo Ibáñez, Chile

EXTENDED ABSTRACT

In a context of a high and growing prevalence of overweight individuals and childhood obesity, Chile enacted Law 20,606 in 2016, with the goal of protecting children by encouraging informed food selection and less consumption of foods high in calories, saturated fats, sugar, and sodium (MINSAL, 2018). Law 20,606 mandates that food products exceeding the daily allowances for nutrients and calories recommended by the Ministry of Health must include a warning label indicating this on the front of the product. It also prohibits advertising these foods to children under the age of 14 and marketing or delivering these products free of charge to preschools or primary and middle schools, among other restrictions (MINSAL, 2018). The law was developed on the underlying assumption that consumers would improve their eating habits if they were better informed about the nutritional factors of their food choices (Araya, 2018; Cardello, 2018).

Considering that mothers play a fundamental role in food socialization in families (Epp and Price, 2008; Chytkova 2011; Epp and Velegaletti, 2014; Judd et al. 2014; Moore 2018), we conducted 16 in-depth, oral and semistructured interviews (Arsel 2017) with randomly selected working mothers from lower SEGs according to Chilean categorization (Activa Research 2017) and collected photos of their refrigerators and pantries (Gram, 2014). The photos were compared to the interview answers for validation because family nutrition is a sensitive subject and the mothers may hide or withhold the real answers to the researcher's questions (Brenner and DeLamater 2016). The interviews lasted approximately one hour. The audio was recorded and subsequently transcribed for analysis for analysis and interpretation (Spiggle 1994) assisted by the Dedoose software program.

Our findings contribute to the literature on food socialization (Judd et al 2014) and family consumption (Epp and Velegaletti, 2014; Thomas and Epp 2019) and suggest that interrelations among several factors contribute to the difficulty of habituating new food practices in lower social economic strata, rendering such legislation only partially effective. Specifically, and consistent with previous research (Block et al. 2011; Henneberry et. Al. 2003), our results suggest that knowledge of healthy eating principles is an essential factor. However, our findings show that it is not sufficient to convert new practices into habits and thereby transform family diets because it is important to consider the very long road that must be travelled from an initial understanding of change to the acceptance and habituation of the change (Thomas and Epp 2019).

Particularly in relation to low SEGs, our data shows that mothers in this group have a limited ability to socialize food without warning labels with their children despite being aware of the benefits of healthy eating and having received information through resources such as food labelling. In fact, several factors were found to limit these mothers' ability to carry out the food socialization practices promoted by the legislation. For example, many mothers in our study were heavily overworked both inside and outside the home, and were unable to devote more time to food shopping and to meal planning USDA (2009) and to the enforcement of food decisions they had made. Also, their limited budgets were a restraining factor in their enforcement of meal choices, as they needed to reduce food waste and therefore tended to choose food products they knew their children would accept easily (Haws et al. 2016).

Although extant literature mentions the effects of outside help on family practices (Epp & Price, 2008; Epp and Velegaletti 2014; Epp and Price 2018), it falls short of fully exploring its importance in establishing food socialization practices. Yet our findings suggest that the division of labour in the household is a central issue for food socialization, because the low SEG mothers we interviewed had no access third party help and often had no one with whom to share their responsibilities with, thus making it very difficult for them to change their routine food habits, which usually involved processed foods and often tasty but unhealthy meals, simply because this was faster, hassle free and made their life a little easier.

Moreover, our data suggested gender implications that are extremely relevant for food socialization, as even when there was a male partner in the household, the mothers in our study were the primary caretakers of the children as Chile continues to be a country characterized by patriarchal values (CASEN, 2018). Conversely, the data indicate that if a grandmother or another woman lived in the home, then this housework overload was distributed, thereby allowing the mother to have more time to devote to other tasks, including food purchasing and socialization. Also, the findings reveal that when a mother had to interact with a doctor because of health considerations (whether her own or a relative's health), she was more proactive in changing her behaviour than were other mothers who had not had such an interaction, having seen the consequences of poor nutrition in real life.

Additionally, our results also illustrate the hedonic and relational role of food in the social classes with the fewest resources. For example, given the time constraints and budgetary restrictions affecting low-SEG families, they are more likely to award 'good behaviour' with unhealthy foods than with family outings, for instance (Hughner et al. 2006; Inglis, et al. 2005). Understanding this consumer reasoning enables us to interpret differences in the Labelling Law's impact on various product categories and to propose adjustments to current public policies in order to make them more effective.

Finally, unlike previous works, this study considers the difficulty of converting new practices into habits (Thomas & Epp, 2019). A common view in the literature is that individuals are able to take control of their behaviours and modify them for the better (Grier and Moore 2012). While this idea is attractive, especially when focused on encouraging healthier eating behaviours, it ignores the complex set of forces that can shape or constrain an individual's – and a family's - ability to make meaningful changes to daily routines.

REFERENCES

Aqueveque, Corvalán, Olivares Garmendia, and Zacarías Reyes (2012), *Estudio Sobre Evaluación de Mensajes de Advertencia de Nutrientes Críticos en el Rotulado de Alimentos*, Informe Final, 102. Instituto de Nutricion y Tecnologia de Alimentos (Inta), Universidad de Chile.

Araya, Sebastian, Andres Elberg, Carlos Noton, and Daniel Schwartz (2018), "Identifying Food Labeling Effects on Consumer Behavior," Available at: https://ssrn.com/abstract=3195500.

Arsel, Zeynep (2017), "Asking Questions with Reflexive Focus: A Tutorial on Designing and Conducting Interviews," *Journal of Consumer Research*, 44 (4), 939–48.

Block, Lauren G., Sonya A. Grier, Terry L. Childers, Brennan Davis, Jane E. J. Ebert, Shiriki Kumanyika, et al. (2011), "From Nutrients to Nurturance: A Conceptual Introduction to Food Well-Being," *Journal of Public Policy & Marketing*, 30 (1), 5–13.

Brenner, Philip S., and John DeLamater (2016), "Lies, Damned Lies, and Survey Self-Reports? Identity as a Cause of Measurement Bias," *Social Psychology Quarterly*, 79 (4), 333–54.

Cardello, Hank (2018), "Implications for Policymakers and the Food Industry," in *Why They Buy: Fighting Obesity Through Consumer Marketing Research*, Hank Cardello, ed. Pennsylvania, PA: Hudson Institute, 13.

CASEN (2018), "Estudio: Mientras Aumenta la Participación Laboral de las Mujeres, las Cargas de Cuidado se Han Mantenido. 2018, de Ministerio de Desarrollo Social Sitio Web," Available at: http://observatorio. ministeriodesarrollosocial.gob.cl/casen-multidimensional/ casen/docs/Presentacion_Sintesis_de_Resultados_ Casen_2017.pdf.

Chytkova, Zuzana (2011), "Consumer Acculturation, Gender, and Food: Romanian Women in Italy between Tradition and Modernity," *Consumption Markets & Culture*, 14 (3), 267–91.

Epp, Amber M., and Linda Price (2008), "Family Identity: A Framework of Identity Interplay in Consumption Practices," *Journal of Consumer Research*, 35 (1), 50–70.

Epp, Amber M., and Sunaina Velagaleti (2014), "Outsourcing Parenthood? How Families Manage Care Assemblages Using Paid Commercial Services," *Journal of Consumer Research*, 41 (4), 911–35.

Epp, A. M., & Price, L. L. (Accepted/In press). Constraints and possibilities in the thrown togetherness of feeding the family. European Journal of Marketing. https://doi.org/10.1108/EJM-06-2018-0385

Gram, Malene (2014), "Buying Food for the Family: Negotiations in Parent/Child Supermarket Shopping: An Observational Study from Denmark and the United States," *Journal of Contemporary Ethnography*, 44 (2), 169–95.

Grier, Sonya A., and Elizabeth S. Moore (2012), "Tackling the Childhood Obesity Epidemic: An Opportunity for Transformative Consumer Research," in *Transformative Consumer Research for Personal and Collective Well-Being*, David Glen. Mick, Simone Pettigrew, Cornelia (Connie). Pechmann and Julie L. Ozanne, eds. New York, NY: Routledge, 303–32.

Haws, Kelly L., Rebecca Walker Reczek, and Kevin L. Sample (2016), "Healthy Diets Make Empty Wallets: The Healthy = Expensive Intuition," *Journal of Consumer Research*, 43 (6), 992–1007.

Henneberry, Shida Rastegari, and Walter J. Armbruster (2003), "Emerging Roles for Food Labels: Inform, Protect, Persuade," *Journal of Food Distribution Research*, 34 (3), 1–8.

Hughner, Renée Shaw, and Jill Kurp Maher (2006), "Factors that Influence Parental Food Purchases for Children: Implications for Dietary Health," *Journal of Marketing Management*, 22 (9-10), 929–54.

Inglis, Victoria, Kylie Ball, and David Crawford (2005), "Why do Women of Low Socioeconomic Status have Poorer Dietary Behaviours than Women of Higher Socioeconomic Status? A Qualitative Exploration," *Appetite*, 45 (3), 334–43.

Judd, Stephanie M., Joshua D. Newton, Fiona J. Newton, and Michael T. Ewing (2014), "When Nutritional Guidelines and Life Collide: Family Fruit and Vegetable Socialisation Practices in Low Socioeconomic Communities," *Journal of Marketing Management*, 30 (15-16), 1625–53.

MINSAL (2018), "Informe de Evaluación de la Implementación de la ley Sobre Composición Nutricional de los Alimentos y su Publicidad. 2018, de Gobierno de Chile Sitio Web," Available at: https://www.minsal.cl/wp-content/uploads/2018/05/ Informe-Implementaci%C3%B3n-Ley-20606-febrero-18-1. pdf.

Moore, Elizabeth S. (2018), "Intergenerational Influences on Children's Food Preferences, and Eating Styles," *European Journal of Marketing*, 52 (12), 2532–43.

OMS (2013), "Investigaciones Para una Cobertura Sanitaria Universal. 2013, de Organización Mundial de la Salud Sitio Web," Available at: https://apps.who.int/iris/bitstream/ handle/10665/85763/9789240691223_spa.pdf;jsessionid=C3A 17E24FF897FE18853515F08BE0BFB?sequence=1.

Spiggle, Susan (1994), "Analysis and Interpretation of Qualitative Data in Consumer Research," *Journal of Consumer Research*, 21 (3), 491–503.

The New York Times (2018), "Sellos Para Combatir la Obesidad: Cómo Identifican en Chile la Comida Chatarra. 2018, de The New York Times Sitio Web," Available at: https://www. nytimes.com/es/2018/02/07/chile-obesidad-etiquetado-salud/.

Thomas, Tandy Chalmers, and Amber M. Epp (2019), "The Best Laid Plans: Why New Parents Fail to Habituate Practices," *Journal of Consumer Research*. doi: 10.1093/jcr/ucz003.

USDA (2009), *Access to Affordable and Nutritious Food: Measuring and Understanding Food Deserts and Their Consequences: Report to Congress*. Washington, DC: U.S. Department of Agriculture, Economic Research Service

Evaluation Mode Affects Choice of Healthy and Unhealthy Food:
The Role of Taste and Healthiness Attribute Evaluability

Sadaf Mokarram-Dorri, Bocconi University, Italy
Siegfried Dewitte, KU Leuven, Belgium

EXTENDED ABSTRACT

According to the report by the U.S. Department of Health and Human Services, the eating pattern of people in United States is low in fruits and vegetables and excessive in fat and sugar[1]. Shifting the dietary intakes from unhealthy food consumption to healthier food is critical. Prior literature in decision theory has shown that when two products differ from each other on two attributes, one option might be selected based on the attractiveness of the easy- to-evaluate attribute in the separate evaluation mode (SE). However, in the joint evaluation (JE), the difficult-to-evaluate attribute becomes relatively more influential that leads to preference reversal between the two options (Hsee and Leclerc 1998; Hsee et al. 1999). In food decision making, sometimes consumers might decide about an option in the SE, whereas at other times they might choose between options in JE. Often times the options differ from each other on two conflicting attributes of taste and healthiness that are among the most important attributes when people are deciding what to eat (Aggarwal et al. 2016). While some food has better taste compared to others, they might not be as healthy. We integrate the research on attribute evaluability with self-control literature to show how self-control might change from SE to JE in the food domain. An important assumption here is that taste is easier to evaluate than healthiness, since evaluation of taste is more intuitive than the healthiness. In sum we argue:

Hypothesis 1: *Compared to SE, in JE people are more likely to show relatively higher preference for healthy food than unhealthy option.*

Hypothesis 2: *Compared to SE, in JE people are more likely to rely on healthiness of the food than its taste when they are deciding about the food.*

Previous research on the effect of evaluation mode on preference for utilitarian and hedonic products has shown how preference for the utilitarian option might be higher in JE, compared to SE. However, we go beyond the justification (Okada 2005) and goal highlight (Fishbach and Zhang 2008) arguments by investigating the role of two conflicting attributes in the food domain:

Hypothesis 3: *When healthiness of the food is easier to evaluate than its taste, in JE people are more likely to rely on taste of the food than its healthiness and show relatively higher preference for the unhealthy food to healthy alternative, compared to SE.*

We have conducted 4 studies. Study 1 has 3 (evaluation modes: JE, SE of healthy option, SE of unhealthy option) between subject design. Participants were asked to indicate their choice. We used an image of granola bar for the healthy option and an image of chocolate for the unhealthy option with star rating (i.e. 4 out of 5 star vs. 2 out of 5 star rating) for taste and percentage of sugar (i.e. 46% vs. 17%) for healthiness. Next, we measured ease of evaluability of taste and healthiness information and participants' perception of each stimulus. The results for taste and healthiness perception and ease of

evaluability are summarized in table 1 for all the studies. The results showed that the choice of unhealthy food significantly decreased from SE to JE. The effect of evaluation mode on choice share of healthy food was not significant.

Study 2 aims to replicate the results with real choice behavior in an incentive compatible purchasing context in the lab. The result showed that people were significantly more likely to choose the granola bar in JE compared to SE whereas they were significantly more likely to choose the chocolate bar in SE compared to JE.

Study 3 has a 3(evaluation modes) x 2(goal: health goal, control) between subject design. In this study, we sought to extend the previous findings by using a different method to measure preference (i.e. rating scale). We also aim to rule out the goal account as an alternative explanation. The result showed the significant effect of evaluation mode on the preference for healthy food. However, the effect of goal on the preference for healthy food (Mgoal=3.86, SDgoal=2.04, Mcontorl=4.34, SDcontrol=1.78; $F(1,234)$=3.18, p=.08) and the interaction effect were not significant ($F(3,231)$=2.93, p=.09). Note that this marginally significant interaction is not in line with the goal account because the effect of goal activation tends to suppress the rating of the healthy option in SE. The result showed no significant effect of evaluation mode or goal on the preference for unhealthy food (Mgoal=3.97, SDgoal=2.08, Mcontorl=3.57, SDcontrol=2.09; $F(1,235)$=2.04, p=.15). The interaction effect were also not significant ($F(3,232)$=.10, p=.75).

Study 4 aims to show by experimentally manipulating the ease of evaluability of taste and healthiness (Pieters 2017), we can flip the effect. This study has a similar design to study 1, except that we flipped the information formats between taste and healthiness to manipulate their ease of evaluability for two new ice creams as the stimuli. This study is pre-registered on aspredicted.org. The results showed that the choice of healthy (unhealthy) food significantly decreased (increased) from SE to JE, when healthiness was easier to evaluate than taste. This finding is not in line with the justification account.

This research showed that JE might enhance self-control through lower preference for unhealthy food compared to the healthy option, compared to SE, when taste of the food is easier to evaluate than the healthiness information. We contribute to the existing literature on self-control and decision-making by showing when and how JE might lead to higher(lower) healthier(unhealthier) choice of food. Previous research on self-control has measured self- control through measuring preference in both SE and JE even within a single research (May and Irmak 2018; Ferraro, Shiv, and Bettman 2005; Mukhopadhyay, Sengupta, and Ramanathan 2008; Siddiqui, May, and Monga 2017). However, our findings suggest that there might be systematic differences in the preferences of healthy and unhealthy food form SE to JE. This research also provides several practical implications. Companies can provide consumers with easy-to-evaluate nutrition information to increase the impact of healthiness in SE. Joint presentation of the products by retailers can also help consumers to make healthier choice.

REFERENCES

Aggarwal, A., Rehm, C. D., Monsivais, P., & Drewnowski, A. (2016). Importance of taste, nutrition, cost and convenience in relation to diet quality: Evidence of nutrition resilience among US adults using National Health and Nutrition Examination Survey (NHANES) 2007–2010. *Preventive medicine*, 90, 184-192.

Dietary guidlines 2015-2020. Retrieved from https://health.gov/dietaryguidelines/2015/guidelines/chapter-2/current-eating-patterns- in-the-united-states/

Ferraro, R., Shiv, B., & Bettman, J. R. (2005). Let us eat and drink, for tomorrow we shall die: Effects of mortality salience and self-esteem on self-regulation in consumer choice. *Journal of Consumer Research, 32*(1), 65-75.

Fishbach, A., & Zhang, Y. (2008). Together or apart: When goals and temptations complement versus compete. *Journal of Personality and Social Psychology*, 94(4), 547.

Hsee, C. K., Loewenstein, G. F., Blount, S., & Bazerman, M. H. (1999). Preference reversals between joint and separate evaluations of options: A review and theoretical analysis. *Psychological Bulletin, 125*(5), 576.

Hsee, C. K., & Leclerc, F. (1998). Will products look more attractive when presented separately or together? *Journal of Consumer Research, 25*(2), 175-186.

May, F., & Irmak, C. (2018). The Effects of Rarity on Indulgent Consumption: Non- Impulsives Indulge When Low Frequency Is Salient. *Journal of Consumer Research*, 45(2), 383-402.

Mukhopadhyay, A., Sengupta, J., & Ramanathan, S. (2008). Recalling past temptations: An information-processing perspective on the dynamics of self-control. *Journal of Consumer Research*, 35(4), 586-599.

Okada, E. M. (2005). Justification effects on consumer choice of hedonic and utilitarian goods. *Journal of Marketing Research*, 42(1), 43-53.

Pieters, R. (2017). Meaningful mediation analysis: Plausible causal inference and informative communication. *Journal of Consumer Research*, 44(3), 692-716.

Siddiqui, R. A., May, F., & Monga, A. (2017). Time window as a self-control denominator: Shorter windows shift preference toward virtues and longer windows toward vices. *Journal of Consumer Research, 43*(6), 932-949.

Social and Spatiotemporal Track to Reduce Food Waste

Margot Dyen, University of West Brittany, France
Lucie Sirieix, Montpellier SupAgro France, France
Sandrine Costa-Migeon, INRAE, UMR MOISA, France

EXTENDED ABSTRACT

Introduction

Reducing food waste is one of the most challenging objectives associated to our food system, due to its environmental and economic impacts and due to ethical reasons. States keep trying to foster programs, actions or campaigns to target consumers' practices and to foster behavior change towards more sustainable food systems. Literature in social marketing, sociology, and social psychology provides a good understanding of the drivers of food waste at consumers' level. It has been demonstrated that FW depends on education, knowledge, sorting and planning practices, attitude regarding food waste or personal norms (Secondi et al, 2015; Visschers et al, 2016). This knowledge allows formulating recommendations to fight food waste, which mostly target social norms, knowledge and material aspects of food storage and consumption with interventions such as communication, cooking classes, fridge cameras, information on date labelling (Aschemann-Witzel, 2015; Reynolds et al, 2019). However, the spatial and temporal organization of daily practices has been under-considered as levers for action to fight FW, even if several studies demonstrated how FW depends on spatial and temporal drivers (Watson and Meah, 2012), and that we should think about where, when and how meals are eaten (Evans and Welch, 2015).

Objectives

With a social marketing perspective, this study aims at considering the structuration of time and space in the food practices due to social interactions, in order to understand how this generates or reduces FW. The objective is to tackle the causes of FW and to seize the opportunities to fight FW considering social, spatial and temporal settings of food consumption. In this way, this study asks: **how social aspects of food consumption can be sources of FW or on the contrary as levers for reducing FW through the temporal and spatial organization of daily life? How can this be targeted to fight FW?** Taking into account the spatial, temporal and social ordering of daily life, this study allows to better understand FW practices and to co-construct a device with consumers in order to fight FW.

Theoretical framework

Practice theories advocate for an alternative approach to consumer studies which is not based on consumers' rationality but focuses on practices rather than on individuals (Halkier and Jensen, 2011). Individuals are considered as practice carriers rather than decision makers. This stream considers the context of daily routine and how individuals co-construct practices by performing them (Evans et al., 2012; Warde, 2005). Practice theories analyze the "elements" that constitute practices (meaning, competence, material) (Hargreaves, 2011; Shove et al., 2012), and how practices are interconnected (Warde, 2005). Schatzki (2005), who describes practices as a set of actions, invites to study the arrangements of actions in their spatiotemporal dimensions, which responds to the specificity of domestic life, consisting of a set of coordinated actions that form what can be called the daily routine of consumers (Wahlen, 2011). Derived from this work, Southerton (2013) suggests an alternative to dominant behaviorist models of habits and routines. Southerton suggests three alternative concepts for « habits » and « routines » to understand the spatial and temporal ordering of daily life using a practice lens: dispositions – the tendency to perform practices according to culturally derived orientations; procedures – tacit knowledge and embodied skills; and, **sequences** – the ordered performance of practices through material, infrastructural and institutional forms. This holistic approach is relevant to understand how consumers' daily life is organized, and it opens to new forms of intervention that are not based on decision-making.

This study focuses on **how social interactions impact sequences related to food practices and how this generates or reduces FW**.

Methodology

The objective is to develop a methodology able to describe how social aspects of daily food practices suggest particular temporal and spatial organization of practices that impact (positively or negatively) FW. We adopt a comprehensive approach, and opt for a qualitative study conducted in France. Our approach relies on two phases:

1) A two-step qualitative data collection: semi-directive interviews conducted with a projective method of collage aiming at describing food practices and, observations of shopping, storing and cooking practices. The sample was developed to generate as much variability as possible in the practices and preoccupations related to FW: varied age, socio-professional category, household's size, and hobbies (used as an approximation of a part of their interests). Such a sample is adapted to the objectives of this study because it guarantees the presence of varied food practices in terms of product management, relation to food and social context. The interviewees were always at least partially in charge of feeding the household, i.e. they were shopping or cooking regularly. The sample is composed of 23 participants (Appendix 1). Data analysis is two-step: first, we identify the practices associated to limiting FW at a consumer-level. To do so, we use the French Campaign AntiGaspi (Anti-Food Waste, Appendix 2) as a framework to identify the practices associated to FW limitation. Secondly, we identify through thematic analysis the temporal and spatial ordering of these practices, and we identify through thematic analysis the role of social interactions in these ordering.

2) The co-construction of an intervention with consumers through a focus group. Just as during the first step, the sample of 10 participants has to guarantee the presence of various food practices and various social, spatial and temporal settings (Appendix 3). During the focus group, participants are asked to evaluate a proposition of intervention elaborated from the first phase results (presented below).

Results

Results reveal pathways that help to re-consider existing results from a spatiotemporal perspective and thus suggest new interventions to foster FW prevention practices. Three categories of social interactions emerge: 1) uncertainties due to social interactions 2) social norms associated to food consumption with others and 3) task repartition.

1) The uncertainties due to social interactions such as being invited to a friend's house, having friends for dinner or depending on peers' tastes and schedule lead to a destructuration of spatial or temporal ordering of food intake and of product management. It can lead either to **eating out** of home (spatial dimension) or to **postpone the consumption of the planned menu/food** (temporal dimension). This restructures the sequences (ordered performance of practices through material, infrastructural and institutional forms) aiming at anticipating which products, in which quantities will be bought, cooked and eaten. For example, Sylvie (30 years old) explains that she buys the right amount of fruits and vegetables for a week, but a dinner with friends postpone the consumption and leads to FW: "*it happens that I throw fruits and vegetables out because I finally went out with friends*". **2) The social norms associated to the consumption of leftovers** prescribe that managing leftovers is opposed to the figure of the good provider (Visschers et al, 2016). Hence, the sequence (ordered performance of practices) of accommodating and eating leftovers is **postponed** (temporal dimension) and/or **moved out of home** (spatial dimension). Roxane (33 years old) explains that she brings leftovers for her lunches at work, because she and her boyfriend do not eat leftovers for dinner: " *we rarely eat several times the same dish for dinner, it happens but… you know, for the lunch we eat quickly, so for the dinner we enjoy a cool moment*". This case shows that eating leftovers is about finding the right place and time to do it, with the appropriate commensals. In the same way, Marion (31) explains: "*I have recently begun to eat leftovers for lunch since friends of mine told me about coffee shops where you can consume your own food if you buy at least one drink*". These places thus offer a dedicated place to eat leftovers. **3) Task repartition** leads to spatial and temporal organization within daily food practices. Contrarily to the previous two restructuration that rather lead to FW and/or compromise the practices reducing FW, these social interactions foster practices reducing FW. At an individual's scale, task repartition leads to move and differ some practices to another place and time through the action of someone else: as Thibaut (32 years old) explains, *"I prepare daily a lunch box for [me and my girlfriend] from the leftovers"*. Doing so, he allows her to practice the recommendation "accommodate leftovers". In the same way, the possibility to share food shopping helps adapting the quantities bought through a "just-in-time" food provision system without imposing to one individual to shop every day. This is the case of Noémie (26), who is used to shop weekly in a supermarket except for the fresh products (meat, fish, fruits, vegetables and bread) which she buys more frequently to prevent them from perishing. For these products, she calls her mother at work to ask her to *"buy meat, bread or some fruits on her way back to home"*. In this way, the household as a whole establishes anti-food waste practices through the combination of individuals' practices. This is a kind of differing spatially and temporally the sequence of practices fighting FW.

Our results lead to recommendations that take the **collective dimension** into account to foster the practices that limit FW. We suggest a device aiming at facilitating the task repartition between people. This "special leftovers" stage of the fridge is designed to identify quickly and clearly the food that has to be eaten first, thanks to the adjustable size of the zone. We suggest this device to **adapt to the spatiotemporal restructuration of sequences** highlighted above: having a place to stock and to identify at a glance the food that has to be eaten first counterbalances the fact that the consumption had been postponed. During the focus group, this device has been evaluated by 10 consumers. They underlined that it could be really useful as a "*non-verbal communication channel*" (Sonia, 44 years old) that can help more members of the household to commit in the food management. They also underlined that this device can "*dilute personal responsibility*" (Antoine, 21 years old) and that "*even if leftovers are more visible, this will not make people more inclined to eat them*" (Félicie, 28 years old). In this way, this device deserves to be tested in various households to see how it would take part in the social and spatiotemporal organization of daily life through: a) helping task repartition (non-verbal communication; dilution of the responsibility); b) changing social norms (does it lead to keep and/or consume more leftovers?); c) facilitating the management of uncertainties due to social interactions (prioritizing some products). This device should be tested with a practice-based approach: observing the performance of practices and understand the material dimension, the competences necessary and the meanings of practices.

In relation with the spatiotemporal and social organization of daily life that impacts FW, this study shows that places where people can eat their own food out of home foster both social interactions and the consumption of leftovers. This is the case of the coffee shops Marion told us about, where customers can bring their own food; and workplaces Roxane told us about, which are adapted to host lunches (with tables, places to wash lunch boxes, fridge, etc.).

Conclusion

This study contributes to understand how the practices that reduce or generate FW are performed on a daily basis. Through the concept of sequences, it shows that a) the uncertainties due to social interaction and social norms associated to food consumption can jeopardize the organization aiming at reducing FW; b) task repartition fosters FW reduction practices at a household scale. These results lead to propose a new device - the "special leftovers" stage of a fridge, which according to consumers, influences non-verbal communication and task repartition in households. This device deserves to be tested through a longitudinal study. Another perspective of this study is to confirm whether the creation of places where citizens can eat their own food out-of-home contributes to social interactions and anti-food waste practices.

REFERENCES

Aschemann-Witzel, J., De Hooge, I., Amani, P., Bech-Larsen, T., & Oostindjer, M. (2015). Consumer-related food waste: Causes and potential for action. *Sustainability*, 7(6): 6457-6477.

Evans D, McMeekin A and Southerton D (2012) Sustainable consumption, behaviour change policies and theories of practice. In: The habits of consumption, *COLLeGIUM*, Helsinki pp. 113-129.

Evans, D., & Welch, D. (2015). Food Waste Transitions: Consumption, Retail and Collaboration towards a Sustainable Food System. University of Manchester, Sustainable Consumption Institute.

Halkier B and Jensen I (2011) Methodological challenges in using practice theory in consumption research. Examples from a study on handling nutritional contestations of food consumption. *Journal of Consumer Culture* 11(1): 101–123.

Hargreaves T (2011) Practice-ing behaviour change: Applying social practice theory to pro-environmental behaviour change. *Journal of Consumer Culture* 11(1): 79–99.

Reynolds, C., Goucher, L., Quested, T., Bromley, S., Gillick, S., Wells, V. K., ... & Svenfelt, Å. (2019). Consumption-stage food waste reduction interventions–What works and how to design better interventions. *Food Policy* 83: 7-27

Schatzki, T. R. (2005). Practice mind-ed orders. In *The practice turn in contemporary theory* (pp. 50-63). *Routledge*, London.

Secondi, L., Principato, L., & Laureti, T. (2015). Household food waste behaviour in EU-27 countries: A multilevel analysis. *Food policy*. 56, 25-40.

Shove, E., Pantzar, M., & Watson, M. (2012). The dynamics of social practice: Everyday life and how it changes. *Sage,* London.

Southerton, D. (2013). Habits, routines and temporalities of consumption: From individual behaviours to the reproduction of everyday practices. *Time & Society*, *22*(3), 335-355.

Vihalemm, T., Keller, M., & Kiisel, M. (2016). From intervention to social change: A guide to reshaping everyday practices. *Routledge*, London.

Visschers, V. H., Wickli, N., & Siegrist, M. (2016). Sorting out food waste behaviour: A survey on the motivators and barriers of self-reported amounts of food waste in households. *Journal of Environmental Psychology*. 45, 66-78.

Warde A (2005) Consumption and theories of practice. *Journal of Consumer Culture.* 5(2): 131–153.

Watson M and Meah A (2012) Food, waste and safety: negotiating conflicting social anxieties into the practices of domestic provisioning. *The Sociological Review.* 60(S2): 102–120.

Appendix 2: The French Campaign AntiGaspi (Anti-Food Waste) In 2014, the French Department of Food and Agriculture create the national campaign "10 anti- food waste behaviors". This campaign promotes behaviors rather than sensitizing to the environmental, ethical or financial effects of food waste.

Minimalism in Material Possessions: Theory and Measurement

Lisa Eckmann, Goethe University Frankfurt, Germany
Jan R. Landwehr, Goethe University Frankfurt, Germany

EXTENDED ABSTRACT

In times of growing public awareness of ecological and sustainability concerns, the boom of tiny houses in light of rising house prices, as well as increasing flexibility and mobility demanded by modern working life, minimalism has gained large popularity in the U.S. and beyond as an attractive way of living. In the popular media, minimalism describes a way of living with less—often accompanied by the endorsement of a rigorous decluttering philosophy. In the scientific literature, the research field of anticonsumption (see Makri et al. 2020 for a review) has intensively studied the intentional avoidance of consumption in light of consumers' responsibility regarding environmental, ethical, and socio-political matters (e.g., Alexander and Ussher 2012; Elgin and Mitchell 1977; Leonard-Barton 1981; Shaw and Newholm 2002).

Yet, to date, the literature provides neither a clear theoretical conceptualization of minimalism nor an empirical measurement approach to allow for quantitative and more in-depth research on this construct. The present research fills this gap and develops both a distinct conceptualization and a measurement scale of minimalism.

Minimalism can be broadly defined as the valuation of fewer possessions (Alexander and Ussher 2012, p. 74), which reflects the pure materialistic aspect of anticonsumption without making assumptions regarding the underlying motivations. The literature on sharing, borrowing, and access-based services as forms of consumption alternative to ownership suggests that possessions come with physical, economic, or emotional costs that form a "burden of ownership" (Bardhi and Eckhardt 2017; Bardhi, Eckhardt, and Arnould 2012; Moeller and Wittkowski 2010). This material burden weighs heavily in an increasingly fast-changing, uncertain, and globalized society (Baumann 2000, 2007) that promotes a modern working life characterized by international travel, short-term employment contracts, and frequent changes in employment or, as a consequence, frequent relocation. Modern-day demands for flexibility, mobility, and adaptability in personal, social, and professional life call for a more liquid relationship with material possessions (Bardhi et al. 2012). Liquid consumption as a more temporary, access-based, and dematerialized form of consumption (Bardhi and Eckhardt 2017) matches this current zeitgeist, as it minimizes effort and costs associated with physical possessions.

Accordingly, we argue that minimalist consumers seek to avoid the various costs attached to possessions by minimizing the number of possessions itself. Hence, in line with Alexander and Ussher (2012), we define minimalism as a preference for an overall low quantity of material possessions. Importantly, this preference is not restricted to a specific domain of material possessions (e.g., only clothes) and includes all physical, storable, and non-perishable items of any size of which the consumer is a permanent owner. Notably, as a minimalist preference does *not* reflect a valuation of one's possessions but a valuation of a *low quantity* of possessions, minimalism is conceptually distinct from materialism (Richins 2004). To make consumers' interindividual difference in this preference measurable, we develop the 9-item Minimalism in Material Possessions (MMP) scale.

In study 1, 100 participants created a pool of 400 items reflecting minimalist consumers' attitudes and behaviors based on our aforementioned conceptualization of minimalism. This list was reduced to 61 items in a step-wise procedure including independent appropriateness ratings (Rust and Cooil 1994), careful editing, and redundancy checks.

In study 2, eight consumer behavior junior faculty evaluated the content validity of the remaining items by rating their representativeness of the construct and their comprehensibility on 5-point Likert scales. Items scoring below 4 in both rating dimensions were dropped, which left 21 items.

In study 3 (N=400), we performed a principal component analysis (PCA) on the preliminary scale of 21 items which indicated a one-factor solution. After elimination of items with high cross-loadings, low loadings on the first factor or high content redundancy, a final PCA on the 9 remaining items resulted in a one-factor solution (R^2 = .72). A follow-up confirmatory factor analysis indicated a good-fitting model (χ^2 = 66.34, df = 27; CFI = .99; TLI = .98; RMSEA = .06). The scale is highly reliable (Cronbach's α = .95) and only weakly correlated (r = .11; p = .022) with social desirability (Crowne and Marlowe 1960).

Study 4 (N=400) assessed the convergent and discriminant validity of the MMP scale within its nomological network. A confirmatory factor analysis with the 9 MMP items and 12 other theoretically related constructs yielded a good model fit (χ^2 = 18,457.60, df = 7,547; CFI = .73; TLI = .72; RMSEA = .06). The correlations of the 12 constructs with the MMP scale demonstrated good discriminant and convergent validity (range of correlations from –.42 to .44). We also found significant correlations with demographic variables (i.e., a negative relation to income and a positive relation to education) and variables relating to participants' number of possessions (i.e., the higher the MMP score, the lower the number of possessions).

In summary, by providing a conceptualization and a valid and reliable measurement of minimalism as a preference for a low quantity of material possessions, we contribute to the literature on anticonsumption (Makri et al. 2020) and liquid consumption (Bardhi and Eckhardt 2017). The present research enables future quantitative research on minimalism, such as examining the antecedents (e.g., to disentangle different types of minimalists) and behavioral consequences (e.g., to identify new styles of consumption) of minimalist preferences. If the modern lifestyle gives rise to a gradual shift from traditional ownership mentality to more minimalist mindsets, marketers will need to find more "liquid" solutions for their customers. The MMP scale serves as an important starting point for corresponding research activities.

REFERENCES

Alexander, Samuel and Simon Ussher (2012), "The Voluntary Simplicity Movement: A Multi-National Survey Analysis in Theoretical Context," *Journal of Consumer Culture*, 12(1), 66–86.

Bardhi, Fleura and Giana M. Eckhardt (2017), "Liquid Consumption," *Journal of Consumer Research*, 44(3), 582–97.

Bardhi, Fleura, Giana M. Eckhardt, and Eric J. Arnould (2012), "Liquid Relationship to Possessions," *Journal of Consumer Research*, 39(3), 510–29.

Baumann, Zygmunt (2000), *Liquid Modernity*, Cambridge, UK: Polity.

——— (2007), *Liquid Times: Living in the Age of Uncertainty*, Cambridge, UK: Polity.

Crowne, Douglas P. and David Marlowe (1960), "A New Scale of Social Desirability Independent of Psychopathology," *Journal of Consulting Psychology*, 24(4), 349–54.

Elgin, Duane and Arnold Mitchell (1977), "Voluntary Simplicity," *Planning Review*, 5(6), 13–15.

Leonard-Barton, Dorothy (1981), "Voluntary Simplicity Lifestyles and Energy Conservation," *Journal of Consumer Research*, 8(3), 243–52.

Makri, Katerina, Bodo B. Schlegelmilch, Robert Mai, and Katharina Dinhof (2020), "What We Know About Anticonsumption: An Attempt to Nail Jelly to the Wall," *Psychology & Marketing*, 37(2), 177–215.

Moeller, Sabine and Kristina Wittkowski (2010), "The Burdens of Ownership: Reasons for Preferring Renting," *Managing Service Quality*, 20(2), 176–91.

Richins, Marsha L. (2004), "The Material Values Scale: Measurement Properties and Development of a Short Form," *Journal of Consumer Research*, 31(1), 209–19.

Rust, Roland T. and Bruce Cooil (1994), "Reliability Measures for Qualitative Data: Theory and Implications," *Journal of Marketing Research*, 31(1), 1–14.

Shaw, Deirdre and Terry Newholm (2002), "Voluntary Simplicity and the Ethics of Consumption," *Psychology & Marketing*, 19(2), 167–85.

Consumer Social Responsibility and Actually Available Choices

Rowan El-Bialy, York University, Canada

EXTENDED ABSTRACT

The construction of social responsibility at the consumer level is founded upon the idea that the individual subject's role under capitalism is no longer simply to meet their survival needs, but to intentionally make consumption choices that have positive rather than negative implications for the world beyond the individual (Giesler and Veresiu, 2014; Thompson and Kumar 2018). A plethora of evidence points to a gap between socially responsible values and actions, an attitude-behaviour gap (Belk 1985) whereby many consumers who profess a desire to make responsible choices do not always act consistently with that desire, even by their own measure (e.g., Eckhardt et al., 2010; White et al., 2012). Current theorizations do not explain why some consumers are more likely to make choices consistent with socially responsible consumption (SRC) than others. This paper argues that existing conceptualizations of consumer social responsibility (CnSR) are built upon an implicit theory of rational choice that is inadequate for explaining the reported attitude-behaviour gap (Eckhardt et al., 2010) and consumer resistance against responsibilization efforts (Eckhardt and Dobscha 2019). To address this, a theoretical framework is proposed in which the structurally-embedded consumer is an agentic subject who makes consumption choices while interminably engaging with other subjects, institutions, structures, and history within the field of a capitalist marketplace. In this framework, the link between pro-SRC attitudes and choices is the degree to which consumers can apply their agency to actually available choices.

Like other theorizations of social change, CnSR appears to be built on a purpose-oriented theory of action (Reckwitz 2002). Dominant theories of social change emanate from what Elizabeth Shove calls the 'ABC' framework: A for attitude change, B for behavior change, and C for choice (Shove, 2010). This framework has been criticized by Shove (2010; 2014) and others (Scheurendrand, Parsons, Cappellini, Patterson 2018) due to its failure to consider the structural constraints that "lock" consumers into unsustainable patterns (Newell et al. 2015). Whereas a rational choice theory of action would suggest that pro-SRC attitudes ought to manifest in consumers' exercising agency to change behavior and make socially responsible choices, the framework proposed here builds on practice theory (Bourdieu, 1990; Schatzki, 2010) to suggest that the social and environmental context, as well as the embodied knowledge of the consumer, must also align to make such choices possible.

In their theorizing of CnSR, Schlaile and colleagues (2018) draw on the three spheres of consumer responsibility outlined by Neuner (2001): the social environment, the natural environment, and the duty of caring for oneself. These three spheres of impact represent the intended areas of outcome of CnSR. Drawing on practice theory, a consumer makes consumption choices that can impact these spheres based on embodied knowledge that is imparted to the consumer *by and from* these same spheres. In other words, there is a dialectical relationship between the impact of consumer choices on these spheres and the impact of these spheres on actually available consumer choices. The structural issues upon which CnSR is intended to make a positive impact, such as poverty and global warming (Giesler and Veresiu, 2014), create both real and perceived barriers that limit the actually available choices facing consumers. A consumer can only exercise agency among choices that are actually available (Scheurenbrand et al. 2018), meaning that the consumer views such choices as plausible and accessible options that would meet their consumption needs. Both real and perceived constraints are shaped by the same spheres of impact that Neuner (2001) identifies, namely the social environment, the natural environment, and the self.[1]

This paper contributes to literature suggesting that the responsibilization discourse places a disproportionate burden on consumers who, relative to other actors such as government and corporations, have relatively low power to change structural issues (e.g., Bakkar 2010; Bertilsson 2015; Giesler and Veresiu 2014; Szaz 2007). The proposed framework goes further to suggest that a disproportionate burden is placed on those already impacted by the problems that CnSR seeks to redress, by not only placing greater responsibility onto marginalized consumers but also by failing to recognize that marginalized consumers often cannot select 'responsible' options from among their actually available consumption choices. Research shows that consumers who are marginalized due to class, race, gender, ability, or sexuality are most impacted by structural issues that CnSR is intended to address, such as poverty, global warming, and financial instability (Giesler and Veresiu 2014). These marginalized consumers will also face the greatest real and perceived constraints against their participation in SRC.

Capitalism is best served by a narrative of consumer responsibility that overlooks structurally-determined variations among the choices actually available to consumers. Building on the work of Lemke (2001), Giesler and Veresiu (2014) suggest that the logic of neoliberalism places shared responsibility upon all economically rational actors within a capitalist society, in which consumers' "moral quality is based on the fact that they rationally assess the costs and benefits of a certain act as opposed to other alternative acts" (Lemke 2001, 201). If consumers who are most impacted by the problems which CnSR seeks to redress are also those with the least access to SRC among their actually available consumption choices, then marginalized consumers also become those whose "moral quality" (Lemke 2001) is least likely to be demonstrated by way of participation in SRC.

Proponents of CnSR call for practices that realize the liberatory potential of consumption (Firat and Venkatesh 1995), and the framework presented here suggests that perhaps a more fruitful way towards that potential is of considering consumer choice - and its constraints - as at least partially shaped by those same historical problems that CnSR seeks to redress. In moving away from a purpose-oriented theory of action in CnSR, the current paper suggests that future research would benefit from considering how structures of practice determine the degree to which SRC is within a consumer's set of actually available choices. Future research might also consider how power structures and social disparities exist in relation to consumer responsibility narratives.

REFERENCES

Allen, D. E. (2002). Toward a theory of consumer choice as sociohistorically shaped practical experience: The fits-like-a-glove (FLAG) framework. *Journal of Consumer research*, 28(4), 515-532.

---

[1]   For the purposes of the current discussion, we use 'self' to represent the duty to care for oneself as one of Neuner's proposed spheres of impact of SRC. It also represents embodied knowledge as part of the habitus, which in Bourdieu's practice theory is the imprint of social and historical forces on the self.

Arnould EJ (2007) Should consumer citizens escape the market? *The Annals of the American Academy of Political and Social Science* 611: 96–111.

Bakker K (2010) The limits of 'neoliberal natures': Debating green neoliberalism. *Progress in Human Geography* 34: 715–735.

Belk, R. W. (1985). Materialism: Trait aspects of living in the material world. *Journal of Consumer research*, 12(3), 265-280.

Bertilsson J (2015) The cynicism of consumer morality. *Consumption Markets & Culture* 18: 447–467.

Bourdieu, P. (1990). *The logic of practice*. Stanford university press.

Eckhardt, G. M., Belk, R., & Devinney, T. M. (2010). Why don ' t consumers consume ethically ? 436, 426–436. https://doi.org/10.1002/cb

Eckhardt, G. M., & Dobscha, S. (2019). The Consumer Experience of Responsibilization : The Case of Panera Cares. *Journal of Business Ethics*, 159(3), 651–663. https://doi.org/10.1007/s10551-018-3795-4

Giesler M and Veresiu E (2014) Creating the responsible consumer: Moralistic governance regimes and consumer subjectivity. *Journal of Consumer Research* 41: 840–857.

Lemke, Thomas (2001), "Foucault, Governmentality, and Critique," *Rethinking Marxism*, 14 (3), 49–64.

Neuner, M. (2001). *Verantwortliches Konsumentenverhalten: Individuum und Institution*. Berlin: Duncker & Humblot.

Newell, P., Buckley, H., Turner, K., Shaw, C., Caney, S., Shove, E. et al. (2015). Governance Traps in Climate Change Politics: Re-Framing the Debate in Terms of Responsibilities and Rights, *WIREs Climate Change*, 6 (6), 535–40.

Reckwitz, A. (2002). Toward a theory of social practices: A development in culturalist theorizing. *European journal of social theory*, 5(2), 243-263.

Schatzki, T. (2010). Materiality and Social Life. Philosophy of the Social Sciences, 5(2), 123–149.

Scheurenbrand, K., Parsons, E., Cappellini, B., & Patterson, A. (2018). Cycling into Headwinds: Analyzing Practices That Inhibit Sustainability. Journal of Public Policy and Marketing, 37(2), 227–244. https://doi.org/10.1177/0743915618810440

Schlaile, M. P., Klein, K., & Böck, W. (2018). From bounded morality to consumer social responsibility: A transdisciplinary approach to socially responsible consumption and its obstacles. *Journal of Business Ethics*, 149(3), 561-588.

Shove, E. (2010) 'Beyond the ABC: Climate change policy and theories of social change', *Environment and Planning A,* 42(6), pp. 1273–1285. doi: 10.1068/a42282.

Soper K (2007) Re-thinking the good life: The citizenship dimension of consumer disaffection with consumerism. *Journal of Consumer Culture* 7: 205–229.

Szasz A (2007) *Shopping Our Way to Safety: How We Changed from Protecting the Environment to Protecting Ourselves.* Minneapolis, MN: Minnesota Press.

Thompson, C. J., & Kumar, A. (2018). Beyond consumer responsibilization: Slow Food's actually existing neoliberalism. *Journal of Consumer Culture,* 1469540518818632.

Ulver-Sneistrup S, Askegaard S and Kristensen DB (2011) The new work ethics of consumption and the paradox of mundane brand resistance. *Journal of Consumer Culture* 11: 215–238.

Willis MM and Schor JB (2012) Does changing a light bulb lead to changing the world? Political action and the conscious consumer. *The Annals of the American Academy of Political and Social Science* 644: 160–190.

Internal and External Reference Price Response in Brand Choice Models

Ossama Elshiewy, University of Goettingen, Germany
Anne Odile Peschel, Aarhus University, Denmark

EXTENDED ABSTRACT

Brand choice models with reference price (RP) response have a long tradition in marketing and consumer research (Briesch et al. 1997, Kalyanaram & Winer 1995, Mazumdar et al. 2005, Neumann & Böckenholt 2014). Research distinguishes between internal RP (Winer 1986, Kalwani et al. 1990) and external RP (Mayhew & Winer 1992, Rajendran & Tellis 1994). For internal RP, consumers are assumed to compare current prices to price expectations developed from past purchases when making a choice (also referred to as memory-based RP). For external RP, consumers make choices by constructing a RP from the currently observed distribution of prices in the choice set (also referred to as stimulus-based RP).

In most previous studies, a clear distinction was made between internal and external RP response in brand choice models. The authors of these studies decided between the RP concepts either based on model fit (Briesch et al. 1997, Terui & Dahana 2006) or compared both model results side by side (Hardie et al. 1993, Bell & Lattin 2000, Klapper et al. 2005, Kopalle et al. 2012). Some previous studies from the 1990s assumed that consumers consider both RP in their choice behavior and allowed both internal and external RP response in one brand choice model (Mayhem & Winer 1992, Rajendran & Tellis 1994, Kumar et al. 1998). However, none of these studies did account for asymmetric RP response. This type of RP response enables the differentiation of gains and losses compared to the RP. Asymmetric RP response in brand choice models has become the gold-standard (Mazumdar et al. 2005, Neumann & Böckenholt 2014) because it can reveal important behavioral response patterns (e.g. loss-aversion, see Kahneman & Tversky 1979). Consequently, a more realistic response with respect to internal and external RP may be missing in these early approaches. Other related previous studies allowed for asymmetric RP response and then proposed a data-driven profiling of consumers with respect to being either internal RP consumers or external RP consumers (Mazumdar & Papatla 1995, 2000, Moon et al. 2006, Dahana & Terui 2006). Only one single previous study has allowed consumers to fully consider asymmetric internal and external RP response in their choice behavior (Van Oest 2013); but the author did not account for heterogeneity across consumers in RP response with respect to loss-aversion. Bell & Lattin (2000) showed that ignoring consumer heterogeneity leads to overestimation of asymmetric RP response for both the internal and external RP concept. Even more relevant than incomplete consumer heterogeneity is that Van Oest (2013) did not allow an interaction between the two RP concepts, which may mask relevant drivers of choice behavior. In addition, more recent advances have been particularly concerned to model purchase incidence in brand choice models to avoid calculating endogenous internal RP (Erdem et al. 2010, Kopalle et al. 2012). This important feature in brand choice models has been neglected in all previous studies analyzing both RP concepts.

From this background, we propose a brand choice model applied to real purchase data that allows consumers to make choices based on both internal and external RP as well as an interaction between these two RP concepts. In line with prospect theory (Kahneman & Tversky 1979), we contend that the already known effects of gains (= increasing choice) and losses (= decreasing choice) from each RP concept will be altered when consumers consider both RP in their brand choice behavior. Following relevant advances, we account for asymmetric RP response, consumer heterogeneity, and purchase incidence (see, e.g., Erdem et al. 2010, Kopalle et al. 2012). By doing so, we improve the current practice in RP modeling by allowing for more realistic choice behavior. The results from our model provide novel insights and contribute to the body of knowledge in RP research.

The general main effects across all our models show that consumers in our purchase data respond more to price increases compared to price decreases with respect to both RP concepts (i.e. loss-aversion, Kahneman & Tversky 1979). These results are in line with previous research (Van Oest 2013). In our proposed model, we find that the negative impact of an external RP loss is mitigated in the case of an internal RP gain, but further amplified in the case of an internal RP loss. An external RP loss means that the brand chosen in the last situation is more expensive compared to the other alternatives in the choice set. If this comes in combination with an internal RP loss (i.e. higher price compared to the price in memory), consumers will less likely choose the brand in addition to the already negative main effects. If the external RP loss comes in combination with an internal RP gain (i.e. lower price compared to the price in memory), consumers will more likely choose the brand due to a weakening of the main effect of external RP loss.

Our results show that in addition to the well-established main effects of asymmetric internal and external RP response (Van Oest 2013), interactions between these RP concepts can have a further impact on brand choice. In comparison to our benchmark models, we show that purchase incidence has to be taken into account to arrive at significant interactions between the RP concepts. This outcome can be explained by the additional structural model component of purchase incidence and brand switching behavior (in comparison to only brand switching behavior). Taken together, our study contributes to the RP literature as the first study to provide evidence for the existence of an interaction effect for internal and external RP response.

REFERENCES

Bell, D.R., & Lattin, J.M. (2000). Looking for loss aversion in scanner panel data: The confounding effect of price-response heterogeneity. *Marketing Science*, 19(2), 185-200.

Briesch, R.A., Krishnamurthi, L., Mazumdar, T., & Raj, S.P. (1997). A comparative analysis of reference price models. *Journal of Consumer Research*, 24(2), 202-214.

Dahana, W.D., & Terui, N. (2006). Reference price formation model for heterogeneous consumers. *Working Paper*.

Erdem, T., Katz, M.L., & Sun, B. (2010). A simple test for distinguishing between internal reference price theories. *Quantitative Marketing and Economics*, 8(3), 303-332.

Hardie, B.G., Johnson, E.J., & Fader, P.S. (1993). Modeling loss aversion and reference dependence effects on brand choice. *Marketing Science*, 12(4), 378-394.

Kahneman, D., & Tversky, A. (1979). Prospect theory: An analysis of decision under risk. *Econometrica*, 47(2), 263-291.

Kalwani, M.U., Yim, C.K., Rinne, H.J., & Sugita, Y. (1990). A price expectations model of customer brand choice. *Journal of Marketing Research*, 27(3), 251-262.

Kalyanaram, G., & Winer, R.S. (1995). Empirical generalizations from reference price research. *Marketing Science*, 14(3), 161-191.

Klapper, D., Ebling, C., & Temme, J. (2005). Another look at loss aversion in brand choice data: Can we characterize the loss averse consumer?. *International Journal of Research in Marketing*, 22(3), 239-254.

Kopalle, P., Kannan, P.K., Boldt, L.B., & Arora, N. (2012). The impact of household level heterogeneity in reference price effects on optimal retailer pricing policies. *Journal of Retailing*, 88(1), 102-114.

Kumar, V., Hurley, M., Karande, K., & Reinartz, W.J. (1998). The impact of internal and external reference prices on brand choice: the moderating role of contextual variables. *Journal of Retailing*, 74(3), 401-426.

Mayhew, G.E., & Winer, R.S. (1992). An empirical analysis of internal and external reference prices using scanner data. *Journal of Consumer Research*, 19(1), 62-70.

Mazumdar, T., & Papatla, P. (1995). Loyalty differences in the use of internal and external reference prices. *Marketing Letters*, 6(2), 111-122.

Mazumdar, T., & Papatla, P. (2000). An investigation of reference price segments. *Journal of Marketing Research*, 37(2), 246-258.

Mazumdar, T., Raj, S., & Sinha, I. (2005). Reference price research: Review and propositions. *Journal of Marketing*, 69(4), 84-102.

Moon, S., Russell, G.J., & Duvvuri, S.D. (2006). Profiling the reference price consumer. *Journal of Retailing*, 82(1), 1-11.

Neumann, N., & Böckenholt, U. (2014). A meta-analysis of loss aversion in product choice. *Journal of Retailing*, 90(2), 182-197.

Rajendran, K.N., & Tellis, G.J. (1994). Contextual and temporal components of reference price. *Journal of Marketing*, 58(1), 22-34.

Terui, N., & Dahana, W.D. (2006). Research Note—Estimating Heterogeneous Price Thresholds. *Marketing Science*, 25(4), 384-391.

Van Oest, R. (2013). Why are consumers less loss averse in internal than external reference prices? *Journal of Retailing*, 89(1), 62-71.

Winer, R.S. (1986). A reference price model of brand choice for frequently purchased products. *Journal of Consumer Research*, 13(2), 250-256.

The Blockchain Brand

Sunil Erevelles, University of North Carolina at Charlotte, USA
Brian Whelan, University of North Carolina at Charlotte, USA
Padma Bulusu, University of North Carolina at Charlotte, USA

EXTENDED ABSTRACT

Brands represent a core foundation of trust between a firm and its consumers. As trust in brands continues to erode, with only 34% of consumers trusting the brands they use (Edelman 2019), the blockchain is emerging as a key solution for engendering trust, as well as other crucial brand elements, such as authenticity, identity, transparency and security. As blockchains begin to fill the "trust gap" in business and marketing, blockchain-centric logic is increasingly becoming central to building, sustaining and growing strong brands for the future. In this paper, the authors discuss the shift towards the evolving blockchain-centric logic in branding that may help lay the groundwork for future theoretical development and decision making in brand management.

A firm's brand is its critical connection with its consumers. The efficacy of that connection is deeply rooted in the concept of trust and the enduring affective bonds that ensue (Erevelles 1998). Customers use brands to simplify choice, to signal quality and to reduce risk (Keller and Lehman 2006). In recent years, firms have leveraged Big Data by gathering copious amounts of consumer data to better strengthen the consumer-brand relationship. While Big Data has permitted a rich understanding of consumers (Erevelles, Fukawa and Swayne 2016), the improper handling of sensitive consumer information in behavioral futures markets, rampant counterfeiting and extensive breaches of consumer information (Constantin 2019) from centralized cloud facilities has resulted in an alarming decline in trust for brands.

With consumer trust in brands at critically low levels, the blockchain is emerging as a potential remedy, and may become a key foundation for branding in the future. Indeed, a picture of the future "blockchain brand" is emerging, where consumer trust is restored through the use of a secure and transparent technological framework that enhances brand identity and authenticity, while safeguarding consumer data. Although the technological architecture that enables the blockchain to function is complex, its intrinsic value lies in its conceptual simplicity. Simply put, a blockchain is a secured record of transactions between parties (blocks), chronologically connected together (chained) with previous blocks and governed by a consensus mechanism to form an open, immutable and decentralized ledger of market activity. When needed, the ledger can be programmed to initiate transactions automatically, and execute the transfer of value. Blockchains are cryptographically secured, verified by consensus and publicly shared, thus making malicious behavior difficult.

The theoretical foundation of blockchain builds on game theory (von Neumann and Morgenstern 1944), with a particular focus on "new institutional economics" (North 1991). Game theory is the study of "mathematical models of conflict and cooperation between intelligent rational decision makers" (Myerson 1991). In North's institutional economics terms, blockchain can simply be thought of as a virtual decentralized institution. From cave people societies, humans have constantly searched for ways to lower uncertainty during the exchange of value (Serres and Warburg 2017). The blockchain, as part of the continuing evolution of institutions, is simply a virtual decentralized institution that allows us to lower uncertainty in marketplaces for assets such as brands, with technology alone and without centralized intermediaries. A series of foundational premises are next developed to help create a theoretical framework for the blockchain brand.

First, the blockchain represents a *fundamental paradigm shift* from the one associated with Big Data. While the World Wide Web, and in particular, the Big Data paradigm, focuses on the "sharing of information," blockchain is focused on the "exchange of assets," such as brands. In other words, the World Wide Web was designed for information, not for e-commerce. Security on the web is often an afterthought. Consumer trust is often violated deliberately or inadvertently. Opacity is often used to compromise consumer data. Blockchain mitigates these problems to help create strong and enduring brands.

Second, blockchain enhances *brand trust* by replacing subjective trust in brands and brand messaging by centralized institutions with objective, verifiable distributed trust in technology to better ensure the integrity of a brand. Trust is the basis for all successful consumer/brand relationships. Blockchain helps the consumer-brand relationship move from "blind trust" to "smart trust" (Covey and Link 2012).

Third, blockchain enhances *brand authenticity* by providing certifiable digital records of a brand, enabling consumers and other stakeholders to track and authenticate any brand asset over its lifetime. Brand authenticity may be defined as "the perceived genuineness of a brand" (Fritz, Schoenmueller and Bruhn 2017). With the help of the blockchain, brand authenticity is protected from the deleterious effects of counterfeiting, for example, through the creation of a secure, chronological and verifiable digital record that transparently indicates all transactions across the lifespan of the brand asset.

Fourth, blockchain enhances *security* for a brand's consumers by cryptographically protecting consumer data and distributing such data across the blockchain network.

It does this through a tamper-resistant cryptographic process that can authenticate identities, thus assisting mistrustful strangers around the world to securely conduct business with each other (Nordrum, 2017). Security is reinforced by the use of an encrypted public and private key process similar to the two-key process used in safety deposit boxes at a bank (Tapscott and Tapscott, 2018).

Fifth, blockchain facilitates *disintermediation* in branding by empowering consumers to objectively verify a brand asset and stated value proposition without the need of potentially untrustworthy intermediaries. A consumer, for example may trust an automobile brand, but mistrust an automobile salesperson. Through blockchain, consumers are provided with accurate, verifiable and secure means to evaluate brands and brand messaging without intermediaries.

In conclusion, the potential magnitude of the benefits of the blockchain in a variety of branding situations, such as co-branding (e.g., Erevelles et al. 2008), brand extensions (e.g., Volckner and Sattler 2006) and brand accessibility are considerable. The blockchain may represent a catalyst that will be central to brand management in the future. While its potential is vast, considerable further research needs to be carried out before the value of blockchain in branding can fully be realized. It may be a fair to conclude, however, that this paper may serve as a modest first step in the realization of that potential.

REFERENCES

Constantin, Lucian (2019), "Data Breaches Exposed 5 Billion Records in 2018," CSO, (accessed September 10, 2019), https://www.csoonline.com/article/3341317/data-breaches-exposed-5-billion-records-in-2018.html.

Covey, Stephen M. R. and Greg Link (2013), *"Smart Trust: The Defining Skill that Transforms Managers into Leaders,"* New York: Simon and Schuster, Inc.

Edelman (2019), "2019 Edelman Trust Barometer Special Report: In Brands We Trust?" (accessed December 18, 2019), https://www.edelman.com/research/trust-barometer-special-report-in-brands-we-trust

Erevelles, Sunil (1998), "The Role of Affect in Marketing," *Journal of Business Research*, 42 (3), 199-216.

Erevelles, Sunil, Nobuyuki Fukawa, and Linda Swayne (2016), "Big Data Consumer Analytics and the Transformation of Marketing," *Journal of Business Research*, 69 (2), 897–904.

Erevelles, Sunil, Thomas H. Stevenson, Shuba Srinivasan and Nobuyuki Fukawa (2008), "An Analysis of B2B Ingredient Co-Branding Relationships," *Industrial Marketing Management*, 37, 940-952.

Fritz, K., Schoenmueller, V., & Bruhn, M. (2017), "Authenticity in Branding-Exploring Antecedents and Consequences of Brand Authenticity," *European Journal of Marketing*, 51(2), 324-348.

Keller, Kevin and Lehman, Donald (2006), "Brands and Branding: Research Findings and Future Priorities," *Marketing Science*, 25 (6), 740-759.

Myerson, Roger B. (1991), *Game Theory: Analysis of Conflict.* Cambridge, MA: Harvard University Press.

Nordrum, Amy (2017), "Wall Street Firms to Move Trillions to Blockchains in 2018," (accessed November 13, 2019), http://spectrum.ieee.org/telecom/internet/wall-street-firms-to-move-trillions-to-blockchains-in-2018.

North, Douglas C. (1991), "Institutions," *Journal of Economic Perspectives*, 5 (1), 97-112.

Serres, Tom and Bettina Warburg (2017), "Introducing Asset Chains – The Cognitive, Friction-free, and Blockchain-enabled Future of Supply Chains," Blockchain Research Institute, (accessed September 9, 2019), https://mailchi.mp/animalventures.co/auirc8sfoz.

Tapscott, Don, & Alex Tapscott (2018), *Blockchain Revolution: How the Technology behind Bitcoin is Changing Money, Business and the World.* New York, NY: Portfolio Penguin.

Volckner, Franziska and Henrik Sattler (2006), "Drivers of Brand Extension Success," *Journal of Marketing*, 70 (April) 18-34.

Von Neumann, John, and Oskar Morgenstern (1944), *Theory of Games and Economic Behavior.* Princeton, NJ: Princeton University Press.

Co-creation between Consumers or with Firms: Determinants, Consequences and Components of Value Consumption in Services

Camille Eslan, FFE - INRAE - IFCE - Montpellier Supagro, France
Sandrine Costa-Migeon, INRAE, UMR MOISA, France
Céline Vial, IFCE - INRAE - UMR MOISA, France

EXTENDED ABSTRACT

In the context of leisure sports, many people are leaving sporting clubs to self- organize (Chillet 2019), alone or with other consumers (Heinonen, Campbell, and Ferguson 2019). This poses a problem for clubs and sport federations as it leads to a decrease in members' number (Eslan, Vial, Costa and Rollet 2019). This presentation will review the literature on value co- creation (VCC) / prosumption to understand (i) what determines consumer participation in the production process and (ii) whether the service offering of a firm using value co-creation could substitute for consumer self-organization. We first present the determinants and consequences of consumer participation in a co-creation process with a business or among consumers. This part highlights the crucial role of value in customer decisions, introducing the value creation process described in the second part. Thirdly, we propose an integrative approach of value co-creation in the choice of service production applied to self-organized activities.

Prosumption, the act of consuming and producing, allows consumers to personalize their products or services. If this process is carried out in relation with several actors (professionals, consumer groups, organizations or individuals), we speak of value co- creation, with personalization often mainly managed by companies. Leclercq, Hammedi, and Poncin (2016) defines co-creation as "*a joint process during which value is reciprocally created for each actor (individuals, organizations or networks)*" to interact and exchange resources. In line with Heinonen, Jaakkola, and Neganova (2018), we posit that C to C co- creation depends on the value inherent in the interaction between the customer and the provider, but also emerging from the interactions between customers.

Prior research has shown the importance of motivations for engaging in prosumption. Its antecedents are rooted in either the customer's buying experience or the decision-making process. Carrying out a project of prosumption requires knowledge, skills, community seeking and time (Wolf, Albinsson, and Becker 2015). Heinonen *et al.* (2018) show a range of drivers of C to C interactions induced by firms, situations or customers (motivations), these are either for different social or personal benefits. Benefits are thus emotional value or reinforcement of affective (i.e., emotional) and network (i.e., social) values for focal clients through the playful and ludic behaviors of other clients (Kim, Byon, and Baek 2019). In sport, C to C co-creation studies show that the presence of interactions motivates participants, thereby enhancing consumer experience (Kolyperas, Maglaras, and Sparks 2019). Moreover, willingness to participate to future co-creation activities depends on past experience, thus on the consequences of the process influenced by moderators such as trust or demographic determinants. These moderators act either before, during or after VCC process.

Furthermore, in line with Aurier, Evrard, and N'Goala (2004), we integrate overall perceived value as a consequence of VCC process. The sacrifices made and the benefits perceived constitute overall perceived value. It goes beyond the profit to cost ratio shown by Xie, Bagozzi, and Troye (2008), which is not only an economic benefit or cost. However, if this overall value is in favour of sacrifice, consumers will turn to outsourcing rather than prosumption. The relationship between value creation and process outcomes then underlines the central role of value in the consumer's decision to participate in production, especially under the influence of overall perceived value, as some components of value seem more decisive than others in consumer participation. The absence of certain components may lead to the co-creation process being halted. Our position herein is to analyze value creation resulting from consumer interactions and components of this value as preferential judgments.

We propose an integrative picture of the different dimensions of value based on Holbrook (2002) and Aurier *et al.* (2004). The above criteria have thus resulted in a typology that breaks down the value into four main components: instrumental, hedonic, social and spiritual value. We enrich the spiritual value component with holistic value (Lai 1995) which is the perceptual benefits that depends on how compatible or coherent this consumption is perceived by the consumer. Furthermore, we support Medberg and Heinonen (2014) research on the influence of invisible values. These authors consider that value creation emerges either by the companies, in the relationship between companies and customers, or by the customer alone. Thus, spiritual value also refers to *shared moral value* as the adequacy between customers' own moral standards and the standards of the other stakeholder. Corneloup (2016) in climbing activity shows an opposition of practitioners according to their practice style. Californian-style practitioners focused on their relationship with nature and do not wish a more competitive form motivated by quick climbing on an artificial wall. Moreover, *responsibility value* is defined as the firm's "*practice of responsibility and integrity towards its customers*". Both values relate indirectly to how the companies operate, then they can be integrated as intrinsic others-orientated approach. For *heritage value,* based on the history of the customer and its relatives with the company, we consider it more as social value, as heritage exclusively depends on consumption experience of the customer and its relatives. Like the *relationship value*, defined as a long-term relationship between actors, these values are based specifically on the clients' own logic.

This critical qualitative analysis of VCC literature tries to understand why consumers do engage in VCC with companies or in C to C. The analysis of value components highlights invisible values that may explain why consumers prefer to co-create with others than with firms. Indeed, when consumers do not find all value dimensions they are looking for in the professional structures, then they drop out of professional structures. Future researches should focus on supply and demand adequacy to restructure service offer for companies, and confirm the integrative approach of value in the analysis of consumers' participation to co- creation. Firms have leverage if they take into account the value dimensions in the co- creation process in order to recapture consumers organized in C to C, but also, on a critical perspective, to find out what occurs when consumers are not able to co-create, do not want or see value in the process.

REFERENCES

Aurier, Philippe, Yves Evrard, and Gilles N'Goala. 2004. "Comprendre Et Mesurer La Valeur Du Point De Vue Du Consommateur." *Recherche et Applications en Marketing* 19 (3).

Chillet, Sylvain. 2019. "Etude Sur La Pratique Sportive Non Fédérale En Auvergne - Rhône - Alpes.".

Corneloup, Jean. 2016. *Sociologie Des Pratiques Récréatives En Nature: Du Structuralisme À L'interactionnisme.* Collection Sportnature.org. L'Argentière-La Bessée: Éditions du Fournel.

Eslan, Camille, Céline Vial, Sandrine Costa, and Pascaline Rollet. 2019. "Age-Related Analysis of Service Loyalty: An Example from Recreational Riders in Equestrian Centres." Paper presented at 27th European Association of Sport Management conference, Sevilla, Spain.

Heinonen, Kristina, Colin Campbell, and Sarah Ferguson. 2019. "Strategies for Creating Value Through Individual and Collective Customer Experiences." *Business Horizons* 62 (1): 95–104. https://doi.org/10.1016/j.bushor.2018.09.002.

Heinonen, Kristina, Elina Jaakkola, and Irina Neganova. 2018. "Drivers, Types and Value Outcomes of Customer-to-Customer Interaction." *JSTP* 28 (6): 710–32. https://doi.org/10.1108/JSTP-01-2017-0010.

Holbrook, Morris B., ed. 2002. *Consumer Value: A Framework for Analysis and Research.* Routledge interpretive marketing research series. London, New York: Routledge.

Kim, Kyungyeol, Kevin K. Byon, and Wooyeul Baek. 2019. "Customer-to-Customer Value Co-Creation and Co-Destruction in Sporting Events." *The Service Industries Journal* 6:1– 23. https://doi.org/10.1080/02642069.2019.1586887.

Kolyperas, Dimitrios, Georgios Maglaras, and Leigh Sparks. 2019. "Sport Fans' Roles in Value Co-Creation." *European Sport Management Quarterly* 19 (2): 201–20. https://doi.org/10.1080/16184742.2018.1505925.

Lai, Albert Wenben. 1995. "Consumer Values, Product Benefits and Customer Value: A Consumption Behavior Approach." *ACR North American Advances* NA-22UR - https://www.acrwebsite.org/volumes/7772/volumes/v22/NA-22.

Leclercq, T., W. Hammedi, and I. Poncin. 2016. "Dix Ans De Co-Creation De Valeur : Une Revue Integrative." *Recherche et Applications en Marketing* 31 (3): 29–66. https://doi.org/10.1177/0767370116638270.

Medberg, Gustav, and Kristina Heinonen. 2014. "Invisible Value Formation: A Netnography in Retail Banking." *International journal of bank marketing* 32 (6): 590–607. https://doi.org/10.1108/IJBM-03-2014-0041.

Wolf, Marco, Pia A. Albinsson, and Cherylynn Becker. 2015. "Do-It-Yourself Projects as Path Toward Female Empowerment in a Gendered Market Place." *Psychol. Mark.* 32 (2): 133–43. https://doi.org/10.1002/mar.20768.

Xie, Chunyan, Richard P. Bagozzi, and Sigurd V. Troye. 2008. "Trying to Prosume: Toward a Theory of Consumers as Co-Creators of Value." *J. of the Acad. Mark. Sci.* 36 (1): 109– 22.

Shopping Carts Affect Purchasing by Activating Arm Muscles

Zachary Estes, Cass Business School, UK
Mathias Clemens Streicher, University of Innsbruck, Austria

EXTENDED ABSTRACT

A fundamental goal of retail managers and consumer welfare advocates alike is to identify factors that affect shopping and purchasing. One factor that may influence purchasing, but which has received little attention by marketing researchers, is the shopping cart (see Cochoy 2008; Larson, Bradlow, and Fader 2005; Van Ittersum, Wansink, Pennings, and Sheehan 2013). The present research provides the first investigation of how the physical properties of shopping carts influence purchasing. We deduce a surprising hypothesis with tangible economic implications: Standard shopping carts, which shoppers push via a horizontal handlebar, may actually *decrease* purchasing.

Horizontal handles naturally elicit gripping with *wrist pronation*, in which the palms face downward. Wrist pronation, in turn, activates the *extensor muscles* of the arm (Argubi-Wollesen, Wollesen, Leitner, and Mattes 2017). Finally, activating the extensor muscles decreases attitudes toward objects (Cacioppo, Priester, and Berntson 1993) and evokes avoidance motivation (Förster, Higgins, and Idson 1998). Activating the *flexor muscles*, in contrast, tends to improve attitudes and evoke approach motivation.

We developed a novel shopping cart that, instead of having a horizontal handlebar, has two parallel handgrips that induce a *neutral wrist posture* in which the palms face one another. The orientation of the handles, together with their slightly lower placement, activates the flexor muscles (cf. Argubi-Wollesen et al. 2017). This novel shopping cart thus should elicit more purchasing than standard shopping carts.

Lab Study 1 (N = 126 students) tested whether shopping with pronated wrist posture decreases hypothetical purchasing. Participants viewed products from a variety of categories (e.g., beverages, office supplies) while pushing a modified shopping cart with either pronated or neutral wrist posture, and they indicated how many of each product they would like to purchase at the given price. We calculated three dependent variables from participants' hypothetical purchases: *quantity* (total number of items selected), *variety* (number of different brands selected), and *spending* (total cost in €). As hypothesized, the pronation group hypothetically purchased significantly lower quantities, with less variety and lower spending (see Table 1). Wrist pronation reduced hypothetical purchases in six of seven product categories, including not only "vice" products such as snacks, but also "virtue" products such as cleaning products (see also Streicher and Estes 2016).

Lab Study 2 (N = 100 students) tested whether the effect is due to wrist posture, or to flexor muscle activation. We replicated the procedure of Study 1, but here participants pushed either the cart with parallel handgrips (same as in Study 1) or another novel cart with vertical handles. The shopping cart with vertical handles also induces neutral wrist posture, but critically, because the handles are relatively high and angled forward, they activate the extensor muscles rather than the flexor muscles. If the effect is due to neutral wrist posture, there should be no difference between carts. If the effect is due to flexor muscle activation (Cacioppo et al. 1993), then parallel handgrips should induce more hypothetical purchasing than vertical handles. As shown in Table 1, the parallel handgrips induced significantly more hypothetical purchase quantities, more variety, and more spending. Thus, the increased purchasing with parallel handgrips ap-

pears to be due to flexor muscle activation rather than wrist/forearm posture alone.

Field Study 3 (N = 228 shoppers) tested whether standard shopping carts with a horizontal handlebar–which induces wrist pronation–decrease sales in a grocery store. We conducted a field experiment using two types of shopping carts in a typical European supermarket. Shoppers were given either a standard cart that induces wrist pronation, or our modified cart that induces neutral wrist posture. Unbeknownst to the shoppers, when they paid for their purchases, the cashier surreptitiously recorded whether they had shopped with a standard-pronation cart or a modified-neutral cart. Linear regression with cart-type (neutral = 0, pronation = 1) as our focal predictor, age, mood, and cart ergonomics as control factors, and spending as the dependent variable revealed a significant overall model, $F(4, 223) = 10.76$, $p < .001$, $R^2 = .16$. Most importantly, after statistically accounting for those control factors, cart-type significantly predicted spending, $\beta = -.14$, $t = 2.14$, $p = .03$. This effect was also significant without any control variables, $t(226) = 2.66$, $p < .01$, $d = .37$. Thus, shoppers spent more of their own real money when shopping with a modified cart that induces neutral wrist posture than with a standard cart that induces pronated wrists.

In sum, these experiments provide robust evidence that standard shopping carts with horizontal handlebars decrease purchasing. Horizontal handles, by virtue of activating extensor muscles, decrease product evaluations (Cacioppo et al. 1993), evoke avoidance motivation (Förster et al. 1998), and ultimately decrease purchasing. A novel shopping cart with parallel handgrips significantly increased purchase quantity, variety, and spending. Parallel handgrips activate flexor muscles, thereby improving evaluations and evoking approach motivation (Cacioppo et al. 1993; Förster et al. 1998).

This research contributes substantially to the literature on basket size, i.e. the average quantity of products that shoppers purchase on a given occasion (Manchanda, Ansari, and Gupta 1999). Because basket size directly impacts a shop's profit (Walters and Jamil 2003), managers often use a number of in-store marketing actions to influence shoppers' basket decisions (Gilbride et al. 2015; Inman et al. 2009). Prior studies have examined how shopping carts affect shopping behavior (Cochoy 2008), such as "smartcarts" that influence spending by informing shoppers' of their total costs as they shop (Van Ittersum et al. 2013). However, the present research is the first to examine the physical properties of the shopping cart itself as a marketing tool for influencing shopping and buying behavior.

This research has tangible economic implications for retail managers, suggesting that the shopping carts currently available in most large retail outlet may decrease sales. On the other hand, in terms of consumer welfare, the standard shopping cart with a horizontal handlebar induced shoppers to spend less money. For the majority of shoppers, who face a constant battle against over-spending and over-consumption, standard shopping carts thus may act as an unexpected restraint on spending and consuming.

REFERENCES

Argubi-Wollesen, Andreas, Bettina Wollesen, Martin Leitner, and Klaus Mattes (2017), "Human body mechanics of pushing and pulling: analyzing the factors of task-related strain on the musculoskeletal system," *Safety and health at work*, 8 (1), 11-18.

Cacioppo, John T., Joseph R. Priester, and Gary G. Berntson (1993), "Rudimentary determinants of attitudes: II. Arm flexion and extension have differential effects on attitudes," *Journal of personality and social psychology*, 65 (1), 5-17.

Cochoy, Franck (2008), "Calculation, qualculation, calqulation: shopping cart arithmetic, equipped cognition and the clustered consumer," *Marketing theory*, 8 (1), 15-44.

Förster, Jens, E. Tory Higgins, and Lorraine Chen Idson (1998), "Approach and avoidance strength during goal attainment: regulatory focus and the "goal looms larger" effect," *Journal of personality and social psychology*, 75 (5), 1115-1131.

Gilbride, Timothy J., J. Jeffrey Inman, and Karen Melville Stilley (2015), "The role of within-trip dynamics in unplanned versus planned purchase behaviour," *Journal of Marketing*, 79 (May), 57-73.

Inman, J. Jeffrey, Russell S. Winer, and Rosellina Ferraro (2009), "The interplay among category characteristics, customer characteristics, and customer activities on in-store decision making," *Journal of Marketing*, 73 (September), 19-29.

Larson, Jeffrey S., Eric T. Bradlow, and Peter S. Fader (2005), "An exploratory look at supermarket shopping paths," *International Journal of Research in Marketing*, 22 (4), 395-414.

Manchanda, Puneet, Asim Ansari, and Sunil Gupta (1999), "The "shopping basket": A model for multicategory purchase incidence decisions," *Marketing science*, 18 (2), 95-114.

Streicher, Mathias C., and Zachary Estes (2016), "Shopping to and fro: Ideomotor compatibility of arm posture and product choice," *Journal of Consumer Psychology*, 26 (3), 325-336.

Van Ittersum, Koert, Brian Wansink, Joost ME Pennings, and Daniel Sheehan (2013), "Smart shopping carts: How real-time feedback influences spending," *Journal of Marketing*, 77 (November), 21-36.

Walters, Rockney G., and Maqbul Jamil (2003), "Exploring the relationships between shopping trip type, purchases of products on promotion, and shopping basket profit," *Journal of Business Research*, 56 (1), 17-29.

Social Dynamics in Consumer Communications: How Hierarchy Shapes Language

Linying (Sophie) Fan, Hong Kong University of Science and Technology, China
Derek Rucker, Northwestern University, USA
Yuwei Jiang, Hong Kong Polytechnic University, China

EXTENDED ABSTRACT

The importance of consumer communications has led to an increased interest by academics to understand the very nature of consumers' language. Specifically, academics have begun to explore how properties of language, such as sentence structure as well as word choice, affect both the memorability and persuasiveness of communications (e.g., Danescu-Niculescu-Mizil et al. 2012; Packard, Moore, and McFerran 2018; Rocklage, Rucker, and Nordgren 2018).

Given that language is by definition a tool people use to communicate with another in the social realm (Duranti and Goodwin 1992), social dynamics are inevitably involved in the social parties communicating with each other in language (e.g., Eibl-Eibesfeldt 1989; Maynard and Peräkylä 2003). As one of the most fundamental parts of social relations (e.g., Magee and Galinsky 2008), power plays a central role in social dynamics. Indeed, the perception of power both shape and is shaped by social dynamics (Ng and Bradac 1993). Individuals use power perception to judge and experience their social relationships and the communication that occurs within them (Ng and Bradac 1993). Given the substantial impact of power on social dynamics, it is crucial to understand how consumers' sense of power affects both their construction and reception of language in marketing communications.

The current research proposes that the feeling of powerfulness increases consumers' language conciseness. This is presumably because that the feeling of powerfulness enhances consumers' perceptions of self-efficiency and assertiveness in decision making (e.g., Anderson and Galinsky 2006; See et al. 2011), and consequently reduces their need to justify they decisions and actions to others. This reduced need-for-justification further leads to enhanced language conciseness among high power consumers. Consistent with this proposed underlying mechanism, we predict that this effect will be mitigated when the communication contexts require less justification (e.g., in non-evaluative communications). From the opposite angle, given the power perception makes people focus on asymmetric control over resources and lead them to take a double-standard on themselves and others (Magee and Galinsky 2008; Rucker, Galinsky, and Dubois 2012), we further predict that high-power consumers would be less persuaded by concise (vs. detailed) marketing languages from companies.

In Study 1, we used a real-world dataset of Enron's (an energy trading company) internal email communications (N = 10,308 emails) to investigate the effect of powerfulness on language conciseness. Previous research has provided amble evidence that individuals' ranks in their job can be considered as an index for their perception of power (e.g., Magee and Galinsky 2008). Thus, we categorized Enron employees' corporate roles into eight job ranks. The power index of email sender was calculated by subtracting the job rank of the recipient from the rank of the sender. And language conciseness was measured through calculating the number of words in each email (Pennebaker, Francis, and Booth 2001). As predicted, the feeling of high power leads employees to use more concise language in their emails. More importantly, we found that down-emails (*the sender has a higher rank than the recipient*) were more concise than both peer-emails (*the sender has the same rank as the recipient*) and up-emails (*the sender has a lower rank than the recipient*) and

the latter two conditions did not differ significantly, suggesting the observed effect is driven by a feeling of powerfulness rather than a feeling of powerlessness.

Study 2 (N = 136) provided direct process evidence by showing the mediating roles of need-for-justification. Power was manipulated through an imagination task (adopted from Rucker, Dubois, and Galinsky 2011). Participants imagined they are either a boss (*high power condition*) or an employee (*low power condition*) at a company. Next, in an ostensibly unrelated task, participants imagined that a foreign tourist they met on the street asked for their recommendations regarding two local museums. They were provided two different recommendations varying in conciseness and were asked to choose one recommendation to reply to the tourist. Finally, we measured their perceived need-for-justification via three items (Hsee et al. 2003). As expected, participants in the high power condition were more likely to choose the more concise recommendation than those in the low power condition and this effect was mediated by need-for-justification.

If the effect of power on language conciseness is indeed driven by the reduced need-for-justification among high power individuals, we should expect to a weakened effect when the communication context naturally need less justification, such as non-evaluative communications. Study 3 (N = 240) tested this hypothesis through a 2 (high power vs. low power) × 2 (evaluative context vs. non-evaluative context) between-subjects design. Participants first completed the same role imagination power manipulation task as in Study 2. Then, participants were presented with two products and were asked to write a product evaluation (*evaluative context*) or a product description (*non-evaluative context*). Results showed that participants in the high (vs. low) power condition wrote more concisely in the evaluative context. However, the difference disappeared in the non-evaluative context.

Study 4 (N = 212) illustrated the bidirectional effects of power in language conciseness by showing high-power consumers are less persuaded by concise marketing language from companies. The reason behind this prediction is that although high power individuals feel that they do not need to explain their opinions to others, they still want to hear others' justifications. We used 2 (high power vs. low power) × 2 (concise information vs. detailed information) between-subjects design. After the same power imagination manipulation, participants evaluated three products in randomized order. We manipulated language conciseness via the length of marketing information provided in ads. The results demonstrated that high power participants were less persuaded by concise (vs. detailed) product information and low power consumers did not show this difference.

In conclusion, this research makes a novel contribution by demonstrating how consumers' perception of power shapes their language selection. Our work also highlights the impact of power in marketing communication by showing its different impacts on both message senders and receivers. Further, our research suggests potential tactics that companies can use to increase the effectiveness of their marketing language.

REFERENCES

Anderson, Cameron and Adam D. Galinsky (2006), "Power, Optimism, and Risk-Taking," *European Journal of Social Psychology*, 36 (4), 511–36.

DeMarree, Kenneth G., Chris Loersch, Pablo Briñol, Richard E. Petty, B. Keith Payne, and Derek D. Rucker (2012), "From Primed Construct to Motivated Behavior," *Personality and Social Psychology Bulletin*, 38 (12), 1659–70.

Duranti, Alessandro and Charles Goodwin (1992), *Rethinking Context: Language as an Interactive Phenomenon*, Cambridge: Cambridge Univ. Press.

Eibl-Eibesfeldt, Irenäus (1989), *Foundations of Human Behavior. Human Ethology*. Hawthorne, NY, US: Aldine de Gruyter.

Hsee, Christopher K., Jiao Zhang, Fang Yu, and Yiheng Xi (2003), "Lay Rationalism and Inconsistency between Predicted Experience and Decision," *Journal of Behavioral Decision Making*, 16 (4), 257–72.

Magee, Joe C. and Adam D. Galinsky (2008), "Social Hierarchy: The Self-Reinforcing Nature of Power and Status," *The Academy of Management Annals*, 2 (1), 351–98.

Maynard, Douglas W. and Anssi Peräkylä (2003), "Language and Social Interaction," in *Handbook of Social Psychology*, ed. John. D DeLamater, New York: Kluwer-Plenum, 233–58.

Ng, Sik Huang and James J. Bradac (1993), *Power in language: Verbal communication and social influence*. Newbury Park, CA: Sage.

Packard, Grant, Sarah G. Moore, and Brent McFerran (2018), "(I'm) Happy to Help (You): The Impact of Personal Pronoun Use in Customer–Firm Interactions," *Journal of Marketing Research*, 55 (4), 541–55.

Pennebaker, James W., Martha E. Francis, and Roger J. Booth (2001), *Linguistic Inquiry and Word Count: LIWC*. Mahwah, NJ: Lawrence Erlbaum Associates.

Rocklage, Matthew D., Derek D. Rucker, and Loran F. Nordgren (2018), "Persuasion, Emotion, and Language: The Intent to Persuade Transforms Language via Emotionality," *Psychological Science*, 29 (5), 749–60.

Rucker, Derek D., Adam D. Galinsky, and David Dubois (2012), "Power and Consumer Behavior: How Power Shapes Who and What Consumers Value," *Journal of Consumer Psychology*, 22 (3), 352–68.

See, Kelly E., Elizabeth W. Morrison, Naomi B. Rothman, and Jack B. Soll (2011), "The Detrimental Effects of Power on Confidence, Advice Taking, and Accuracy," *Organizational Behavior and Human Decision Processes*, 116 (2), 272–85.

The Effect of Image Content and Text Similarity on Brand Narratives Sharing

Stefania Farace, LUISS Guido Carli, Italy
Francisco Villarroel, LUISS Guido Carli, Italy
Dhruv Grewal, Babson College, USA
Ko de Ruyter, King's College, UK

EXTENDED ABSTRACT

Over *40* billion images have been shared to date on social media platforms. Despite the growing interest in visual driven content, *66%* of brands still do not understand what type of images contributes to a compelling narrative (Buffer 2019). Therefore, it is crucial to analyze the impact of images in social media posts and their impact on consumer sharing.

Inspired by visual semiotics theory (Kress and van Leeuwen 2006), we propose that narrative images, that is images portraying an action among depicted objects, have a positive effect on consumer sharing. Social media platforms allow for consumption of narrative images which often include textual information. While including both image and text in the same brand message may provide the viewer enough information to understand the message (Villarroel Ordenes 2019), we suggest that viewers may feel overwhelmed by the amount of text in the caption and within the image when exposed to a narrative image. In line with this, we propose that narrative images have a negative effect on consumer sharing when the caption and text within the image are similar.

Sharps and Nunes (2002) show that images portraying relationships among visual elements are easier to process verbally (e.g., "moving to the right", "looking to the horizon"), and consequently are more feature-intensive than images not including relationships. Accordingly, we propose that images showing action (narrative) are more likely to be processed in a piecemeal fashion while, an image which is not showing relationships would be processed in its entirety, as a gestalt (Sharps and Nunes 2002). Piecemeal interpretation mediates the effect between narrative images and consumer attitude/sharing.

Our first study examines the effects of narrative (vs. conceptual) images, similarity between the caption and text within the image, and their interactions, on message sharing. We collected *6,187* social media posts from Twitter. We operationalize consumer message sharing as the number of retweets. Using extant definitions of the image type (Kress and van Leeuwen 2006), we asked two research assistants to annotate the images as narrative (i.e., showing unfolding actions and events) or conceptual (i.e., stable, static, and timeless). We computed the mean value provided by the two coders and used it as our independent variables ($r = .69$). To measure text similarity between the caption and the text within the image we used the Jaro–Winkler distance metric which captures the similarity between two string sequences. In line with previous research, we account for several control variables.

Our model for share is:

$$\# Share_i = exp(\alpha_0 + \beta_1 * \#Share_{i-1} + \beta_2 * Narrative_i + \beta_3 * TextSimilarity_i + \\ + \beta_4 * Narrative_i * TextSimilarity_i + \tau_i \\ + \beta_n \theta_n + \alpha_k + \epsilon_{ij}),$$

Where τ_i indicates the control residuals from the control functions (they allow to account for content manager decisions in previous posts; Villarroel Ordenes et al. 2019), represents the control variables and their respective coefficients, and are the brand fixed effects and error term, respectively. Our results confirm that consumers share significantly more narrative images than conceptual ones ($\beta_{Narrative}=.97$, $p<.001$). We also find support for our prediction that when narrative images are paired with highly similar caption and text within the image, the effect on consumer sharing becomes negative ($\beta_{Narrative \times TextSimilarity}=-.24$, $p<.001$).

Our second Study examines how the content of the image in a Twitter post influences attitude towards the Tweet, consumer sharing, and piecemeal interpretation. One hundred Amazon Mechanical Turk participants ($M_{age}=41.21$ years, SD=12.15; 59% female), paid $.40, participated in this image content (conceptual vs. narrative) between-subject experiment.

The Nike Tweet portrays a basketball player and the caption for both Tweets was kept constant. The image presented the basketball player either posing (conceptual) or tossing a basketball (narrative). Participants were exposed to one of the Tweets, then expressed their willingness to share the Tweet and their attitude towards the Tweet. We also measured piecemeal interpretation and whether the image was perceived to be conceptual or narrative (same as in Study 1). As control variables, we measured perceived quality and involvement with the Tweet. Our results show that participants perceived the image where the basketball player was simply posing as conceptual (M=2.45, SD=1.78) and the image where the basketball player was tossing the ball as narrative (M=4.14, SD=1.65). The two images did not differ in terms of perceived quality ($t_{(98)}=-1.02$, NS) and involvement ($t_{(98)}=-.69$, NS).

An independent sample t-test of the means across visual patterns that participants exposed to the narrative image (M=5.26, SD=1.80) express a more favorable attitude toward the post than participants exposed to the conceptual image (M=4.54, SD=1.48) ($t_{(98)}=-2.19$, $p<.05$). Unexpectedly, an independent sample t-test of the means across visual patterns reveals a non-significant difference in terms of sharing ($t_{(98)}=.78$, *NS*). An independent sample t-test of the means across image content reveals that participants exposed to the narrative image (M=5.98, SD = 2.16) interpret the image in a piecemeal fashion more than participants exposed to the conceptual image (M=4.08, SD=1.70) ($t_{(98)}=-2.32$, $p<.05$). To determine if piecemeal interpretation drives the relationship between the image content (1=narrative, 0=conceptual) and the dependent variable of attitude toward the Tweet, we conduct a mediation analysis using Model 4 (10,000 bootstrap samples) in the SPSS PROCESS macro (Hayes and Preacher 2014). The bootstrapping technique for conditional indirect effects indicates mediation, because the 95% confidence interval (CI) for piecemeal interpretation does not include zero when we consider the difference between conceptual and narrative image (conditional indirect effect=.25, Boot SE=.15; 95% CI: .02, .58).

The findings of our study provide insight into the role of images and text in social media conversations by making three important contributions. First, this study demonstrates that narrative images are shared more by consumers than conceptual images. Second, we advance knowledge on consumer sharing of brand narratives by considering how similarity between text in the caption and within the narrative image affects consumer sharing. Third, our results show that the positive effect of narrative images on consumer responses is driven by piecemeal processing of the visual information in the Tweet.

REFERENCE LIST

Buffer (2019), "State of Social. How marketers across the globe think about social media, what's working, how the industry is changing, and more.", https://buffer.com/state-of-social-2019

Kress, Gunther and Theo van Leeuwen (2006), *Reading Images. The Grammar of Visual Design*.

Sharps, Matthew, J. and Michael, A. Nunes (2002). Gestalt and feature-intensive processing: Toward a unified model of human information processing. *Current Psychology*, *21*(1), pp.68-84.

Villarroel Ordenes, Francisco, Grewal, Dhruv, Ludwig, Stephan, De Ruyter, Ko, Mahr, Dominik, and Wetzels, Martin (2019), Cutting through Content Clutter: How Speech and Image Acts Drive Consumer Sharing of Social Media Brand Messages, *Journal of Consumer Research*, 45(5), 988–1012

Marketplace Violence and Community Resiliency: Individual and Collective Transformation Following the Paris November 2015 Terrorist Attacks

Amy Greiner Fehl, Oklahoma State University, USA
Marlys Mason, Oklahoma State University, USA
Mariann Györke, Resident 12e Arrondissement Paris, France
Sterling Bone, Utah State University, USA

EXTENDED ABSTRACT

"There is the before and the after. We all have to live in the after."
– Interview informant

As evidenced in the above quote, one of the defining elements of trauma, personal or collective, is its transformative nature. There is no going back, only moving forward. Indeed, even highly resilient individuals are not immune to tragedy, whether a personal crisis or a national tragedy such as the Paris marketplace attacks in November 2015 or other national acts of mass shootings and terrorism. Given the current political climate and recent history of violence, marketplace attacks are unfortunately a reality of modern life. Although the economic damage of terrorist attacks is documented (Frey et al 2007), it is not well understood how marketplace communities and collectivities cope and how collective resiliency is constructed from individual restoration activities.

Extant consumer research has examined several aspects of consumption when existential threats strike. Scholars have explored shared consumption experiences after natural disasters (Baker et al. 2007), the adaptation following personal health crises (Pavia and Mason 2004, Pounders and Mason 2018), and the challenges for marketplaces following the violence of war (Barrios et al. 2016, Schultz et al. 2005). Indeed, such literature suggests that consumers' marketplace consumption changes significantly, and in doing so reveals the potential for transformative consumer experiences.

Cultural trauma is argued to occur *"when members of a collectivity feel they have been subjected to a horrendous event that leaves indelible marks upon their group consciousness, marking their memories forever and changing their future identity…"* (Alexander 2013, p. 6). However, a gap in the literature is how the entire collective community rebounds through the desire of individuals to express their connection to the event and their link to one another via certain, meaningful consumption choices. Specifically, we extend Alexander's theory of social trauma by focusing on individual responses in the moment, prior to group processing and understanding of an event, and how individuals' attempts at sensemaking pull them towards collective consumption activities and ultimately collective restoration.

On November 13, 2015, militants from the Islamic State in Iraq and Syria attacked eight marketplace sites in Paris, including the soccer stadium, a concert hall, and four cafes located in an east Parisian neighborhood with an active nightlife and popular outside seating. Thus, places and people were targeted but also the rituals and symbols of the Parisian café and nightlife, where the community gathers together to share a physical space and a drink. We ground our study in this context and investigate using qualitative inquiry. To date, we have reviewed articles and documentaries, examined the archives of memorial data, interviewed a café owner of an attacked site, and conducted 28 semi-structured in-depth interviews with individuals consuming and living in the neighborhood. The interviews were conducted in French and English; all the respondents were in Paris during the evening of the attacks.

Analysis of the data suggests themes of closeness to the event, remembering, resistance, and resiliency through consumption. Most informants started their narrative of the Paris attacks by explaining how they were connected to the sites of the attacks, that is their perceived closeness. Remembering involved visiting the sites, leaving messages and items, and publicly honoring lives lost and altered. Extant research on memorials and social response to terrorist attacks questions why individuals feel the need to express their connection to the traumatic event rather than avoiding thoughts and scenes of the trauma (Truc 2018, p. 97). In contrast, coding of interviews for current research indicates how nearly all the members of the community were drawn to the sites of the attacks to both demonstrate solidarity and comfort themselves.

Findings from our research indicate that consumption plays a key and unique role in building resilience because it offers the tactile and physical expression of emotion that is key to processing trauma. Traumatic events such as the Paris 2015 terrorist attacks are, by their nature, transformative. Understanding consumption choices after a collective trauma such as the Paris 2015 terrorist attacks is key to understanding the process of resiliency and its origin, ultimately offering hope as well as lessons for businesses, local communities, public policy response, and movement towards a positive transformation.

In short, prelusive coding of the interviews indicates that the trauma to informants is influenced by that person's perceived closeness to the community impacted by the terrorist attack. The trauma can be on some level lessened and the individual can find some relief by a tactile and visual expression of connection (Grider 2001) to this community. With a resumption of previous consumption routines as well as public displays of solidarity through consumption choices, such as visiting and contributing to the memorial(s), informants experience some respite and relief from the numbness and isolation endured after the violence. The individual's sensemaking of the event and reactions to the event provides the scaffolding that supports the development of resiliency. In other words, while the marketplace was the location and the source of the trauma, it also provides the means for hope and recovery, both literally in terms of rebuilding and more deeply in terms of community connection.

REFERENCES

Alexander, Jeffrey C. (2013), *Trauma: A Social Theory,* John Wiley & Sons,

Baker, Stacey Menzel, David M. Hunt, and Terri L. Rittenburg (2007), "Consumer Vulnerability as a Shared Experience: Tornado Recovery Process in Wright, Wyoming," *Journal of Public Policy & Marketing*, 26 (Spring), 6–19.

Baker, Stacey Menzel, and Marlys Mason (2012), "Toward a Process Theory of Consumer Vulnerability and Resilience: Illuminating its Transformative Potential." In *Transformative Consumer Research for Personal and Collective Well-Being*, pp. 571-592. Routledge.

Barrios, A., de Valck, K., Shultz, C., Sibai, O., Husemann, K., Maxwell-Smith, M. & Luedicke, M. (2016), "Marketing as a Means to Transformative Social Conflict Resolution: Lessons from Transitioning War Economies and the Colombian Coffee Marketing System," *Journal of Public Policy & Marketing*, 35 (2), 185-197.

Frey, B. S., Luechinger, S., & Stutzer, A. (2007). Calculating tragedy: Assessing the Costs of Terrorism. *Journal of Economic Surveys*, 21(1), 1-24.

Grider, S. (2001), "Spontaneous Shrines: A Modern Response to Tragedy and Disaster," *New Directions in Folklore,* Issue 5: 1.

Paris Archives, http://archives.paris.fr/f/hommages/mosaique/?fnbres=20.

Pavia, Teresa M., and Marlys J. Mason (2004), "The Reflexive Relationship between Consumer Behavior and Adaptive Coping," *Journal of Consumer Research* 31(2), 441-454.

Pounders, Kathrynn and Marlys J. Mason (2018), "Embodiment, Illness, and Gender: The Intersected and Disrupted Identities of Young Women with Breast Cancer." *Consumer Culture Theory*. Emerald Publishing, 111-122.

Shultz, C., Burkink, T. Grbac, B. & Renko, N. (2005), "When Policies and Marketing Systems Explode: An Assessment of Food Marketing in the War-Ravaged Balkans and Implications for Recovery, Sustainable Peace, and Prosperity," *Journal of Public Policy & Marketing*, 24 (1), 24-37.

Truc, G. (2018), *Shell Shocked: The. Social Response to Terrorist Attacks,* Polity Press, Cambridge, UK.

The Bell Curve is Counterintuitive

Lin Fei, University of Chicago, USA
Luxi Shen, Chinese University of Hong Kong, China

EXTENDED ABSTRACT

Consumers encounter new information on a daily basis, but in the absence of outside information, what do they intuit about the distribution of an unfamiliar specification? For example, do consumers intuit that the miles per gallon (MPG) of most SUVs are similar, or evenly spread out? Generally speaking, what distribution do consumers mentally picture for a product specification about which they possess little knowledge?

Much cognitive psychology literature (Edwards 1968; Hogarth 1975; Winkler 1968) focuses on belief updating and shows that people insufficiently update their beliefs with new information. Many consumer psychologists also examine belief updating in different domains (Moorthy, Ratchford, and Talukdar 1997). We, however, are curious about how people form the initial mental representation—hereafter, the intuitive distribution—prior to seeing further information.

Intuitive distributions have great marketing implications since much work has shown that subjective distributions influences consumers learning and searching behavior (e.g., Brucks 1985; Dellaert and Haubl 2012; Johnson and Russo 1984; Jindal and Ariibarg 2018). In identifying the shape of the intuitive distribution, we provide insights on individuals' cognitive nuances in consumers' searching and learning process for new products. Our research also carries theoretical significance to Bayesian models of information updating, as the original mental distribution can determine subsequent prediction functions and model performance (Griffiths and Tenenbaum 2006).

Extant investigations on the intuitive distribution are relatively limited. While some scholars (Winkler 1967) postulate that people tend to generate a normal distribution for any specification they encounter, we propose that people intuit a uniform distribution when they possess little knowledge about the specification. With limited knowledge, or maximum normative uncertainty, people may not be aware of the factors that make some outcomes more likely, so they assign equal consideration to all possible outcomes (Hacking 2006). For example, most consumers do not know much about how MPG varies among SUVs, so when asked to describe the distribution, we predict that consumers will think that SUVs should vary widely in MPGs. Thus, they will generate a distribution that resembles a flat line more than a bell curve.

We further propose that specification familiarity moderates the shape of intuitive distributions. In particular, we hypothesize that when people have no familiarity about a specification, they will generate a uniform distribution, but when they have some general familiarity about that specification, they will generate a distribution that is less flat and more bell-shaped. In real life, people may generalize what they see or are told about the distributions of things in this world. However, people tend to overgeneralize cognitive shortcuts (Tversky and Kahneman 1974) and may fail to update beliefs for this reason. Therefore, we predict that as specification familiarity increases, people will generate a more bell-shaped distribution, even when the actual distribution is neither flat nor bell-shaped.

We tested our hypotheses in 7 studies with 1930 participants in total, and we present 4 studies in this paper. All experiments adopted the same methodology by eliciting a distribution directly: given a specific scenario, participants allocated N items into n bins to generate a distribution in their mind (empirically validated with high reliability, Goldstein and Rothschild 2014). Distribution data were analyzed on the individual level by examining the kurtosis (fourth moment, indicating the peakedness) of each distribution.

Study 1 tested the main hypothesis that people intuitively generate uniform distributions for a variety of unfamiliar specifications. Participants read six scenarios (out of a pool of 12); each scenario asked participants to allocate items into several bins (e.g., How many of the Beatles' 211 songs do you think would fall into each of the following seven time-length ranges?). With this allocation method, each participant generated a distribution for each scenario. We found that (a) across all scenarios, participants generated intuitive distributions that were significantly different from the normal distribution, and (b) in each scenario, more than 50% of participants generated a distribution that was flatter than the normal distribution. Thus, Study 1 provided robust evidence in support of our main hypothesis that the bell curve is counterintuitive; instead, intuitive distributions are spread out.

Studies 2 and 3 examined in more depth the moderators determining the shape of an intuitive distribution. Study 2 used the aforementioned Beatles question which elicited the most peaked distribution in study 1. In study 2, people who were more familiar with the specification (rock song lengths) generated distributions with higher kurtosis, while other potential moderators, such as confidence, did not have an effect. We further experimentally manipulated specification familiarity in study 3 by asking participants to generate distributions for two conditions (Unfamiliar: length of Haydn's symphonies; Familiar: length of Billboard Top 100 Hit Songs in the 1990s). We found that participants generated significantly more peaked distributions in the familiar condition than in the unfamiliar condition (median kurtosis = 3.08 (Familiar) vs 2.25 (Unfamiliar), Wilcoxon's test of kurtosis W=38670, p<0.001). These findings suggest that specification familiarity makes the intuitive distribution curvier by adding one peak to it.

Study 4 investigated whether the intuitive distribution resembles the actual distribution in a familiar context: credit scores. The actual distribution of credit scores is far from normal; depending on the population, the distribution may be monotonously sloping down (age < 30), U-shaped (ages 40–49), or monotonously sloping up (age > 70). Although we incentivized participants to generate distributions for one of the age groups as accurately as possible, their responses still strayed from reality. More importantly, and consistent with our predictions, participants both indicated that they had general knowledge about credit scores and generated distributions with peaks, suggesting an overgeneralization of the bell curve even when the actual distribution is neither flat nor bell-shaped.

In sum, this research finds that people with limited knowledge about a specification intuitively generate uniform distributions, and the distributions become more peaked as familiarity increases. This finding has important implications for the estimation of consumers' beliefs and the presentation of new information in marketing.

REFERENCES

Brucks, Merrie (1985), "The Effects of Product Class Knowledge on Information Search Behavior," *Journal of Consumer Research*, 12(1), 1-16.

Dellaert, Benedict GC, and Gerald Häubl (2012), "Searching in Choice Mode: Consumer Decision Processes in Product Search with Recommendations," *Journal of Marketing Research*, 49(2), 277-88.

Edwards, Ward (1968), "Conservatism in Human Information Processing," *Formal representation of human judgment*.

Goldstein, Daniel G., and David Rothschild (2014), "Lay Understanding of Probability Distributions," *Judgment & Decision Making,* 9(1), 1-14.

Griffiths, Thomas L., and Joshua B. Tenenbaum (2006), "Optimal Predictions in Everyday Cognition," *Psychological science,* 17(9), 767-73.

Hacking, Ian (2006) *The Emergence of Probability: A Philosophical Study of Early Ideas About Probability, Induction and Statistical Inference*, Cambridge University Press.

Hogarth, Robin M (1975), "Cognitive processes and the assessment of subjective probability distributions," *Journal of the American statistical Association*, 70(350), 271-89.

Jindal, Pranav, and Anocha Aribarg (2018), "The Importance of Price Beliefs in Consumer Search," *Available at SSRN 3225263*.

Johnson, Eric J., and J. Edward Russo (1984), "Product Familiarity and Learning New Information," *Journal of consumer research*, 11(1), 542-50.

Moorthy, Sridhar, Brian T. Ratchford, and Debabrata Talukdar (1997), "Consumer Information Search Revisited: Theory and Empirical Analysis," *Journal of Consumer Research*, 23(4), 263-77.

Tversky, Amos, and Daniel Kahneman (1974), "Judgment Under Uncertainty: Heuristics and Biases," *Science*, 185(4157), 1124-131.

Winkler, Robert L. (1967), "The Assessment of Prior Distributions in Bayesian Analysis," *Journal of the American Statistical Association,* 62(319), 776-800.

———. (1968), "The Consensus of Subjective Probability Distributions," *Management Science,* 15(2), 61-75.

Politics at the Mall: The Moral Foundations of Boycotts

Daniel Fernandes, Catholic University of Portugal, Portugal

EXTENDED ABSTRACT

This article examines the effect of political ideology on intentional buying and abstention from buying specific products for political reasons—buycotting and boycotting, respectively. Conservative and liberal ideologies describe a set of norms and ideals that shape individuals' thoughts, feelings, and actions (Jost et al. 2003) and represent a large part of consumers' identity (Ordabayeva and Fernandes 2018). Recent research shows that liberals are more likely than conservatives to boycott and to buycott (Endres and Panagopoulos 2017; Jost, Langer, and Singh 2017), which Jost, Langer, and Singh (2017) argue stems from liberals' tendency to question, challenge, and criticize existing institutions and authorities.

Building on moral foundations theory, this article examines when and why liberals and conservatives are more likely to boycott and buycott firms and products. Across seven studies, I find that these actions are influenced by unique moral concerns. Liberals engage in consumer political actions that are associated with moral values of harm and fairness (individualizing moral values), whereas conservatives engage in consumer political actions that are associated with moral values of authority, loyalty, and purity (binding moral values). Individuals of both political persuasions are more likely to boycott and buycott specific firms and products that oppose or support their moral concerns. The results also show that liberals' heightened tendency to boycott and buycott stems from their greater endorsement of harm and fairness moral values. The greater concern for the suffering of others and unfair treatment drives liberals to extend their moral regard to more permeable groups and individuals, and increases their support for consumer political activism that advances individual rights and well-being.

Study 1: Political Ideology and Nike Boycotts and Buycotts

Study 1 examines the intention to boycott and buycott Nike because of its campaign featuring Colin Kaepernick, who protested against police brutality toward African Americans by refusing to stand during the national anthem.

Method

Two-hundred seven American Mechanical Turk (MTurk) workers participated in the study (M_{age} = 36 years; 37% female). Participants answered a multi-item scale of political ideology (Kidwell, Farmer, and Hardesty 2013; M = 4.19, SD = 1.56; α = .75). Higher scores reflect more conservatism.

Participants answered how likely they were to boycott and to purposefully buy the products of the company (from 1 = "not at all" to 11 = "very much"; boycott: M = 6.19, SD = 3.63; buycott: M = 6.04, SD = 3.45).

Results

I regressed the intention of boycotting and buycotting Nike on political ideology (higher scores means more conservatism), which resulted in the expected significant positive effect on boycotting (B = .61, SE = .16, p < .001) and negative effect on buycotting (B = −.64, SE = .15, p < .001).

Study 2: Political Ideology and Willingness to Boycott and Buycott

Study 2 aims to test the effect of political ideology on boycotting and buycotting across multiple recent boycotts. In addition, it tests the mechanism for these effects. Liberals and conservatives are expected to engage in boycotts and buycotts that are associated with their moral values.

Method

Three-hundred eighty-five Prolific Academic workers participated in the study (M_{age} = 32 years; 52% female). They answered a single-item scale of political ideology (from 1 = "extremely left-wing" to 9 = "extremely right-wing"; M = 4.26, SD = 1.54). Participants then answered whether they would boycott, buycott, or neither boycott nor buycott to 14 conservative boycotts and 14 liberal boycotts in counterbalanced order.

Participants then answered the 22-item version of the moral foundations questionnaire (Graham, Haidt, and Nosek 2009). I averaged the evaluations related to the individualizing dimensions (α = .80; M = 4.34, SD = .63), as well as the binding dimensions (α = .83; M = 3.35, SD = .73).

Results

I regressed each measure on the single-item scale of political ideology and found, as expected, significant negative effects on both boycotting in liberal boycotts (B = −.71, SE = .12, p < .001) and buycotting in conservative boycotts (B = −.71, SE = .11, p < .001), and significant positive effects on both boycotting in conservative boycotts (B = .38, SE = .07, p < .001) and buycotting in liberal boycotts (B = .19, SE = .07, p < .01).

As expected, political ideology was negatively related to individualizing moral values (B = −.08, SE = .02, p < .001) and positively related to binding moral values (B = .16, SE = .02, p < .001). I then included the individualizing and the binding moral values in the model predicting the number of boycotts and buycotts, controlling for political ideology. The individualizing moral values predicted boycotting in the liberal boycotts (B = 2.26, SE = .28, p < .001) and buycotting in the conservative boycotts (B = 1.88, SE = .25, p < .001), but not boycotting in the conservative boycotts (p = .16) nor buycotting in the liberal boycotts (p = .12). In contrast, the binding moral values predicted boycotting in the conservative boycotts (B = .49, SE = .14, p < .001) and buycotting in the liberal boycotts (B = .44, SE = .15, p < .01), but not boycotting in the liberal boycotts (p = .68) nor buycotting in the conservative boycotts (p = .20). These results show that individualizing moral values predict support for liberal boycotts and opposition for conservative boycotts, whereas binding moral values predict support for conservative boycotts and opposition for liberal boycotts.

Study 3: Political Ideology and Attitude toward Boycotts

Study 3 aims to test the mechanism of the effect of political ideology. The greater alignment with individualizing moral values would mediate the effect of political ideology on attitude toward boycotts, which would further lead to the likelihood of boycotting and buycotting.

Method

Seven-hundred ninety-one American MTurk workers participated in the study (M_{age} = 36 years; 57% female). Participants answered the same multi-item scale of political ideology as in Study 1 (Kidwell, Farmer, and Hardesty 2013; M = 4.05, SD = 1.84; α = .81). Higher scores reflect more conservatism.

Participants then answered the same 22-item version of the moral foundations questionnaire (Graham, Haidt, and Nosek 2009) as in Study 2. I averaged the evaluations related to the individualizing dimensions (α = .83; M = 4.37, SD = .75) and the evaluations related to the binding dimensions (α = .90; M = 3.25, SD = .96).

Next, the attitude toward boycotting scale was administered (Sen et al. 2001; α = .93; M = 4.52, SD = 1.47) ("very negative/very positive," "not at all favorable/very favorable," "very bad idea/very good idea," and "not at all useful/very useful"). Participants also answered whether they have boycotted and buycotted in the past (0 = no, 1 = yes) to compose measures of likelihood of having boycotted (M = .31, SD = .46) and buycotted (M = .20, SD = .40) in the past.

Results

I logistically regressed the likelihood of having boycotted and buycotted on the multi-item scale of political ideology and found, as expected, significant negative effects on both boycotting (B = −.186, SE = .045, Wald χ^2 = 17.15, p < .001) and buycotting (B = −.123, SE = .051, Wald χ^2 = 5.79, p = .02). These effects were qualified by a quadratic term (boycotting: B = .119, SE = .019, Wald χ^2 = 38.50, p < .001; buycotting: B = .054, SE = .021, Wald χ^2 = 6.25, p = .01).

As expected, political ideology negatively predicted attitude toward boycotting (B = −.248, SE = .027, p < .001). This effect was also qualified by a quadratic term (B = .039, SE = .012, p = .001).

Next, I examined the serial mediation process of political ideology on boycotting and buycotting through individualizing moral values and attitudes toward boycotting. As in Study 2, political ideology was negatively related to the individualizing dimension (B = −.14, SE = .01, p < .001) and positively related to the binding dimension (B = .22, SE = .02, p < .001). I then included the individualizing and the binding moral dimensions separately in the model predicting attitude toward boycotting, controlling for the effect of political ideology. The results show a significant effect of the individualizing dimension (B = .41, SE = .07, p < .001) but not of the binding dimension (p = .86). I then included the attitude toward boycotting scale in the models predicting boycotting and buycotting, controlling for the effects of political ideology and of individualizing moral values. The results show significant effects of attitude toward boycotting on both boycotting (B = .746, SE = .076, Wald χ^2 = 96.24, p < .001) and buycotting (B = .506, SE = .078, Wald χ^2 = 41.84, p < .001).

The results show indirect effects of political ideology on boycotting (a = −.044, SE = .010, 95% CI = [−.065, −.027]) and buycotting (a = −.030, SE = .007, 95% CI = [−.046, −.017]) likelihood.

Study 4: Political Ideology and Boycotting Around the World

The main goal of Study 4 is to test the link between political ideology and boycotting around the world in the World Values Survey (WVS) (N = 224,874).

The WVS assesses political ideology using a single item from 1 = "left-wing" to 10 = "right-wing" (M = 5.70, SD = 2.38).

Respondents answered whether they have joined or considered joining boycotts (recoded as: 1 = "would never do," 2 = "might do," and 3 = "have done"; M = 1.49; SD = .66).

Results

I constructed a multilevel model, adjusting the intercept of propensity of boycotting in each nation. The results show an effect of right-wing orientation (B = −.018, SE = .0006, p < .001) and of its quadratic term (B = .003, SE = .0002, p < .001).

Study 5: The Effect of Manipulated Political Ideology

Study 5 tests the causal effect of political ideology on attitude toward boycotting.

Method

Three hundred ninety-seven participants recruited from Prolific Academic (M_{age} = 30 years; 45% female) completed the study. Only complete questionnaires were considered. To manipulate political ideology, I used the procedure developed by Ordabayeva and Fernandes (2018): Participants performed a recall task in which they described a conversation they had with someone who was either more conservative or liberal than they are. The rationale is that by comparing oneself to someone who is more liberal (vs. conservative), participants would perceive themselves as being more conservative (vs. liberal), building on the assumption that the social contrast influences individuals' perceptions of their political identity (Feinberg et al. 2017). After the recall task, participants indicated their ideology as a manipulation check.

Participants then answered whether they have already boycotted in the past (yes/no; 40% answered yes) and their attitude toward boycotting, as in Study 1 (Sen et al. 2001; α = .94; M = 4.20, SD = 1.47). Finally, participants answered the multi-item scale of political ideology as in Study 1 (Kidwell, Farmer, and Hardesty 2013; α = .70; M = 3.53, SD = 1.40). Seven participants scored more than 3 SDs on the multi-item scale of political ideology and were therefore not considered.

Results

The manipulation check confirmed that the conservative recall task led to more conservative ideology (M = 4.08) than the liberal task (M = 3.72, $F(1, 388)$ = 3.94, p = .048). I also observed a significant effect of the manipulation on the multi-item scale of political ideology (liberal: M = 3.35, conservative: M = 3.71; $F(1, 388)$ = 6.61, p = .01).

An analysis of variance on attitude toward boycotting with the ideology manipulation as a fixed factor revealed a marginally significant effect: opinions about boycotting were significantly more positive in the liberal (M = 4.34) than in the conservative condition (M = 4.06, $F(1, 388)$ = 3.60, p = .058). This effect was not qualified by whether participants had already boycotted in the past (p = .63).

Study 6: The Effect of Political Ideology on Political Activism

Study 6 tests the effect of political ideology on political activism (i.e., participation in political protests).

Method

I obtained the data set from the Measuring Morality Project of Duke University (https://kenan.ethics.duke.edu/attitudes/resources/measuring-morality/). Respondents indicated their political ideology on a seven-point scale (1 = "extremely liberal," and 7 = "extremely conservative"; M = 4.21, SD = 1.46). They also indicated whether they have attended a political protest or rally in the past 12 months (1 = yes, 0 = no; M = .04, SD = .20). 1,474 respondents answered both the political ideology and the political activism measures.

Results

I logistically regressed political activism on political ideology and found a marginally significant effect (B = −.16, SE = .09, Wald χ^2 = 3.11, p = .078), qualified by a quadratic term (B = .16, SE = .04, Wald χ^2 = 12.88, p < .001). The positive sign of this effect shows that the negative effect of political ideology is stronger among those who score at the low end of the scale (i.e., liberals).

Study 7: Political Ideology and Google Searches

Study 7 tests whether the effect of political ideology extends to online searches of conservative and liberal U.S. counties. I extracted the search index from Google Trends (from 0 to 100) and obtained political ideology using Tausanovitch and Warshaw's (2014) city-level score of conservatism. I then matched search index and political ideology for 107 cities. One search index for boycott and two search indexes for buycott were 3 SDs from the mean and were therefore not considered. The search index for boycott (M = 62.75, SD = 8.43) was more pronounced than for buycott (M = 7.30, SD = 13.59; F(1, 103) = 1,419.04, p < .001).

Conservatism in a given city is negatively related to the search level for the term "boycott" in that area (B = −6.71, SE = 2.94, p = .025) and for the term "buycott" in that area (B = −25.21, SE = 4.20, p < .01), which suggests that the prevalence of liberals in a given city predicts interest in boycott and buycott in that city.

General Discussion

This research finds that political ideology affects consumers' attitudes, interest, and actions toward boycotting and buycotting, identifying when and why liberals and conservatives engage in these behaviors. Seven studies show that liberals and conservatives engage in boycotts and buycotts that are associated with their unique moral values. In addition, individualizing moral values predict a more positive attitude toward boycotts, and this explains the greater tendency of liberals to boycott and buycott.

REFERENCES

Endres, Kyle, and Costas Panagopoulos (2017), "Boycotts, Buycotts, and Political Consumerism in America", *Research and Politics,* 4 (4), 1-9.

Feinberg, Matthew, Alexa M. Tullett, Zachary Mensch, William Hart, and Sara Gottlieb (2017), "The Political Reference Point: How Geography Shapes Political Identity," *PLoS ONE*, 12 (2), e0171497.

Graham, Jesse, Jonathan Haidt, and Brian A. Nosek (2009), "Liberals and Conservatives Rely on Different Sets of Moral Foundations," *Journal of Personality and Social Psychology*, 96, 1029-1046.

Jost, John T., Jack Glaser, Arie W. Kruglanski, and Frank J. Sulloway (2003), "Political Conservatism as a Motivated Social Cognition," *Psychological Bulletin,* 129 (3), 339-75.

Jost, John T., Melanie Langer, Vishal Singh, (2017) "The Politics of Buying, Boycotting, Complaining, and Disputing: An Extension of the Research Program by Jung, Garbarino, Briley, and Wynhausen," *Journal of Consumer Research*, 44 (3), 503–510.

Kidwell, Blair, Adam Farmer, and David M. Hardesty (2013), "Getting Liberals and Conservatives to Go Green: Political Ideology and Congruent Appeals," *Journal of Consumer Research, 40 (August), 350-67.*

Ordabayeva, Nailya, and Daniel Fernandes (2018), "Better or different? How political ideology shapes preferences for differentiation in the social hierarchy," *Journal of Consumer Research*, 45(2), 227–250.

Sen, Sankar, Zeynep Gurhan-Canli and Vicki Morwitz (2001), "Withholding Consumption: A Social Dilemma Perspective on Consumer Boycotts," *Journal of Consumer Research*, 28 (December), 399-417.

Tausanovitch, Chris, and Christopher Warshaw, 2014. "Representation in Municipal Government." *American Political Science Review*, 108(3).

Disruptive Consumption: How Consumers Challenge Mainstream Markets Through Makeshifting

Marcia Christina Ferreira, Brunel University London, UK
Daiane Scaraboto, University of Melbourne, Australia
Adriana Schneider Dallolio, Fundação Getúlio Vargas – FGV-EAESP, Brazil
Bernardo Figueiredo, RMIT University, Australia
Eliane Zamith Brito, Fundação Getúlio Vargas – FGV-EAESP, Brazil

EXTENDED ABSTRACT

This study aims to unpack makeshifting, an understudied, yet widespread, consumption practice whereby consumers use materials, parts and objects at hand to adjust, improve, or invent solutions to their needs and desires for goods or services that are sometimes not available or existing in their markets. Around the world, culture-specific terms analogous to makeshifting are found: bodge (UK), tapullo (Italy), urawaza (Japan), jua kali (Kenya), jugaad (India), and gambiarra (Brazil). Although prior research has investigated do-it-yourself (DIY) and craft behaviors (Wolf and McQuitty, 2013; Moisio, Arnould and Gentry, 2013), it has overlooked the specific ways in which consumers apply their creativity to bypass market-mediated offers to design and produce their own solutions.

Often associated with improvised solutions that address people's immediate needs (Boufleur, 2006), makeshifting is a sustainable practice because it reduces waste disposal. Sustainable consumption initiatives are grounded on three key actions: reduce, reuse and recycle (3Rs). Considerable research has been devoted to understanding reducing (e.g. boycott, frugality) and recycling as environmentally friendly consumer behaviours (McDonagh and Prothero, 2014), but less attention has been paid to reuse practices (Lee, Roux, Cherrier and Cova, 2011). Makeshifting fits in the reuse category, because consumers creatively reprocess their waste and idle objects to produce alternative products. More importantly, many makeshifts have universal utility, are easily replicable and can fully replace commercial products. Hence this practice can improve quality of life while minimizing the use of natural resources.

A limited view of makeshifting as "quick fix" solutions neglects the creativity and resourcefulness employed by individuals in reusing materials, parts and objects at hand to challenge mainstream marketing by adjusting, improving, and inventing solutions that fit consumers' unique material, social, and cultural motivations. As makeshifting blurs the boundary between production and consumption, it empowers consumers to challenge mainstream markets, rejecting their commercial offerings, while addressing consumption needs. To further examine this phenomenon, we ask: *What is the nature of the makeshifting practice? How does it help consumers disrupt conventional consumption practices? What are its consequences for the market and for sustainable consumption?*

To address these questions, we conducted a netnography (Kozinets, 2015) of the Brazilian makeshifting practice, popularly known as gambiarra. We immersed ourselves in multiple online platforms where Gambiarra was shared and discussed by consumers, collecting and qualitatively analyzing visual and textual data.

Prior research has noted that understanding the dynamics of social practices (i.e. how they emerge, are sustained, and become naturalized) might shed light on contemporary social problems such as environmental issues, or persistent patterns of inequality (Shove, Pantzar and Watson, 2012). As such, practice theories provide an adequate theoretical lens through which to analyse makeshifting, and a useful framework to reflect on this phenomenon, its relation to sustainable consumption, and its implications for public policies (Welch and Warde, 2015).

Findings

Consumers may re-signify market resources, second-hand resources, or even waste in creating makeshift solutions. Material inputs can be repurposed in combination (e.g. used coffee pods [repurposed] and new electrical supplies [repurposed] are combined to produce Christmas tree lighting), or in isolation (e.g., a hair dryer [repurposed] is used to efficiently glue eyelash extensions). Gambiarra, then, endows objects, components and procedures with new meanings.

Gambiarra is driven by several non-mutually exclusive factors, such as resource limitations, lack of access to markets, sustainability values, an anti-consumption ideology, a desire for social recognition, personalization (crafting), and artistic expression (junk art). Gambiarra, then, is a practice that is sustained by a complex nexus of teleoaffective structures. Furthermore, individuals with multiple levels of competence and planning can engage in gambiarra and have successful results. Gambiarra might emerge as a completely improvised practice at a moment of need; or as an extremely planned solution. Parallel to this improvised-planned continuum, gambiarra may be performed by both practitioners who have high technical competence, or those who have none. Finally, consumers may determine whether a given practice or solution is gambiarra or not, according to their own values. Often, the same practice or solution is considered differently by different consumers. For example, using a power cable to connect several light bulbs may be explained as gambiarra by an electrician, or introduced as an artistic and affordable DIY decoration solution by an amateur party planner. This signals the ambiguous and conflicting meanings of gambiarra, as either negative transgression, or positive ingenuity. Often, this distinction indicates an aesthetic polarization between the ugly, unskillful transgression and the beautiful artistic solution.

All in all, our findings indicate that gambiarra is a practice without routine. That means, gambiarra is neither an integrative nor a dispersive but instead a disruptive practice that finds in object transformation its crucial drive. If rules represent one of the links of the practice nexus (Schatzki, 1996), in makeshifting it is precisely the absence of rules that characterizes the practice. In addition to the absence of rules, gambiarra can be considered a disruptive practice because disruption may occur in the process, but also in the object's materiality and functionality.

REFERENCES

Boufleur, R N. (2006). *A questão da gambiarra* [What is about gambiarra]. FAU-USP.

Kozinets, R. V. (2015). *Netnography: Redefined*. London: Sage.

Lee, M., Cherrier, H., Roux, D. and Cova, B. (2011). Anti-consumption and consumer resistance: Concepts, concerns, conflicts, and convergence. *European Journal of Marketing*, 45,11/12, 1680-1687.

McDonagh, P. and Prothero, A. (2014). Sustainability marketing research: Past, present and future. *Journal of Marketing Management*, 30(11-12), pp.1186-1219

Moisio, R., Arnould, E. J., and Gentry, J. W. (2013). Productive consumption in the class-mediated construction of domestic masculinity: Do-it-yourself (DIY) home improvement in men's identity work. *Journal of Consumer Research*, 40(2), 298-316.

Schatzki, T. R. (1996). *Social practices: A Wittgensteinian approach to human activity and the social*. Cambridge: Cambridge University Press.

Shove, E., Pantzar, M., and Watson, M. (2012). *The dynamics of social practice: Everyday life and how it chang*es. London, UK: Sage.

Welch, D. and Warde, A. (2015) "Theories of Practice and Sustainable Consumption", in Reisch, L. and Thøgersen, J. (eds.) *Handbook of Research on Sustainable Consumption*, Cheltenham: Edward Elgar Publishing, pp.84-100

Wolf, M., and McQuitty, S. (2013). Circumventing traditional markets: An empirical study of the marketplace motivations and outcomes of consumers' do-it-yourself behaviors. *Journal of Marketing Theory and Practice*, 21(2), 195-210.

Just As Real As It Seems: Managing The Undesirable Consequences of Unethical Consumption Behaviour

Marcia Christina Ferreira, Brunel University London, UK
Pauline Maclaran, Royal Holloway, University of London, UK

EXTENDED ABSTRACT

Although considerable research has been devoted to ethical consumption (Belk, Devinney, and Eckhardt 2006; Bray, Johns, and Kilburn 2011; Hiller 2019; McDonagh and Prothero 2014), rather less attention has been paid to what happens when consumers misbehave. Counterfeit goods are seen by many as a questionable consumption choice so people engaging in this practice must deal with the consequences of their behaviour, like physical hazards, financial losses, and social embarrassment to name a few. Hence this is a risky consumption practice whose products' materiality can promptly denounce the consumer's misbehaviour. Therefore further investigation is needed in order to understand how materiality and risk converge shaping consumers' experiences around counterfeit goods. To address this gap this article draws on literature from the fields of risk and materiality to conduct an interpretive study that investigates how consumers avert the materialization of their risky behaviour to enjoy the consumption of counterfeits whilst protecting their integrity. In doing so, it contributes to a growing number of consumer studies (Crockett 2017; Luedicke 2015; Saatcioglu and Ozanne 2013; Veresiu and Giesler 2018) examining macro-social contexts beyond celebratory self-actualization narratives (Askegaard and Linnet 2011).

Literature. Early on, consumer behaviour studies framed the consumption of counterfeits as 'risky' behaviour (Bloch, Bush, and Campbell 1993). However risk judgements cannot be isolated from the context in which they arise (Lupton 1999b), especially in plentiful markets of counterfeits (Gentry et al. 2001) where the consumption of these products is somehow seen as socially acceptable across social classes (Kravets and Sandikci 2014; Kuever 2014; Pinheiro-Machado 2010). Thus, rather than simply measuring consumers' ethical attitude towards counterfeit goods (Latif, Yiğit, and Kirezli 2018; Staake, Thiesse, and Fleisch 2009) it is important to consider that risk works as a cultural strategy that is employed by social groups—like consumers of counterfeits—to make sense of the uncertainties in society (Douglas 1982; 1992); such as actual hazards, the transgression of social norms (Tansey and O'Riordan 1999), issues of trust (Lupton 1999a) and judgements made with regard to objects and behaviours that are deemed improper, impure or just 'wrong' (Douglas 1966).

Knowledge of materiality is also of great importance, especially when considering that clothing consumption is the largest and most visible of the counterfeiting businesses (Hardy 2014). However, apart from a few studies that discussed the consumption of counterfeits as vehicles for self-expression (Ahuvia et al. 2012; Hoe, Hogg, and Hart 2003; Perez, Castaño, and Quintanilla 2010; Strehlau 2005) previous studies have not fully addressed the importance of fashion in the consumption of counterfeits, thereby neglecting consumers who may see counterfeits as fashion products that are used in combination with many others. It is worth exploring then, the importance of material aspects of fashion products to consumers, including counterfeits, in creating their outfits (Barthes 1967). This will help to understand how consumers blend counterfeits and genuine goods (Kravets and Sandikci 2014), and without risking their social identity.

Theoretical approaches to materiality investigate the ways in which objects are situated in people's lives (Tilley 2006) thus they are frequently understood through the lens of material embeddedness (Schatzki 2010; Woodward 2007) and can be studied as the process of objectification (Miller 1987; 2005). Latest advances in the field updated the concept of material embodiment from the materialisation of cultural ideas (Tilley 2006) towards the notion of productive material interaction (Borgerson 2013; Dant 2008; Ingold 2007; Woodward 2011); an unfolding chain of interactions not only between the subject and the finished object but also between the subject and the object's material components (as seen in Ferreira and Scaraboto 2016). Therefore productive material interaction is a useful concept to explore the meanings that arise when consumers interact with products that are similar in their fashion design but materially distinct.

Methodology

This interpretive research adopts *grounded theory* as a research strategy (Glaser and Strauss 1967), leveraging the fact that this approach allows for a 'detailed investigation of patterns of behaviour that is both relevant and problematic to those being studied' (Goulding 2002, 85). Principles of theoretical sampling were applied to the selection of the informants in this study; in total 42 consumers of counterfeits were interviewed.

Findings

The study offers three contributions to the literature. Firstly, it resorts to the literature on materiality to demonstrate that it is only through productive material interactions that counterfeits become meaningful to consumers. This happens because consumers need to rework their counterfeits not only symbolically but also physically, whilst in the consumption of genuine products meanings are reworked only symbolically. They re-contextualise the use of their counterfeits taking fashion as a blueprint to communicate the desired meaning. But the novelty presented here is that other objects and materials are strategically incorporated into their fashion ensemble and so consumers materialise their entire outfit. This leads to an sophisticated process of materialisation in which counterfeits become very interesting, and even alluring to many consumers.

Secondly the analysis within the risk theme has shown that although consumers do not feel ashamed of their choice, they do take the implications of their actions seriously. To avoid having their social identity challenged by others they need to manage the risk beyond common situations. Therefore they not only look for (dis)similarities, but also seek the purest counterfeits they can find, as evidenced during fieldwork the practice of thoroughly examining these products internally such as the scrutiny of handbags linings, trainers insole and clothes interior seams. Further, risk management is an endless practice with consumers caring for their products over their lifespan. They seek to prevent *symbolic pollution* (Douglas 1966) and thus worn, dingy and torn counterfeits have no place in their lives.

Lastly, as it can be fairly easy to find not only counterfeits but also 'inspired' imitations in emerging markets, consumers must deal with an abundance of similar products sold alongside non-branded and mundane products in popular marketplaces. Thus they employ four consumption strategies where materiality and risk intersect allowing consumers to avert the materialization of their risky behaviour hence managing the undesirable consequences of their unethical behaviour. Nevertheless counterfeits will never be risk free. Some

consumers may have fun and even joke about them but this does not change the fact that for a meaningful consumption experience they must implement at least one of these four strategies to protect their social identity whilst enjoying their consumption experiences around counterfeit goods.

REFERENCES

Ahuvia, Aaron C, Giacomo Gistri, Simona Romani, and Stefano Pace (2012), "What Is the Harm in Fake Luxury Brands? Moving Beyond the Conventional Wisdom," in *Luxury Marketing*, eds. Klaus-Peter Wiedmann and Nadine Hennigs, Wiesbaden: Gabler Verlag, 279–93.

Askegaard, Søren and J T Linnet (2011), "Towards an Epistemology of Consumer Culture Theory: Phenomenology and the Context of Context," *Marketing Theory*, 11(4), 381–404.

Barthes, Roland (1967), *Système De La Mode (the Fashion System)*, Editions du Seuil, ∞ Translated by Matthew Ward and Richard Howard. Reprint, Berkeley: University of California Press, 1990.

Belk, Russell, Timothy Devinney, and Giana M Eckhardt (2006), "Consumer Ethics Across Cultures," *Consumption Markets & Culture*, 8(3), 182–91.

Bloch, Peter H, Ronald F Bush, and Leland Campbell (1993), "Consumer 'Accomplices' in Product Counterfeiting: a Demand Side Investigation," 10(4), 27–36, §.

Borgerson, Janet L (2013), "The Flickering Consumer: New Materialities and Consumer Research," *Research in Consumer Behavior*, 15, 125–44.

Bray, Jeffery, Nick Johns, and David Kilburn (2011), "An Exploratory Study Into the Factors Impeding Ethical Consumption," *Journal of Business Ethics*, 98(4), 597–608, ¶.

Crockett, David (2017), "Paths to Respectability: Consumption and Stigma Management in the Contemporary Black Middle Class," *Journal of Consumer Research*, 44(3), 554–81.

Dant, Tim (2008), "The 'Pragmatics' of Material Interaction," *Journal of Consumer Culture*, 8(1), 11–33.

Douglas, Mary (1982), *Essays in the Sociology of Perception*, Psychology Press, §.

Douglas, Mary (1966), *Purity and Danger*, Routledge, §.

Douglas, Mary (1992), *Risk and Blame: Essays in Cultural Theory*, 1–336, Routledge, §.

Ferreira, Marcia Christina and Daiane Scaraboto (2016), "'My Plastic Dreams': Towards an Extended Understanding of Materiality and the Shaping of Consumer Identities," *Journal of Business Research*, 69(1), 191–207.

Gentry, James W, Commuri, Suraj, Shultz, Clifford, II, and Sanjay Putrevu (2001), "How Now Ralph Lauren? the Separation of Brand and Product in a Counterfeit Culture.," *Advances in Consumer Research*, 28(1), 258–65.

Glaser, Barney G and Anselm L Strauss (1967), *The Discovery of Grounded Theory*, Sage Publications.

Goulding, Christina (2002), *Grounded Theory: a Practical Guide for Management, Business and Market Researchers*, London: Sage Publications.

Hardy, Jeffrey (2014), "Confiscating the Proceeds of IP Crime: a Modern Tool for Deterring Counterfeiting and Piracy," in *Anti-Counterfeiting: a Global Guide 2014*, World Trademark Review, 6–19.

Hiller, Alex (2019), "Everything Flows: a Pragmatist Perspective of Trade-Offs and Value in Ethical Consumption," *Journal of Business Ethics*, 157(4), 893–912.

Hoe, Lee, Gillian Hogg, and Susan Hart (2003), "Fakin'it: Counterfeiting and Consumer Contradictions," eds. Darach Turley and Stephen Brown, *Advances in Consumer Research*, 6, 60–67.

Ingold, Tim (2007), "Materials Against Materiality," *Archaeological Dialogues*, 14(01), 1–16.

Kravets, Olga and Özlem Sandikci (2014), "Competently Ordinary: New Middle Class Consumers in the Emerging Markets," *Journal of Marketing*, 78(July 2014), 125–40.

Kuever, Erika (2014), "Mapping the Real and the False: Globalization and the Brand in Contemporary China," *Consumer Culture Theory*, 16(2), 173–89, §.

Latif, Özge Baruönü, Melis Kaytaz Yiğit, and Özge Kirezli (2018), "A Review of Counterfeiting Research on Demand Side: Analyzing Prior Progress and Identifying Future Directions," *The Journal of World Intellectual Property*, 21(5-6), 458–80.

Luedicke, Marius K (2015), "Indigenes' Responses to Immigrants' Consumer Acculturation: a Relational Configuration Analysis," *Journal of Consumer Research*, 42(1), 109–29.

Lupton, Deborah (1999a), *Risk (Key Ideas)*, London: Taylor & Francis.

Lupton, Deborah (1999b), *Risk and Sociocultural Theory*, 1–10, Cambridge University Press.

McDonagh, Pierre and Andrea Prothero (2014), "Sustainability Marketing Research: Past, Present and Future," *Journal of Marketing Management*, 30(11-12), 1186–1219.

Miller, Daniel (1987), *Material Culture and Mass Consumption*, Oxford: Basil Blackwell, .

Miller, Daniel (2005), *Materiality*, Duke University Press Books, .

Perez, María Eugenia, Raquel Castaño, and Claudia Quintanilla (2010), "Constructing Identity Through the Consumption of Counterfeit Luxury Goods," 13(3), 219–35.

Pinheiro-Machado, Rosana (2010), "The Attribution of Authenticity to 'Real'and 'Fake'Branded Commodities in Brazil and China," in *Cultures of Commodity Branding*, 109–29.

Saatcioglu, Bige and Julie L Ozanne (2013), "Moral Habitus and Status Negotiation in a Marginalized Working-Class Neighborhood," *Journal of Consumer Research*, 40(4), 692–710.

Schatzki, Theodore (2010), "Materiality and Social Life," *Nature and Culture*, 5(2), 123–49.

Staake, Thorsten, Frédéric Thiesse, and Elgar Fleisch (2009), "The Emergence of Counterfeit Trade: a Literature Review.," *European Journal of Marketing*, 43(3/4), 320–49.

Strehlau, Suzane (2005), "A Teoria Do Gosto De Bourdieu Aplicada Ao Consumo De Marcas De Luxo Falsificadas," *Proceedings of XXIX ANPAD Meeting*, 29, 1–16.

Tansey, James and Tim O'Riordan (1999), "Cultural Theory and Risk: a Review," *Helath, Risk & Society*, 1(1), 1–21.

Tilley, Chris (2006), "Objectification," in *Handbook of Material Culture*, SAGE, 60–73.

Veresiu, Ela and Markus Giesler (2018), "Beyond Acculturation: Multiculturalism and the Institutional Shaping of an Ethnic Consumer Subject," eds. Darren Dahl and Güliz Ger, *Journal of Consumer Research*, 31(4), 868–19.

Woodward, Ian (2011), "Towards an Object-Relations Theory of Consumerism: the Aesthetics of Desire and the Unfolding Materiality of Social Life," *Journal of Consumer Culture*, 11(3), 366–84.

Woodward, Ian (2007), *Understanding Material Culture*, 1–201, Sage Publications.

The Neglect of Positive Aspects in Novel Food Products

Arnd Florack, University of Vienna, Austria
Teresa Koch, University of Vienna, Austria
Simona Haasova, University of Lausanne, Switzerland
Hans Alves, University of Cologne, Germany

EXTENDED ABSTRACT

Today's marketing trend is to design products that are very similar to the already existing ones, but made healthier with a special ingredients composition (e.g., Beyond Meat burgers). The current research investigates how consumers compare innovative food alternatives with existing ones and form their purchase intentions and tastiness expectations.

A basic principle that can be used to form hypotheses about the formation of expectations towards novel alternatives is the cue overlap principle of differentiation, which has recently been studied in social psychology to explain the formation of attitudes towards individuals and groups (Alves et al., 2018). The cue overlap principle states that when comparing two items that were introduced at different points in time, individuals focus on the distinct attributes of the newer item, which tend to be negative, just because negative attributes are more diverse than positive attributes, which are often similar and shared between objects (Alves et al., 2017). We suggest that also novel products will be evaluated relative to familiar ones and that the predicted differences hold for products as well (Houston et al., 1989; Hodges, 2005). In essence, the cue overlap principle of differentiation predicts that novel products are evaluated based on distinct attributes that differentiate them from existing ones, and that such distinct attributes are usually negative, while there is a neglect of shared, often positive, attributes by novel and existing products.

In Study 1 (N = 146), participants indicated two positive and two negative attributes of a classic burger and a novel healthier alternative (presented as the Volumetrics concept, Rolls & Hermann, 2012), subsequently rating whether each attribute would apply to both or just one of the burgers. In line with our hypothesis, consumers regarded more of the positive attributes than of the negative attributes to be applicable to both products, $(F(1, 145) = 17.892, p < .000, = .110$; for all results see Table 1), supporting the basic assumption that in consumers' perception, standard products and healthier alternatives often share positive, but have distinct negative characteristics.

Study 2 (N = 250) aimed to illustrate that the pattern observed in Study 1 causes a challenge for the introduction of healthy products. Here and in all following studies, participants received descriptions for two burgers, first a classic burger and subsequently a novel, healthier burger. These contained three positive (e.g., juicy, fresh, crispy) and three negative attributes (e.g., hard, soggy, boring), randomly selected from sets of six. For example: "Dish: *Classic Burger* – Customers often describe this burger as: *juicy*." We experimentally varied whether positive or negative attributes were overlapping (applied to both burgers) or were distinct (different for each burger). After each burger description, participants rated their purchase intentions with two 1-7 scale items, and their taste expectations using two 1-10 scale items. The results were in line with our hypotheses that overlapping attributes are cancelled out while the distinct attributes of the novel alternative impact evaluations. Consumers expected a novel healthier food to be less tasty $(F(1, 248) = 15.34, p < .001, = .06)$ and indicated lower purchase intentions for this option $(F(1, 248) = 10.49, p = .001, = .04)$ when the positive attributes between the two burgers were shared vs. when the negative attributes were shared.

Study 3 (N = 338) tested whether the cue overlap effect can be mitigated when synonyms are used to describe the attributes, which may constitute a vital strategy to advertise novel food. We used the same procedure as Study 2, however, in one of the conditions, the attribute overlap was realized with synonyms, based on a pretest (e.g., gentle – mild). Study 3 provides little evidence that using synonyms helps to prevent an undesired cancellation of positive attributes of a novel food product (taste expectations: $F(1, 334) = .46, p = .499, = .00$; purchase intentions: $F(1, 334) = .05, p = .825, = .00)$.

In Study 4 ($N = 282$), we studied whether the experimentally varied overlap of positive or negative attributes is reflected in the cognitive responses of the consumers (focus on non-overlapping attributes). We applied the design of Study 2 and added a thought-listing task (Cacioppo, Von Hippel, & Ernst, 1997), where participants listed their thoughts and indicated for each whether it represented an advantage/disadvantage for the novel/classic burger. In line with our expectations, consumers listed more positive thoughts about the novel product when negative aspects were shared vs. when positive aspects were shared $(F(1, 280) = 8.06, p = .005, = .03)$.

In Study 5 ($N = 289$), we explored whether the cue overlap effect can be mitigated when all information are presented simultaneously as indicated by previous literature (Bruine de Bruin & Keren, 2003). We applied the design of Study 2, however, now both burgers (varied position: left and right) and all the attributes were presented simultaneously. We measured taste expectations and purchase intentions with 1-11 scale items reflecting a preference for one or the other burger. We did not find the cue overlap effect on taste expectations $(F(1, 146) = 2.15, p = .144, = .01)$ and purchase intentions $(F(1, 146) = .38, p = .54, = .00)$ when the novel burger was presented on the left and the classic on the right. When presented reversedly, however, the pattern was similar (although not significant) to previous studies. Hence, presenting the novel product and the standard product simultaneously, the novel product being on the left, might help marketers to reduce the undesired cue overalp effect.

In line with the cue overlap principle of differentiation, we show that consumers do not rely on positive aspects that apply to both an existing and a novel food product when they form their evaluations of the novel product. Instead, they evaluate a novel food product primarily based on those attributes that differentiate it from existing ones. This phenomenon represents an undesired barrier for the introduction of novel foods because they are likely to share positive attributes with existing products, and are highly likely to be differentiated with negative attributes (Study 1). Marketing managers should rather stress the positive distinctiveness of the novel food alternatives and not focus on the positive similarities, likely to be neglected.

REFERENCES

Alves, H., Koch, A., & Unkelbach, C. (2017). The "common good" phenomenon: Why similarities are positive and differences are negative. *Journal of Experimental Psychology: General*, *146*, 512-528.

Alves, H., Koch, A., & Unkelbach, C. (2018). A Cognitive-Ecological Explanation of Intergroup Biases. *Psychological Science*, *29*, 1126–1133.

Bruine de Bruin, W, & Keren, G. (2003). Order effects in sequentially judged options due to the direction of comparison. *Organizational Behavior and Human Decision Processes, 92*, 91-101.

Cacioppo, J. T., Von Hippel, W., & Ernst, J. M. (1997). Mapping cognitive structures and processes through verbal content: The thought-listing technique. *Journal of Consulting and Clinical Psychology*, *65*, 928-940.

Hodges, S. D. (2005). A feature-based model of self-other comparisons. In M. D. Alicke, D. A. Dunning, & J. I. Krueger (Eds.), *The self in social judgment* (pp. 131–153). New York, NY: Psychology Press.

Houston, D. A., Sherman, S. J., & Baker, S. M. (1989). The influence of unique features and direction of comparison of preferences. *Journal of Experimental Social Psychology*, *25*, 121-141.

Rolls, B., & Hermann, M. (2012). *The ultimate volumetrics diet: Smart, simple, science-based strategies for losing weight and keeping it off*. Harper Collins: New York.

Rage Against the Machine: When Consumers Sabotage Robots in the Marketplace

Darima Fotheringham, W. P. Carey School of Business, Arizona State University, USA
Monika Lisjak, W. P. Carey School of Business, Arizona State University, USA
Kirk Kristofferson, Ivey Business School, Western University, Canada

EXTENDED ABSTRACT

Companies are increasingly deploying AI-enabled technology to perform service roles (Whiton, 2019). However, multiple media reports document incidents where consumers sabotaged service robots. Considering the potential benefits of deploying service robots (e.g., efficiency, safety during times of pandemic, Litwin, 2020), and the cost required for their implementation (Demaitre, 2019; Whiton, 2019), it is critical to understand consumer sabotage behavior against robots.

The current research seeks to uncover when and why consumers are more likely to engage in acts of sabotage against robots and proposes that a key factor driving such sabotage behavior is robot's human likeness (MacDorman & Ishiguro, 2006; Mori et al., 2012). Interestingly, one could make different predictions as to how robot human likeness might influence sabotage. One possibility is that consumers might be more likely to feel socially connected to robots high (vs. low) in human likeness (Epley et al., 2007, 2008), and less likely to sabotage them because doing so would violate acceptable social norms of behavior (Ackroyd & Thompson, 1999). In contrast to this possibility, we propose that consumers are more likely to sabotage robots high (vs. low) in human likeness because such robots blur the boundaries between technology and humanity, undermining the distinctiveness of humanity as an in-group. This is consistent with the uncanny valley hypothesis, which suggests that robots high in human likeness cause discomfort (Mori et al., 2012), which leads to avoidance (Strait et al., 2017) and compensatory consumption (Mende et al., 2019)robots with a human-like morphology such as a face, arms, and legs. We identify a specific source of discomfort, threat to in-group distinctiveness (Brewer, 2003), and examine a novel consequence of this threat, consumer sabotage.

In study 1 we created a secondary dataset of real-world stimuli documenting sabotaging behavior against robots. Participants (N = 204) were presented with one incident at a time, and evaluated human likeness of the robot and the degree of the incident's violence. The degree of human likeness of the robot was positively correlated with the severity of robot sabotage behavior (r(2,222) =.32, p < .001), providing preliminary real-world evidence for the effect.

In study 2 (N = 261), human likeness was manipulated. Undergraduate participants learned that they would be assisting in the training of a robot prototype, which was manipulated to be either high or low in human likeness. Participants were instructed to answer five open-ended questions purportedly to provide language training content, while told that the robot was best able to understand short responses, and that longer responses could harm it. Thus, participants could sabotage the robot by providing long responses. We measured (1) behavioral sabotage by computing the average number of words participants wrote and (2) attitudinal sabotage by assessing hostility toward the robot. Participants who interacted with the robot high (vs. low) in human likeness were more likely to behaviorally sabotage its training (p = .030), and expressed greater hostility towards the robot (p = .023).

In study 3 (N=152), we triangulated on the robot human likeness construct by both manipulating robot human likeness and measuring individual differences in the tendency to anthropomorphize technology (Waytz et al., 2010). Participants watched a video clip of a coffee shop interaction with a barista robot that was either high or low in human likeness. Following Kähr et al. (2016)companies have been confronted with a new type of negative consumer behavior: consumers who have turned hostile and who are strongly determined to cause damage to the brand. Empowered by new technological possibilities, an individual consumer can now wreak havoc on a brand with relatively little effort. In reflection of this new phenomenon, the authors introduce the concept of consumer brand sabotage (CBS, we assessed consumer sabotage by asking participants the likelihood to (1) complain about the robot, (2) publish negative videos or posts about the robot on social media, and (3) make snide comments about the robot to others. We replicated the main effect of robot human likeness on sabotage behavior (p = .030). Importantly, we observed a human likeness × anthropomorphism interaction (p = .028), such that the focal sabotage effect emerged among those who perceive technology as human like (BJN = 4.03 and higher on a 10-point scale).

In study 4 (N = 400), we tested the mediating role of in-group distinctiveness threat. Participants were presented with the same stimuli and sabotage measure used in study 3. Next, we assessed distinctiveness threat by asking participants the extent to which the barista robot would make them feel that the robot: (1) blurred the boundary between humans and robots, (2) reduced the distinction between humans and robots in a dangerous way, and (3) threatened the difference between humans and robots (Warner et al., 2007). Again, we found that participants were more likely to sabotage the robot when human likeness was high versus low (p = .038). Participants also experienced higher distinctiveness threat when the robot's human likeness was high versus low (p = .002). Mediation analysis (model 4, 10,000 resamples) revealed that distinctiveness threat fully mediated the effect of robot human likeness on sabotage (CI95: .05, .25).

Study 5 (N = 600) provided further support for the proposed process by examining a theoretically driven moderator, individual difference in expansiveness of in-group boundaries. We reasoned that if the observed robot sabotage is a result of viewing a robot with high human likeness as a threat to in-group distinctiveness, then the sabotage effect should be attenuated among consumers with more expansive group membership boundaries. After presenting a video of a robot grocery delivery worker either high or low in human likeness, we assessed participants' sabotage intention and individual differences in expansiveness of in-group boundaries using moral identity scale (Aquino & Reed, 2002) as consistent with prior literature (Choi & Winterich, 2013). Participants were more likely to sabotage a robot high (vs. low) in human likeness (p = .007). Importantly, the predicted robot human likeness × expansiveness of in-group boundaries interaction emerged (p = .050), such that the sabotage effect was attenuated among participants with more expansive in-group boundaries (BJN = 5.35 and higher on a 7-point scale).

This research contributes to the emergent literature on the effect of AI-based technologies on consumer behavior (Castelo et al., 2019; Granulo et al., 2019; Longoni et al., 2019; Mende et al., 2019) despite the fact that algorithms often perform better. The authors explore when and why this is true in a wide variety of domains. They find that algorithms are trusted and relied on less for tasks that seem subjective (vs. objective by identifying robot sabotage as a new and costly consequence of using robots in the marketplace, and by examining when and why robot sabotage occurs.

REFERECES

Ackroyd, S., & Thompson, P. (1999). *Organizational Misbehaviour: SAGE Publications*. United Kingdom: Sage Publications Ltd.

Aquino, K., & Reed, A., II. (2002). The self-importance of moral identity. *Journal of Personality and Social Psychology*, *83*(6), 1423–1440. https://doi.org/10.1037//0022-3514.83.6.1423

Brewer, M. B. (2003). Optimal distinctiveness, social identity, and the self. In *Handbook of self and identity* (pp. 480–491). The Guilford Press.

Castelo, N., Bos, M. W., & Lehmann, D. R. (2019). Task-Dependent Algorithm Aversion. *Journal of Marketing Research*, 0022243719851788. https://doi.org/10.1177/0022243719851788

Choi, W. J., & Winterich, K. P. (2013). Can Brands Move in from the Outside? How Moral Identity Enhances Out-Group Brand Attitudes. *Journal of Marketing*, *77*(2), 96–111. https://doi.org/10.1509/jm.11.0544

Demaitre, E. (2019, August 1). *July 2019 robotics investment recap*. The Robot Report. https://www.therobotreport.com/robotics-investments-recap-july-2019/

Epley, N., Waytz, A., Akalis, S., & Cacioppo, J. T. (2008). When We Need A Human: Motivational Determinants of Anthropomorphism. *Social Cognition*, *26*(2), 143–155. https://doi.org/10.1521/soco.2008.26.2.143

Epley, N., Waytz, A., & Cacioppo, J. T. (2007). On seeing human: A three-factor theory of anthropomorphism. *Psychological Review*, *114*(4), 864–886. https://doi.org/10.1037/0033-295X.114.4.864

Granulo, A., Fuchs, C., & Puntoni, S. (2019). Psychological reactions to human versus robotic job replacement. *Nature Human Behaviour*, *3*(10), 1062–1069. https://doi.org/10.1038/s41562-019-0670-y

Kähr, A., Nyffenegger, B., Krohmer, H., & Hoyer, W. D. (2016). When Hostile Consumers Wreak Havoc on Your Brand: The Phenomenon of Consumer Brand Sabotage. *Journal of Marketing*, *80*(3), 25–41. https://doi.org/10.1509/jm.15.0006

Litwin, A. S. (2020). *Technological Change in Health Care Delivery: Its Drivers and Consequences for Work and Workers*. Berkley: UC Berkeley Labor Center.

Longoni, C., Bonezzi, A., & Morewedge, C. K. (2019). Resistance to Medical Artificial Intelligence. *Journal of Consumer Research*, *46*(4), 629–650. https://doi.org/10.1093/jcr/ucz013

MacDorman, K. F., & Ishiguro, H. (2006). The uncanny advantage of using androids in cognitive and social science research. *Interaction Studies*, *7*(3), 297–337. https://doi.org/10.1075/is.7.3.03mac

Mende, M., Scott, M. L., van Doorn, J., Grewal, D., & Shanks, I. (2019). Service Robots Rising: How Humanoid Robots Influence Service Experiences and Elicit Compensatory Consumer Responses. *Journal of Marketing Research*, *56*(4), 535–556. https://doi.org/10.1177/0022243718822827

Mori, M., MacDorman, K. F., & Kageki, N. (2012). The Uncanny Valley. *Robotics & Automation Magazine*, *IEEE*(19).

Strait, M. K., Floerke, V. A., Ju, W., Maddox, K., Remedios, J. D., Jung, M. F., & Urry, H. L. (2017). Understanding the Uncanny: Both Atypical Features and Category Ambiguity Provoke Aversion toward Humanlike Robots. *Frontiers in Psychology*, *8*. https://doi.org/10.3389/fpsyg.2017.01366

Warner, R., Hornsey, M. J., & Jetten, J. (2007). Why minority group members resent impostors. *European Journal of Social Psychology*, *37*(1), 1–17. https://doi.org/10.1002/ejsp.332

Waytz, A., Gray, K., Epley, N., & Wegner, D. M. (2010). Causes and consequences of mind perception. *Trends in Cognitive Sciences*, *14*(8), 383–388. https://doi.org/10.1016/j.tics.2010.05.006

Whiton, M. M., Robert Maxim, and Jacob. (2019, January 22). Automation and Artificial Intelligence: How machines are affecting people and places. *Brookings*. https://www.brookings.edu/research/automation-and-artificial-intelligence-how-machines-affect-people-and-places/

Does it Pay to Offend? Short and Long-Term Responses to Offensive Ads

Friedmann, E., Solodoha, E., and Efrat-Treister, D., Ben Gurion University, Israel

EXTENDED ABSTRACT

Offensive stereotyping advertising that insults low power groups (women, blacks) is increasing worldwide (EASA-Alliance 2017). Most empirical research on the influence of offensive ads shows immediate negative consumer responses to offensive ads (Rojas-Méndez et al. 2009). This highlights a discrepancy between literature that claims for negative responses to offensive ads, and their increasing use in practice. To understand this gap, we explore short and long-terms effect of their use, on consumer responses. We posit that over time, after offense recedes, a positive consumer response toward the brand appears in the long term, which we term the 'Time–Offense Paradox' (TOP). This is in line with the power approach theory (Keltner et al., 2003) that claims power is attractive. This theory, and the dimension of time, have not yet been applied to the context of offensive ads. We suggest the 'TOP' effect is triggered by a long-term positive increase in consumer response, especially among low-power group members, as compensatory consumption theory suggests (Rucker and Galinsky 2008), we term this the 'Trigger TOP effect'.

We begin with a real-world study examining a well-known beer that offends women in their advertisements; Study 1a investigated the 'TOP effect', 24 judges (50% women) evaluated 11 ads of the offensive beer whose marketing strategy is based on the theme "Thank God you're a man." Data on the brand's sales were acquired from 'Storenext'. Hierarchical regression examining the difference in daily sales before and after an offensive ad showed that ad's offensiveness predicts sales ($B=41.64$, $SE=9.07$, $p<.05$). Study 1b investigated the 'Trigger TOP effect'. A pretest ($n=287$, 66% women) examined the perceived offensiveness of six beer brands. The offensive beer from Study 1a was the most offensive [$M_{offense}=3.34$, $SD=.13$; $F(5,282)$ offense difference = 29.91 , $p<.001$]. Next, we show that choosing the offensive beer is most popular (30.9%) among women ($n=261$, 72.7% women). Among men, this brand was the second-favorite (21.3% chose it). Considering the two leading brands, choice and gender were related ($\chi^2 (1)=3.45$, $p<.05$).

A pretest ensured that (a) control ads differ from treatment ads in their perceived offensiveness and brand power, and that (b) low- and high-power groups (blacks vs. whites, females vs. males) indeed differ in social power.

In Study 2 we examined purchase intentions among 347 prolific participants (47.2% blacks), immediately after the offensive advertisement, and 10 days later. Respondents were exposed to racially offensive/non-offensive ads for soap, which was presented once, during the first phase of the study. Repeated-measures ANOVA with ad condition as the between-subjects factor and purchase intentions over time as the within-subjects factor showed a main effect of time since exposure on purchase intentions ($F(1,344)= 17.23$, $p<.001$), and an interaction between time since exposure and ad's condition ($F (1,344)=16.65$, $p<.001$). The results showed a positive effect of offense on purchase intentions 10 days after exposure to the ad in the treatment condition ($F(1,204)=30.72$, $p<.001$), but not in the control condition ($F(1,145)=.005$, $p=.95$). Repeated-measures ANOVAs for the treatment and control conditions, entering race as a between-subjects factor and purchase intentions at both time points as the within-subject factor showed an interaction of race by time since exposure influencing purchase intentions, in the offensive ad condition ($F(1,198)=4.01$, $p<.05$), and not in the control condition ($F(1,112)=1.73$, $p=.19$) revealing a steeper increase in purchase intentions over time in the low-power (compared with the high-power) group, illustrating the 'Trigger TOP effect'.

In study 3 we examined brand choice among male and female participants over four-time points (baseline, immediately, 10 days, one month). Students ($n= 221$, 65.6 % women) were randomly exposed to an offensive / non-offensive ad for Snickers, and were asked to choose one of the three chocolate bars (Snickers/ Mars/ Twix). The change between baseline and 10 days after exposure showed a marginally significant difference between control and treatment conditions ($\chi^2(2)=5.044$, $p=.08$). When examining the change between baseline and one month later, the effect of ad condition was significant ($\chi^2(2)=6.67$, $p<.05$). 70% of those who changed their choice to Snickers were from the treatment group. Binomial mixed regression was conducted to predict actual brand choice (Snickers or others). Time-since-exposure was computed as a dummy variable: baseline and a month after exposure. It was entered as predictor along with ad's condition and their interaction. Results showed that the treatment condition yielded higher Snickers choices than the control condition ($B_{time}=-.13$, $SE=.04$, $p<.01$; $B_{ad's-condition}=-.14$, $SE=.06$, $p<.05$; $B_{timeXad's-condition}=.22$, $SE=.05$, $p<.001$). A significant gender by time interaction was evident only in the treatment condition ($B_{gender}=-.13$, $SE=.07$, $p=n.s$; $B_{time}=-.01$, $SE=.05$, $p=n.s$; $B_{timeXgender}=.16$, $SE=.05$, $p<.001$).

Study 4 focused on the mechanism behind the long-term effect of offensive /non-offensive ads. 105 undergraduates (57.1% women, $M_{age}=25.43$, $SD=1.59$) rated three well-known beer brands. First, they chose one beer out of three. Then they recalled the slogans used by each brand. Next, they assessed perceived brand power (Anderson and Galinsky, 2006), and offensiveness of the ad. Results revealed a mediation effect only among women, in which Ad's offensiveness->Brand power->Brand attraction->Brand choice{effect =.01(.01), 95%, [.000, .042]} leading to an overall effect {effect =.007(.005), 95%, [.001,.022]}, illustrating the mechanism of the predicted effects.

Our contribution is by demonstrating the change in consumer reaction to offensive ads over time, and its mechanism. The positive TOP effect is triggered by approach to power among low-power groups. Regulation limiting the use of offensive ads is necessary to promote a more just society for all individuals.

REFERENCES

Anderson, C. and A. D. Galinsky (2006), "Power, Optimism, and Risk-taking," *European Journal of Social Psychology,* 36(4), 511–36. EASA-Alliance (2017), "Statistics," (accessed 10 Feb 2020), [available at http://www.easaalliance.org/products-services/publications/statistics].

Keltner, Dacher, Deborah H. Gruenfeld, and Cameron Anderson (2003), "Power, Approach, and Inhibition," *Psychological review*, 110 (2), 265.

Rojas-Méndez, José I. Gary Davies, and Canan Madran (2009), "Universal Differences in Advertising Avoidance Behavior: a Cross-Cultural Study," *Journal of Business Research*, 62 (10), 947-954.

Rucker, Derek D. and Adam D. Galinsky (2008), "Desire to Acquire: Powerlessness and Compensatory Consumption," *Journal of Consumer Research*, 35 (2), 257–67.

The Review-Writing Effect: Writing a Review Amplifies Evaluations and Connections More Than Rating Does

Matthias Fuchs, University of St. Gallen, Switzerland
Gerald Häubl, University of Alberta, Canada

EXTENDED ABSTRACT

The era of ubiquitous consumer feedback solicitations is upon us: When buying products online, consuming meals in a canteen, or going through airport security, one would be hard-pressed not to be asked to constantly rate and review.

For managers, the appeal of constantly measuring consumers' satisfaction with their offerings seems clear. By better understanding what consumers think, they can react and improve their products and experiences. But is the same true for the consumer? Are quick and easy feedback requests advisable from a consumer perspective? In particular, how does writing reviews impact consumers' mental states when compared to rating the same product?

Prior work has shown writing to lead to a search for meaning and understanding through its syntax: Writing organizes memories by forcing writers to build causal structures into their disclosures (Lyubomirsky, Sousa, and Dickerhoof 2006; Singer 2004; Smyth, True, and Souto 2001). This constitutes the first hypothesized psychological process ignited by review-writing: Compared to rating, we argue that review-writing can increase evaluative clarity (i.e., consumers' clarity of their evaluation of a product or experience, based on "understanding" by Moore 2012), which in turn polarizes their views.

In addition to the first process, we propose that review-writing sets consumers' focus on the social aspect of the interaction. This phenomenon has been referred to as "interpersonal involvement" (Chafe and Danielewicz 1987; Jahandarie 1999; Tannen 1985) or "interaction focus" (Shen and Sengupta 2018). We hypothesize that interaction focus strengthens their connection to the producer (based on self-brand connection by Escalas 2004), which constitutes the second hypothesized psychological process ignited by review-writing: Compared to rating, we argue that review-writing may lead to a greater interaction focus, which induces a stronger connection to the producer, which increases retrospective enjoyment.

Lastly, we derive a theoretical moderator of the review-writing effect from global matching models of memory(Kelly and West 2017). According to these models, "human memory is a vast collection of episodic memory traces, each of which is a record of an event or experience" (Hintzman 1984, p. 96). Following this theory, review-writing should encode more memory traces than rating does. At the same time, the absolute number of extant memory traces associated with a product can conceptually be viewed as familiarity with the product (Dougherty, Gettys, and Ogden 1999). This leads us to our prediction that the review-writing effect will be less pronounced for familiar products and experiences.

The two psychological processes ignited by review-writing and their moderator, familiarity, are summarized in these hypotheses:

Hypothesis 1: *Review-writing increases retrospective enjoyment of the reviewed product or experience.*

Hypothesis 2: *The positive effect of review-writing on retrospective enjoyment (H1) is attenuated when consumers' familiarity with the product or experience is high.*

142 MTurk workers participated in study 1 in exchange for payment. Participants were randomly assigned to either the review-writing or the rating condition. Participants were asked to watch an enjoyable video ("Minions – The Competition"). While watching the video, they were asked to indicate their momentary enjoyment every 30 seconds. In the review-writing (rating) condition, participants read that the producer of the video is asking them for written (rated) feedback on the experience's systematic cues (Chaiken 1980; Petty and Cacioppo 1986), which were identified in a pre-study. As hypothesized, there was a significant effect of review-writing on retrospective enjoyment ($F (1, 138) = 2.43$, $p = .04$, using momentary enjoyment as a linear and quadratic covariate in this and all subsequent ANCOVAs, Estimated Marginal $M_{RevWrit} = 5.51$, $M_{Rating} = 5.20$).

244 MTurk workers participated in study 2 in exchange for payment, which was a 2 (review-writing or rating) × 2 (familiar or unfamiliar song) between-subjects study. In the unfamiliar song condition, study participants listened to the song "Loving is Easy" by the artist "Rex Orange County" and in the familiar song condition, participants listened to the song "Happy" by "Pharrell Williams". The study was identical to study 1 in all other aspects. A t-test revealed a significant difference in aided awareness between the popular and unpopular song ($M_{familiar} = 6.05$, $M_{unfamiliar} = 1.82$, $t(218)=23.066$, $p<.001$, no covariates). As hypothesized, a 2×2 ANCOVA revealed a significant interaction of review-writing and familiarity on retrospective enjoyment ($F(1, 238) = 6.12$, $p = .01$). In the unfamiliar condition, review-writing increased retrospective enjoyment ($M_{RevWrit}= 5.62$) versus rating ($M_{Rating} = 5.14$). In the familiar condition, review-writing did not influence retrospective enjoyment ($M_{RevWrit} = 5.53$) compared to rating ($M_{Rating} = 5.68$).

104 students at a Swiss university participated in study 3 in exchange for payment, which was a lab study. Participants tasted a mostly unfamiliar, foreign brand of jam. Study 3 differed from the previous studies in two ways: First, we used retrospective evaluation as an extension of our dependent variable. Second, at the end of the study, participants could choose to reduce their payment by 0.50 CHF ($ 0.53) and receive a 28g miniature jar of jam of the same brand (36% chose to purchase the jam). A 2×2 ANCOVA revealed that the effect of review-writing near-significantly interacted with previous awareness of the foreign brand ($F (1, 99) = 3.89$, $p = .05$). When participants were unfamiliar with the brand (M_{Fam}-SD_{Fam}), review-writing increased their retrospective evaluation ($M_{RevWrit} = 5.24$, $M_{Rating} = 4.94$). This effect subsided when participants were familiar with the brand ($M_{RevWrit} = 5.16$; $M_{Rating} = 5.06$). A logistic regression revealed that retrospective evaluation was a significant predictor of jam purchase ($b=.77$, $p<.01$). As retrospective evaluation increased by one unit, the probability of purchasing the jam increased by 68%.

This research features 4 major contributions: First, while previous research has focused on consumer feedback from the perspective of managers, we do so from the perspective of consumers. Second, this research more generally advances our understanding of how articulating one's views for others affects internal states. Third, this research extends the application of global matching models of human memory. Lastly, this research contributes by showing that also the mode of recording answers impacts mere measurement effects (not only measuring vs. not measuring).

REFERENCES

Chafe, Wallace and Jane Danielewicz (1987), "Properties of Spoken and Written Language," in *Comprehending Oral and Written Language*, R. Horowitz and S. J. Samuels, eds., San Diego, CA: Academic Press, 83–113.

Chaiken, Shelly (1980), "Heuristic Versus Systematic Information Processing and the Use of Source Versus Message Cues in Persuasion," *Journal of Personality and Social Psychology*, 39 (5), 752–66.

Dougherty, Michael R.P., Charles F. Gettys, and Eve E. Ogden (1999), "MINERVA-DM: A memory processes model for judgments of likelihood," *Psychological Review*, 106 (1), 180–209.

Escalas, Jennifer Edson (2004), "Narrative Processing: Building Consumer Connections to Brands," *Journal of Consumer Psychology*, 14 (1–2), 168–80.

Hintzman, Douglas L. (1984), "MINERVA 2: A simulation model of human memory," *Behavior Research Methods, Instruments, &amp Computers*, 16 (2), 96–101.

Jahandarie, Khosrow (1999), "Structural differences between speech and writing: the linguistic evidence," in *Spoken and Written Discourse: A Multi-disciplinary Perspective*, K. Jahandarie, ed., Stamford, CT: Ablex, 131–50.

Kelly, Matthew A and Robert L West (2017), "A Framework for Computational Models of Human Memory," *2017 AAAI Fall Symposium Series*.

Moore, Sarah G. (2012), "Some Things Are Better Left Unsaid: How Word of Mouth Influences the Storyteller," *Journal of Consumer Research*, 38 (6), 1140–54.

Petty, Richard E. and John T. Cacioppo (1986), "The Elaboration Likelihood Model of Persuasion," in *Communication and Persuasion*, New York, NY: Springer New York, 1–24.

Shen, Hao and Jaideep Sengupta (2018), "Word of Mouth versus Word of Mouse: Speaking about a Brand Connects You to It More Than Writing Does," *Journal of Consumer Research*, (E. Fischer and J. Hoegg, eds.), 45 (3), 595–614.

Tannen, Deborah (1985), "Relative focus on involvement in oral and written discourse," in *Literacy, Language, and Learning: The Nature and Consequences Of Reading And Writing.*, D. R. Olson, N. Torrance, and A. Hildyard, eds., Cambridge, UK: Cambridge University Press, 124–47.

Found, Not Created: How Unintentionality in an Object's Discovery Increases Preference

Alexander G. Fulmer, Yale University, USA
Taly Reich, Yale University, USA

EXTENDED ABSTRACT

Consumer research has increasingly identified biographical elements of an object's creation process as key inputs shaping preference for otherwise identical objects (Avery et al. 2010; Cho and Schwarz 2008; Fuchs, Schreier, and Van Osselaer 2015; Hong and Wyer 1989; Kruger et al. 2004; Newman and Bloom 2012; Newman, Gorlin, and Dhar 2014; Paharia et al. 2010; Reich, Kupor, and Smith 2017). Previous work has identified intentionality during the creation of objects as one such biographical element that can shift consumers' preferences for those objects (Newman and Bloom 2012; Newman et al. 2014; Reich et al. 2017). While past work has identified influences of intentionality during an object's creation on preference, the current research investigates preference for objects that are discovered, that is, existing objects that are uncovered. We propose that unintentionally discovered objects will be preferred to otherwise identical intentionally discovered objects. Further, we predict that this preference is driven by the unintentional discovery of an object prompting increased counterfactual thought about how the object might not have been discovered at all.

Past consumer research on intentionality behind actions and creation processes has showcased a premium awarded to outcomes and objects involving intentionality. There exists a psychological association between intention and effort (Caruso, Waytz, and Epley 2010; Heider 1958; Malle 2010; Malle and Knobe 1997), and multiple lines of consumer research have shown that objects that were believed to have taken more time and effort to create were valued more (Cho and Schwarz 2008; Kruger et al. 2004; Morales 2005). Other work on intentionality indicates that skill is assumed in intentional action (Malle 2010) and that people make negative inferences and believe an agent holds less skill and has exerted less effort if their actions are unintentional rather than intentional (Caruso et al. 2010; Malle 2010; Malle and Knobe 1997). Taken together, these findings imply that intentionally discovered objects will be preferred to unintentionally discovered objects.

However, research has illuminated situations in which specific kinds of unintentionality during an object's creation process actually increase preference for objects. Mistakes involved in the manufacture of hedonic products (Reich et al. 2017), unintentionally making a product environmentally friendly (Newman et al. 2014), and coincidence in the duplication of original artwork (Newman and Bloom 2012) all increase preference for otherwise identical objects. In the present research, we expand our understanding of the influence of intentionality on preference beyond its role in creation processes, proposing that unintentionally discovering an object heightens preference for that object. Further, we suggest that this preference is driven by increased counterfactual thought about how the object might not have been discovered.

Because counterfactual thinking is triggered by outcomes deviating from the norm (Kahneman and Miller 1986) and unintentional discovery deviates from the implicit assumption that actions are intentional (Bègue et al. 2010; Rosset 2008; Rosset and Rottman 2014; Spunt, Meyer, and Lieberman 2015), unintentional discovery should inspire counterfactual thought. Past research has indicated that counterfactual thinking can result in a variety of positive consequences. Counterfactual thoughts can heighten the meaningfulness of one's own life experiences through benefit recognition (Kray et al. 2010), increase patriotism and organizational commitment (Ersner-Hershfield et al. 2010), and even paint catastrophic events in a positive light (Teigen and Glad 2011). Especially relevant to the current research, work exploring rumination on counterfactual thoughts has shown that they can change the perception of objectively evaluable outcomes. Bronze medalists in the Olympics were judged as looking happier than silver medalists because the counterfactual of how they might not have won a medal at all was more salient to bronze medalists, thereby positively influencing their perceptions of a quantifiable outcome (Medvec, Madey, and Gilovich 1995). Similar to how bronze medalists are happier about their medals because a reality in which they didn't win a medal at all is salient, we propose that salience of a reality in which an object was not discovered, absent from the world and not able to be experienced by consumers, might increase preference for this object.

Three studies examined consumers' preference for objects discovered either intentionally or unintentionally. Our first study tested our core prediction – that consumers prefer unintentionally discovered objects to otherwise identical intentionally discovered objects. Our second study used mediation analysis to identify our proposed mechanism of increased counterfactual thinking about how discovery of an object might never have occurred as the driver of preference for the object. Our third study expanded this effect to consequential product choice, showing that consumers prefer products when they learn that the basis of the product was discovered unintentionally.

This result enlarges our understanding of the influence of intentionality in preference for objects beyond its role in creation processes. While marketing literature shows that unintentionality in an object's creation process can heighten preference (Newman et al. 2014; Newman and Bloom 2012; Reich et al. 2017), the current research reveals that intentionality plays an important role in the discovery of existing objects. Additionally, the present work illuminates a novel antecedent of consumer preference for objects: counterfactual thoughts about how the objects might not have been found. Finally, while past work has examined how a consumer's sense of having personally discovered a service venue can heighten preference for the venue by strengthening customer-venue bonds (Kokkoris, Hoelzl, and Kamleitner 2019), the present work adds to our understanding by examining discovery as part of an object's biography rather than consumer personal experience.

These results could help to direct museum curators' creation of promotional materials. Moreover, marketing managers could increase preference for their companies' products by highlighting information about unintentional discovery of the basis of their products. Additionally, inspired by works like Marie Kondo's "The Life-Changing Magic of Tidying Up" (Kondo 2014), there exists a current trend towards "decluttering" by getting rid of old possessions which is causing a donation spike to second-hand stores (Brodesser-Akner 2016; Roberts and Schmidt 2019). Our research suggests that second-hand stores and auction houses might benefit from advertising biographical information pertaining to past unintentional discovery of their merchandise to increase consumer preference.

REFERENCES

Avery, Jill, Neeru Paharia, Anat Keinan, and Juliet B. Schor (2010), "The Strategic Use of Brand Biographies," in *Research in Consumer Behavior* (pp. 213-29). Emerald Group Publishing Limited.

Bègue, Laurent, Brad J. Bushman, Peter R. Giancola, Baptiste Subra, and Evelyn Rosset (2010), "There is No Such Thing as an Accident, Especially When People are Drunk," *Personality and Social Psychology Bulletin*, 36 (10), 1301-304.

Brodesser-Akner, Taffy (2016), Marie Kondo, Tidying Up and the Ruthless War on Stuff, *The New York Times Magazine*. https://www.nytimes.com/2016/07/10/magazine/marie-kondo-and-the-ruthless-war-on-stuff.html

Caruso, Eugene M., Adam Waytz, and Nicholas Epley (2010), "The Intentional Mind and the Hot Hand: Perceiving Intentions Makes Streaks Seem Likely to Continue," *Cognition*, 116 (1), 149-53.

Cho, Hyejeung, and Norbert Schwarz (2008), "Of Great Art and Untalented Artists: Effort Information and the Flexible Construction of Judgmental Heuristics," *Journal of Consumer Psychology*, 18 (3), 205–11.

Ersner-Hershfield, Hal, Adam D. Galinsky, Laura J. Kray, and Brayden G. King (2010), "Company, Country, Connections: Counterfactual Origins Increase Organizational Commitment, Patriotism, and Social Investment," *Psychological Science*, 21 (10), 1479-486.

Fuchs, Christoph, Martin Schreier, and Stijn MJ Van Osselaer (2015), "The Handmade Effect: What's Love Got to do With It?," *Journal of Marketing*, 79 (2), 98-110.

Heider, Fritz (1958), The Psychology of Interpersonal Relations, New York: Wiley.

Hong, Sung-Tai, and Robert S. Wyer Jr. (1989), "Effects of Country-of-Origin and Product-Attribute Information on Product Evaluation: An Information Processing Perspective," *Journal of Consumer Research*, 16 (2), 175-87.

Kahneman, Daniel, and Dale T. Miller (1986), "Norm Theory: Comparing Reality to its Alternatives," *Psychological Review*, 93 (2), 136-53.

Kokkoris, Michail D., Erik Hoelzl, and Bernadette Kamleitner (2019), "Self-found, Spellbound: The Sense of Own Discovery Shapes Customer Bonds with Service Venues," *Journal of Business Research*, 113, 303-16.

Kondo, Marie (2014), The Life Changing Magic of Tidying Up: The Japanese Art of Decluttering and Organizing, Berkeley: Ten Speed Press.

Kray, Laura J., Linda G. George, Katie A. Liljenquist, Adam D. Galinsky, Philip E. Tetlock, and Neal J. Roese (2010), "From What Might Have Been to What Must Have Been: Counterfactual Thinking Creates Meaning," *Journal of Personality and Social Psychology*, 98 (1), 106–18.

Kruger, Justin, Derrick Wirtz, Leaf Van Boven, and T. William Altermatt (2004), "The Effort Heuristic," *Journal of Experimental Social Psychology*, 40 (1), 91-8.

Malle, Bertram F. (2010), Intentional Action in Folk Psychology, *A Companion to the Philosophy of Action*, 357-65.

Malle, Bertram F., and Joshua Knobe (1997), "The Folk Concept of Intentionality," *Journal of Experimental Social Psychology*, 33 (2), 101-21.

Medvec, Victoria H., Scott F. Madey, and Thomas Gilovich (1995), "When Less is More: Counterfactual Thinking and Satisfaction Among Olympic Medalists," *Journal of Personality and Social Psychology*, 69 (4), 603-10.

Morales, Andrea C. (2005), "Giving firms an "E" for Effort: Consumer Responses to High-effort Firms," *Journal of Consumer Research*, 31 (4), 806-12.

Newman, George E., and Paul Bloom (2012), "Art and Authenticity: The Importance of Originals in Judgments of Value," *Journal of Experimental Psychology: General*, 141 (3), 558-69.

Newman, George E., Margarita Gorlin, and Ravi Dhar (2014), "When Going Green Backfires: How Firm Intentions Shape the Evaluation of Socially Beneficial Product Enhancements," *Journal of Consumer Research*, 41 (3), 823-39.

Paharia, Neeru, Anat Keinan, Jill Avery, and Juliet B. Schor (2010), "The Underdog Effect: The Marketing of Disadvantage and Determination Through Brand Biography," *Journal of Consumer Research*, 37 (5), 775-90.

Reich, Taly, Daniella M. Kupor, and Rosanna K. Smith (2017), "Made by Mistake: When Mistakes Increase Product Preference," *Journal of Consumer Research*, 44 (5), 1085-103.

Roberts, Madison, and Mackenzie Schmidt (2019), Marie Kondo's *Tidying Up* Is Causing a Spike in Goodwill Donations As People Declutter Their Homes, *People*. https://people.com/home/marie-kondo-tidying-up-causing-spike-goodwill-donations/

Rosset, Evelyn (2008), "It's No Accident: Our Bias for Intentional Explanations," *Cognition*, 108 (3), 771-80.

Rosset, Evelyn, and Joshua Rottman (2014), "The Big 'Whoops!' in the Study of Intentional Behavior: An Appeal for a New Framework in Understanding Human Actions," *Journal of Cognition and Culture*, 14 (1-2), 27-39.

Spunt, Robert P., Meghan L. Meyer, and Matthew D. Lieberman (2015), "The Default Mode of Human Brain Function Primes the Intentional Stance," *Journal of Cognitive Neuroscience*, 27 (6), 1116-124.

Teigen, Karl Halvor, and Kristin A. Glad (2011), "'It Could have been Much Worse': From Travelers' Accounts of Two Natural Disasters," *Scandinavian Journal of Hospitality and Tourism*, 11 (3), 237-49.

Show Me the Stars: The Persuasive Impact of Dispersion Across Online Ratings

Maximilian Gaerth, University of Mannheim, Germany
Neeru Paharia, Georgetown University, USA
Florian Kraus, University of Mannheim, Germany

EXTENDED ABSTRACT

A growing number of customer review sites (e.g., TripAdvisor, Yelp) display the distributions across reviewers' past ratings. Although recent research in marketing has started to investigate the relationship between reviewer expertise and their rating patterns (Nguyen et al. 2020), whether and to what extent *review readers* use reviewers' rating histories to make inferences about them remains unanswered. Specifically, we propose that observers infer expertise from the dispersion (measured by variance) across reviewers' past ratings. An example of high rating dispersion would be a large number of past positive reviews, in addition to a large number of past negative reviews. Importantly, observers may be neglecting to consider that reviewers are likely weighing the pros and cons for each product/service independently, rather than comparatively. Therefore, when presented with a reviewer's past rating distribution, we expect that observers believe that true experts would more likely discern some products as favorable and others as unfavorable (Alba and Hutchinson 1987). Interestingly, by showing that online review readers incorrectly infer expertise from high rating dispersion, our research identifies an interesting disconnect between online reviewers and WOM readers that deserves further attention.

Study 1A was designed to replicate previous findings by Nguyen et al. (2020) on the relationship between reviewer expertise and rating dispersion by using data collected from Yelp (9,252 reviews). We regressed rating dispersion as a function of expertise (as measured by review volume (Packard and Berger 2017; Reich and Maglio 2020)). Higher reviewer expertise was more likely characterized by low dispersion ($b = -.30$, $SE = .012$, $p < .001$).

In study 1B ($N = 306$), participants were asked to rate reviewers' expertise and review helpfulness after reading a subset of 500 reviews of study 1A (i.e., the 250 reviews written by the reviewers with the lowest and highest rating dispersion). Reviewers whose past ratings were characterized by low (vs. high) rating dispersion were judged to have superior expertise in the domain of restaurants ($F(1, 497) = 10.79$, $p = .001$) and their reviews were perceived to be more useful ($F(1, 497) = 8.45$, $p = .004$).

Study 2 ($N = 302$) examined whether consumers correctly infer expertise from low rating dispersion across reviewers' past ratings. Moreover, we tested for mediational evidence for our proposed mechanism via perceived discernment. After reading a brief shopping scenario, participants viewed a reviewer's profile that depicted either high or low dispersion across past ratings. Then, participants indicated perceived expertise of the reviewer and how discerning he or she appeared. Participants viewed the target reviewer with high (vs. low) rating dispersion as more of an expert ($F(1, 294) = 12.69$, $p < .001$) and more discerning ($F(1, 294) = 11.75$, $p = .001$). Perceived discernment mediated the effect of rating dispersion on perceived expertise ($b = .46$, $SE = .14$, 95% CI = .20, .76). Importantly, different average ratings across past reviews did not interact with the impact of rating dispersion on expertise perceptions ($F(3, 294) = 1.09$, NS).

Study 3 ($N = 212$) tested to what extent consumer choice based on reviewers' dispersion across past ratings might importantly differ from evaluations based on another influential WOM metric (i.e., rating volume). We expected that when only provided with rating volume information, people would be more likely to prefer to purchase the product endorsed by the reviewer with more past ratings. How-

ever, when presenting the underlying distributions, we expected that participants' systematic preferences for the product recommended by the high rating volume reviewer would be dramatically changed. To test our propositions, we employed a 2 (display: rating volume vs. rating volume and distribution) × 5 (pairs: 10 vs. 11, 10 vs. 12, 10 vs. 13, 10 vs. 14, 10 vs. 15) mixed design to test to what extent consumer choice based on rating volume would change in the presence of information about rating dispersion. Participants viewed five pairs of reviewers recommending each a different bar of chocolate and were presented with one of two forms of rating summaries: rating volume or rating volume and distribution. Consistent with previous research findings (Nguyen et al. 2020), the pairs of distributions were constructed such that the reviewer with a lower (higher) rating volume had a higher (lower) rating dispersion. Finally, participants indicated which of both bars of chocolate they would prefer to purchase (binary). The results confirm that participants chose the chocolate recommended by the lower volume reviewer significantly more often when they were assigned to the *rating volume and distribution* condition as compared to the *rating volume* condition ($b = 2.39$, $SE = .18$, $p < .001$). However, in pairs with more extreme review volume differences (e.g., 10 vs. 15 reviewed chocolates), participants were significantly less likely to choose the chocolate recommended by the low review volume reviewer ($b = -.14$, $SE = .05$, $p = .01$). Furthermore, the analysis confirmed a significant indirect effect of rating dispersion on product choice through both the between-subjects perceived expertise factor ($b = .13$, $SE = .01$, 95% CI = .09, .14) as well as the within-subjects perceived expertise factor ($b = .09$, $SE = .01$, 95% CI = .06, .11).

Study 4 ($N = 213$) examined whether consumers are aware of online review readers' tendency to incorrectly infer expertise from high rating dispersion. Surprisingly, participants with the goal to convey expertise with their ratings (vs. control) did not show higher dispersion across their ratings ($F(1, 212) = .89$, NS). Furthermore, domain knowledge did not moderate rating dispersion ($p = .74$).

The present studies extend previous research showing that distributions across past ratings of experts are more likely characterized by low dispersion. First, our paper shows that *high* dispersion across past ratings offers a promising persuasive tactic. This occurs because, compared with low rating dispersion, consumers incorrectly associate high dispersion across reviewers' past ratings with greater discernment and eventually expertise. Second, our studies illustrate that differences in rating dispersion can shape consumer choice. Online retailers could increase the impact of positive reviews on conversions by highlighting reviewers' past rating distributions if they depict high (vs. low) dispersion.

REFERENCES

Alba, Joseph W., and J. Wesley Hutchinson (1987), "Dimensions of consumer expertise," *Journal of Consumer Research*, 13(4), 411−54.

Nguyen, Peter, Xin (Shane) Wang, Xi Li, and June Cotte (2020), "Reviewing Experts' Restraint from Extremes and its Impact on Service Providers," *Journal of Consumer Research*, forthcoming.

Packard, Grant, and Jonah Berger (2017), "How language shapes word of mouth's impact," *Journal of Marketing Research*, 54 (4), 572−88.

Reich, Taly, and Sam J. Maglio (2020), "Featuring mistakes: The persuasive impact of purchase mistakes in online reviews," *Journal of Marketing*, 84 (1), 52−65.

Sela, Aner, Liat Hadar, Siân Morgan, and Michal Maimaran (2019), "Variety-Seeking and Perceived Expertise," *Journal of Consumer Psychology*, 29 (4), 671−9.

Stakeholder Involvement in Value Co-Destruction: A Case of Promoting Condoms in India

Samanthika Gallage – Nottingham University Business School, University of Nottingham, UK
Sameer Deshpande – Social Marketing@ Griffith, Griffith University, Australia

EXTENDED ABSTRACT

Condom usage is effective both in preventing sexually transmitted diseases (STD), as well as with family planning. Despite multiple attempts to promote condoms in India, the usage remains at a low level of approximately 5% among sexually active men (United Nations, Department of Economic and Social Affairs Population Division, 2019). These attempts possibly might be failing because of the lack of understanding of the complex stakeholder involvement in the value creation and delivery process. Thus, this paper aims to explore the reasons for low condom usage in India by elucidating the stakeholder involvement in the value creation process.

According to Kotler and Lee (2008 p. 7), social marketing is "a process that applies marketing principles and techniques to create, communicate, and deliver *value* to influence target audience behaviors that benefit society as well as the target audience." Thus, social marketers and consumers co-create value through dialogue, interaction, communication, and collaboration for societal benefits (Gordon et al. 2013). *Value* is "idiosyncratic, experiential, contextual and meaning-laden" (Vargo and Lusch 2008, p. 7). Hence, it is imperative to take a context-driven, processual approach in elaborating on the concept of value. In the social marketing context, value co-creation has been ever challenging since social marketers deal with highly complex "wicked problems" (Kennedy 2016, p. 355) where many stakeholders perpetuate problems with multiple, inter-related factors (Kennedy 2016). Therefore, in this value delivery process, stakeholders may either collaboratively create or destruct value (Echeverri and Skålén 2011; Zainudin, Dent and Tam 2017). While it is imperative to study the target consumers in value creation process (Andreasen 2006), it is also equally important to study the involvement of other stakeholders (influential organizations and individuals). Thus, in this study we focus on influential stakeholders selecting the case of condom promotions in India. While India is experiencing a rapid economic growth, specific social issues such as overpopulation, HIV/AIDS, and sexually transmitted infections still concern a society with 1.3 billion people. Government of India and the extensive non-profit social marketing machinery have been actively tackling these issues by promoting condoms, and yet this is an ever more challenging task due to the multiple stakeholders and interconnected factors.

Taking an interpretative approach, we conducted 58 in-depth interviews with managers and other influential stakeholders representing diverse organizations who promote condom use in India. The snowball technique was utilized to recruit participants (Details of these organizations are given in table 1). We conducted "long interviews" (McCracken 1988) that lasted for around 90 minutes to 2 hours. The conversation started with demographic questions followed by seeking participant's opinions about condom-promotion related social marketing efforts to prevent HIV/STD, role, and influence of prominent stakeholders and challenges experienced by these efforts, primarily focusing on value co-creation. Interviews were transcribed verbatim; authors independently read the transcripts, assigned codes, developed themes, and then discussed themes and arrived at a consensus (Ryan and Bernard 2003).

Our findings suggested that during the process there are two types of value co-destructors, namely *culturally led destructors,* and *stakeholder related destructors*. Culturally led destructors are associated mainly with sexual conservatism of the Indian society. Par-

ticipants explained how sex is "looked down upon," "stigmatized," and the "homophobic attitudes" in the society impacting their efforts. The immorality and conservatism around sex get converted into immorality around HIV/AIDS and STDs. These cultural views largely impact the knowledge about sexuality, family planning, HIV/AIDS, and, ultimately, destruct the value of condom use. Participants also suggested the "patriarchal attitudes" resulted in dire consequences for women (wives, sex workers, hijras – third gender) because men are unwilling to collaborate. These culturally led challenges have largely steered into a value co-destruction in the process rather than a value co-creation.

Data also suggested various stakeholders (apart from consumers) such as politicians, government officials, media, healthcare workers, and celebrities disrupt the value creation process. Politicians are worried about voter backlash, therefore hesitant to openly discuss the issues and government officials perceive Indians are superior to westerners and have better sexual morals. These top officials' interpretations of condom use make it challenging for social marketers to create awareness and normalize condom consumption in this society. While stakeholders reflect society's opinion, these views are amplified on media, perpetuate, and further impact consumer attitudes. Further, data also suggest that cooperation from healthcare workers is far from adequate. Some participants indicated that some doctors and nurses refuse to deliver the baby of a woman infected with HIV/AIDS. Finally, celebrities like cricketers and film stars are shy to say condoms; they would instead refer to the word "helmet" as a form of protection, and retailers feel shy and disburse condoms in plastic bags. Thus, these influential stakeholders destruct the value creation process.

Successful co-creation is dependent on the value and cultural congruencies (Echeverri and Skålén 2011). However, the outcomes are jeopardized when complementarities are not present. This is mainly due to the intended value creation by condom usage continuously clashes with cultural elements such as sexual conservatism, lack of education and awareness, and patriarchal attitudes. Moving beyond, the study also suggests that value destruction can happen not just because of in-complementariness between the consumer and the provider as indicated in value co-creation research (Prahalad and Ramaswamy 2004), but also other significant stakeholders. In this case, it is politicians, media, celebrities, health care workers, and government officials magnify the co-destruction.

Theoretically, we extend the understanding of the concept of value destruction in the social marketing context, primarily focusing on stakeholder involvement. Utilizing these insights, practitioners can learn how to overcome value destruction by managing stakeholder relationships in the process. In conclusion, when the dominant culture does not complement the functional and symbolic value of the product or service, which is the case in most social marketing and not-for-profit contexts, a value co-destruction could occur.

REFERENCES

Andreasen, Alan. R. (Ed.). (2006). *Social marketing in the 21st century*. Sage.

Echeverri, Per, and Per Skålén (2011) "Co-creation and co-destruction: A practice-theory based study of interactive value formation", *Marketing Theory*, 11(3), 351-373.

Gordon, Ross, Christine Domegan, Katie Collins, Martine Stead, Patricia McHugh, and Tim Hughes (2013), "Value co-creation in social marketing: functional or fanciful?", *Journal of Social Marketing*, 3(3), 239-256.

Kennedy, Ann-Marie (2016), "Macro-social marketing", *Journal of Macromarketing*, 36(3), 354-365.

Kotler, Philip, and Nancy Lee (2008).*Social marketing: Influencing behaviors for good* Sage.

McCracken, Grant (1988). *The Long Interview.* New York: Sage.

Prahalad, Coimbatore K. and Venkat Ramaswamy (2004), "Co-creation experiences: The next practice in value creation", *Journal of Interactive Marketing*, 18(3), 5-14.

Ryan, Gery W. and H. Russell Bernard (2003), "Techniques to identify themes", *Field Methods*, 15(1), 85-109.

United Nations, Department of Economic and Social Affairs, Population Division (2019). Contraceptive Use by Method 2019: Data Booklet (ST/ESA/SER.A/435) accessed from https://www.un.org/development/desa/pd/sites/www.un.org.development.desa.pd/files/files/documents/2020/Jan/un_2019_contraceptiveusebymethod_databooklet.pdf retrieved on 20th July 2020

Vargo, Stephen L. and Robert F. Lusch (2008), "Service-dominant logic: continuing evolution", *Journal of the Academy of Marketing Science*, 36(1), 1-10.

Zainuddin, N., Dent, K., & Tam, L. (2017). Seek or destroy? Examining value creation and destruction in behaviour maintenance in social marketing. Journal of Marketing Management, 33(5-6), 348-374.

How Does Incongruity Perception Influence Product Evaluation? Examination of the Inverted U Shape Relation Predicted by Schema Congruity Theory

Xin Gao, Wageningen University, The Netherlands
Ilona E. de Hooge, Wageningen University, The Netherlands
Arnout R.H. Fischer, Wageningen University, The Netherlands

EXTENDED ABSTRACT

To develop positively evaluated new products, it is crucial to understand the relation between incongruity of products and product evaluation. Consumers easily get bored with typical products, while they often reject products that are extremely incongruent with their expectation (Alexander, Lynch Jr, & Wang, 2008). Schema congruity theory predicts an inverted u shape relation between incongruity and evaluation. Moving from stimuli that are congruent to extremely incongruent, evaluation first increases then decreases (Mandler, 1982).

Although findings from multiple studies seem to support the theory (e.g., Noseworthy, Di Muro, and Murray, 2014; Jhang, Grant, and Campbell, 2012), the evidence appears circumstantial. Most studies created three incongruity levels (congruent, moderately incongruent, extremely incongruent) and examined the theory in between-subjects approach (individuals never saw different stimuli from all three incongruity levels). This approach has two disadvantages. First, where incongruity is defined as the degree of discrepancy between a presented object and the existing schema (Meyers-Levy & Tybout, 1989), dividing incongruity into three levels does not fully reflect the nature of incongruity as a subjective perception from individuals. Second, the theory implies that effect of incongruity on evaluation occurs on individual level, but between-subject approach can only examine the effect on group level. The current research aims to overcome these disadvantages by measuring incongruity as a continuous perception variable and using a within-subject design.

To examine the theory in relevant marketing settings, we used realistic materials differing in two dimensions (conventional vs. repurposed; natural vs. artificial). For example, bamboo (building material) is natural and repurposed for making t-shirts; polyester is an artificial and conventional material for t-shirts. Beyond hypothesizing that repurposed materials are more incongruent than conventional – possibly because of the number of processing steps needed to repurpose a material, we investigated underlying causes of incongruity. Existing research suggests that when evaluating an atypical product, consumers first tried to understand its function (Chitturi, Raghunathan, & Mahajan, 2007). Therefore, we proposed that consumers who fail to understand the material function, consider its use in products to be incongruent.

We thus predicted: (H1) repurposed materials are less congruent than conventional materials (all studies); (H2) an inverted u shape relation exists between incongruity and product evaluation (all studies); and (H3) incongruity is caused by lack of perceived functionality (Study 2 (exploratory), 3a and 3b (confirmatory)). Hypotheses, sample sizes and analysis plans were pre-registered on Open Science Framework before data collection (https://osf.io/w7c94/).

All studies were conducted online using Prolific. Different product categories and corresponding materials were used across studies (Study 1a: bags; 1b and 2: shoes; 3a and 3b: t-shirts). In Study 1a and 1b (N_{1a} = 165, N_{1b} = 161), each participant considered 8 products in a 2 (Natural: natural/artificial) x 2 (Repurpose: repurpose/convention) within-subject design, with two stimuli per condition to increase robustness. Participants first indicated how much they liked 8 products and 8 materials separately. Then 8 out of 64 possible combinations of product pictures with material information (e.g., "This backpack is made of pineapple leaves") were presented. Participants assessed per-ceived incongruity of the material and evaluated the product again. All scales ranged from 1 (not at all) to 100 (very much). Study 2 (N = 103) replicated Study 1b. Additionally, participants were asked to compare sturdiness of the materials for shoes; and how many steps it would take to prepare a material for use. Studies 3a and 3b (N_{1a} = 105, N_{1b} = 101) replicated Study 2 with different products (t-shirts), and instead of sturdiness, we included four t-shirt relevant functions (durable, soft, washable and breathable) for material comparisons.

We tested all hypotheses in Bayesian linear mixed models. If 95% credible intervals of slope coefficients do not include 0, we claim the corresponding effects exist. H1 was confirmed in all studies: repurposed materials were more incongruent than conventional (table 1).

To test inverted u shape relation between perceived incongruity and product evaluation (H2), we conducted interrupted linear regressions (Simonsohn, 2018). A breaking line separated the region from 1 (incongruity) to 100 (congruity) into two parts. The shape is an inverted u if on the left part the slope is positive, and on the right part the slope is negative. If the standard deviation of slopes is close to or includes 0, we claim that individual difference is too small to care (Miller & Schwarz, 2017). All studies showed a flat line (no relation) between perceived incongruity and product evaluation on both group level and individual level (table 2).

To examine whether lack of perceived functionality explained incongruity, we conducted mediation analysis on the effect of repurpose on incongruity. The results showed that in Study 2, the effect of repurpose on incongruity was mediated by lack of sturdiness (in shoes) (β = -6.81, 95%CI [-14.69, -0.91]), and in Study 3a and 3b, the effect was mediated by lack of softness (in t-shirts) (β_{3a} = -3.10, 95%CI [-7.02, -0.13]; β_{3b} = -3.50, 95%CI [-7.26, -0.73]). We considered the mediation effect from lack of perceived product relevant functionalities (sturdiness for shoes, softness for t-shirts) as strong evidence to confirm H3. Exploratory analysis showed processing steps of materials was also a mediator in Study 2 (β = -3.50, 95%CI [-8.07, -0.39]), but the effect did not replicate in Study 3a and 3b.

Two main findings stand out. First, repurposed materials were perceived more incongruent than conventional, and this can be explained by lack of perceived functionality. Marketers might counter this by emphasizing, for example, sturdiness of pineapple leaves bags. Second, no relation between incongruity and evaluation was found. This may imply the inverted u shape is not as strong as often assumed, or that incongruent stimuli for theory examination are class specific. Much previous research used products which are difficult to categorize, for example a low-price luxury car which fits either luxurious or low-price category. However, consumers may easily categorize bamboo t-shirts as t-shirts and nevertheless perceive incongruity because they consider bamboo as non-functional for t-shirt fabric. We recommend exploring potentially different classes of incongruity in the context of schema congruity theory.

REFERENCES

Alexander, D. L., Lynch Jr, J. G., & Wang, Q. (2008). As time goes by: Do cold feet follow warm intentions for really new versus incrementally new products? *Journal of Marketing Research*, *45*(3), 307–319.

Chitturi, R., Raghunathan, R., & Mahajan, V. (2007). Form versus function: How the intensities of specific emotions evoked in functional versus hedonic trade-offs mediate product preferences. *Journal of Marketing Research*, *44*(4), 702–714.

Jhang, J. H., Grant, S. J., & Campbell, M. C. (2012). Get It? Got It. Good! Enhancing New Product Acceptance by Facilitating Resolution of Extreme Incongruity. *Journal of Marketing Research*, *49*(2), 247–259. https://doi.org/10.1509/jmr.10.0428

Mandler, G. (1982). The Structure of Value: Accounting for Taste. *Affect and Cognition: The 17th Annual Carnegies Symposium on Cognition*, 3–36.

Meyers-Levy, J., & Tybout, A. M. (1989). Schema Congruity as a Basis for Product Evaluation. *Journal of Consumer Research*, *16*(1), 39. https://doi.org/10.1086/209192

Miller, J., & Schwarz, W. (2017). Implications of individual differences in on-average null effects. *Journal of Experimental Psychology: General*, *147*(3), 377–397. https://doi.org/10.1037/xge0000367

Noseworthy, T. J., Di Muro, F., & Murray, K. B. (2014). The Role of Arousal in Congruity-Based Product Evaluation. *Journal of Consumer Research*, *41*(4), 1108–1126. https://doi.org/10.1086/678301

Simonsohn, U. (2018). Two-Lines: A Valid Alternative to the Invalid Testing of U-Shaped Relationships with Quadratic Regressions. *Advances in Methods and Practices in Psychological Science*, *1*(4), 538–555. https://doi.org/10.2139/ssrn.3021690

Ladies First, Gentlemen Third! The Effect of Narrative Perspective on Medical Crowdfunding

Fei Gao, Bentley University, USA
Xitong Li, HEC Paris, France
Yuan Cheng, Tsinghua University, China
Yu (Jeffrey) Hu, Georgia Institute of Technology, USA

EXTENDED ABSTRACT

Medical crowdfunding becomes increasingly popular (Burtch and Chan 2018). However, many medical fundraising campaigns fail to get fully funded because they are not presented in an effective matter. Surprisingly, the first and perhaps the most important decision for crafting a medical crowdfunding campaign – which perspective (the first- vs. third-person perspective) should be used to narrate the campaign – has not yet been explored. The *first-person* perspective refers to the case where the fundraising campaign is narrated as a patient is raising funds for herself (e.g., "*Leukemia is going to take away my life! Please help me stay with my parents!*"), whereas the *third-person* perspective refers to the case where someone else (often a relative or friend of the patient) is raising funds for the patient (e.g., "*Leukemia is going to take away our daughter's life! Please help her stay with us!*").

In this study, by drawing upon multiple theories, we propose that the relative effectiveness of the first-person, compared to the third-person, perspective is contingent on patient gender of fundraising campaigns. On the one hand, social role literature suggests that men, compared to women, are perceived to be more competent and independent (Barbee et al. 1993), powerful and dominant (Vescio et al. 2005), and aggressive (Eagly and Steffen 1986). Therefore, a direct donation request from the first-person perspective by a *male* patient may cause psychological oppression on donors and thus lead donors to be reluctant to donate. By contrast, the third-person perspective imposes psychological distance between fundraisers and donors (Trope and Liberman 2010), which can alleviate the psychological oppression incurred by a male patient's direct donation request. Therefore, using the third-person perspective to narrate a male patient's fundraising campaign will be more effective than using the first-person perspective in motivating the public's donations.

On the other hand, compared to men, women are perceived to be more cooperative (Stockard et al.1988) and agreeable (Weisberg, DeYoung, and Hirsh 2011), and less powerful and dominant (Vescio et al. 2005). Thus, a direct donation request by *female* patient from the first-person perspective is less likely to induce pressure or uncomfortable feelings for donors. In fact, requesting a donation from the first-person perspective by female patient can draw closer the psychological distance between the fundraiser and the donors (Trope and Liberman 2010) and lead donors to have an internal experiencer perspective (Brunyé et al. 2009), thus strengthening donors' empathy toward the female patient. Thus, using the first-person perspective to narrate a female patient's fundraising campaign will be more effective than the third-person perspective in motivating the public's donations.

We test these propositions by first conducting a large-scale randomized field experiment on a leading medical crowdfunding platform in China, manipulating more than 1,000 fundraising campaigns and involving about 1.2 million potential donors. Our findings show that the effect of the narrative perspective on soliciting donations is indeed contingent on patient gender; that is, the third-person perspective is more effective in motivating donations for male-patient fundraising campaigns, whereas the first-person perspective is more effective for female-patient fundraising campaigns. Furthermore, we conduct a set of moderating analyses, and find that (i) the relative effectiveness of the first-person perspective, compared to the third-person perspective, increases when fundraising campaigns are for (male and female) child patients; (ii) the relative effectiveness of the first-person perspective, compared to the third-person perspective, decreases significantly for male visitors facing male-patient fundraising campaigns, but it increases significantly for male visitors facing female-patient fundraising campaigns; and (iii) for male-patient fundraising campaigns, the relative disadvantage of the first-person perspective is largely driven by the visitors with a small historical donation amount (or a relatively weak empathy trait). These findings consistently support our theorizing on the underlying mechanisms.

We then conduct an online behavioral experiment which aims to provide more *direct* evidence for the underlying mechanisms. The results show that (i) for the male-patient campaign, the relative advantage of the third-person perspective, compared to the first-person perspective, is driven by the lower level of psychological oppression, but it is not mediated by empathy; and (ii) for the female-patient campaign, the relative advantage of the first-person perspective, compared to the third-person perspective, is driven by the higher level of empathy, but it is not mediated by psychological oppression. The results enhance not only the internal validity of our main findings from the field experiment, but also the externality validity by showing that the findings can be generalizable to the western culture.

Our research makes two important contributions to the literature. On the one hand, we contribute to the literature on charitable donations and medical crowdfunding by exploring how narrative perspective could influence potential donors' donation behaviors. We show that an adjustment of the narrative perspective (the first- vs. third-person perspective) based on patient gender can significantly affect the effectiveness of a fundraising campaign. To the best of our knowledge, none of prior studies has examined the effect of narrative perspective on soliciting donations in the context of medical crowdfunding. On the other hand, we contribute to the literature on prosocial behavior and gender by providing both field and laboratory experimental evidence that a direct donation request from the first-person perspective for a male recipient may cause greater psychological oppression on donors than an indirect donation request from the third-person perspective, thereby resulting in less donations, and a direct donation request from the first-person perspective by a female recipient may induce a greater empathy than an indirect donation request from the third-person perspective, thus leading to more donations.

REFERENCCES

Barbee, Anita P., Michael R. Cunningham, Barbara A. Winstead, Valerian J. Derlega, Mary R. Gulley, Pamela A. Yankeelov, and Perri B. Druen (1993), "Effects of Gender Role Expectations on the Social Support Process," *Journal of Social Issues*, 49 (3), 175–190.

Brunyé, Tad T., Tali Ditman, Caroline R. Mahoney, Jason S. Augustyn, and Holly A. Taylor (2009), "When You and I Share Perspectives: Pronouns Modulate Perspective Taking During Narrative Comprehension," *Psychological Science* 20 (1), 27–32.

Burtch Gordan and Jason Chan (2019), "Investigating the Relationship Between Medical Crowdfunding and Personal Bankruptcy in the United States: Evidence of a Digital Divide," *MIS Quarterly*, 43 (1), 237–262.

Eagly Alice H. and Valerie J. Steffen (1986), "Gender and Aggressive Behavior: A Meta-Analytic Review of the Social Psychological Literature," *Psychological Bulletin*, 100(3), 309–330.

Stockard Jean, Alphons J. C. van de Kragt, and Patricia J. Dodge (1988), "Gender Roles and Behavior in Social Dilemmas: Are There Sex Differences in Cooperation and in Its Justification?" Social Psychology Quarterly, 51(2),154–163.

Trope Yaacov and Nira Liberman (2010), "Construal-Level Theory of Psychological Distance," *Psychological Review*, 117 (2), 440–436.

Vescio, Theresa. K., Sarah J. Gervais, Mark Snyder, and Ann Hoover (2005), "Power and the Creation of Patronizing Environments: The Stereotype-Based Behaviors of the Powerful and Their Effects on Female Performance in Masculine Domains," *Journal of Personality and Social Psychology*, 88(4), 658–672.

Weisberg, Yanna J., Colin G. DeYoung, and Jacob B. Hirsh (2011), "Gender Differences in Personality Across the Ten Aspects of the Big Five," *Frontiers in Psychology*, 2, 178.

The Joint Effects of Status and Power Distance Belief on Consumer Preference for Cuteness

Huachao Gao, University of Victoria, Canada
Dengfeng Yan, NYU Shanghai, China

EXTENDED ABSTRACT

Cute products are pervasive and represent a huge market (Mc-Grath 2015). Previous research has largely focused on the consequences of consuming cute products, including indulgent consumption (Nenkov and Scott 2014), careful behavior (Glocker et al. 2009), and retention decisions (Jia, Pol, and Park 2016). This research examines the antecedents of cute product preferences based on social status and the cultural value of power distance belief (PDB), which refers to an individual's expectance and acceptance of social inequality (Oyserman 2006).

Following Lorenz's (1943) definition of *Kindchenschema*, including features such as a high forehead, large eyes, large cheeks, and a small nose, we define cute products as those that have babyish features, representing human babies or baby animals (Hellén and Sääksjärvi 2013). Previous research has found that cute products may signal innocence, weakness, and needs to be taken care of (Hellén and Sääksjärvi 2013). Nenkov and Scott (2014) noted that *Kindchenschema* cute products are associated with naiveté and vulnerability, which in turn triggers caretaking motivations. Along the same line, Jia, Pol, and Park (2016) found that cute-looking products elicit caretaking behaviors, increasing consumers' product retention.

According to signaling theory, products can symbolize owners' personal traits/beliefs (Belk 1988). Following this logic, we propose that consuming cute (vs. non-cute) products will signal to others that the consumers are more vulnerable, naïve, and weak. We then propose that consumers who have stronger need for protection, or require others' attention and help in achieving important goals, tend to prefer cute products. Then, under what conditions consumers may have stronger need for protection.

According to the PDB literature, for high-PDBs, status differences should be accepted and respected (Han, Lalwani, and Duhachek 2017; Wang, Torelli, and Lalwani 2020; Winterich, Gangwar, and Grewal 2018; Winterich and Zhang 2014). Thus, those with low status tend to demonstrate their absolute obedience (Atwater et al. 2009) and behave submissively (Gao, Winterich, and Zhang 2016). Under this culture, low-status individuals find it impossible to get anything done without their superiors' helps. As Lian, Ferris, and Brown (2012) pointed out, the ability to catch superiors' attention and elicit their willingness to offer helps is critical for high-PDB-low-status individuals. In contrast, high-PDB-high-status individuals are motivated to demonstrate their absolute power and control over others (Zhang, Winterich, and Mittal 2010). Any sign of help- or protection-seeking will be regarded as weak and incompetence (Lian, Ferris, and Brown 2012). Thus, we propose that high-PDB-low-status consumers have stronger need for protection than high-PDB-high-status consumers.

As low PDB consumers believe inequality and social hierarchy are illegitimate, their behaviors are not significantly impacted by their relative social status (Atwater et al. 2009). As such, we argue that their need for protection is not as high as high-PDB-low-status consumers, and not as low as high-PDB-high-status consumers. In other words, for low PDB consumers, regardless of their relative status, their need for protection is medium or between high-PDB-low-status and high-PDB-high-status consumers'. Combining the above analysis, we propose an interactive effect of PDB and social status

on cute (vs. noncute) products. Furthermore, we propose need for protection as the mediator.

Four studies were conducted to test the above theorizing. Study 1 was a field study, in which we measured consumers' PDB (Yoo, Donthuy, and Lenartowicz 2011) and manipulated their relative social status. Then, we observed their actual purchases between cute versus non-cute car accessories. The results showed that among chronically high-PDB consumers, those of low (vs. high) status were more likely to purchase cute car accessories. In contrast, among chronically low-PDB consumers, there was no such a difference.

Study 2 was a 2 (PDB: high vs. low) × 2 (status: high vs. low) between-subjects design. We first manipulated PDB (Zhang, Winterich, and Mittal 2010) and social status (Anderson et al. 2012). Then, we showed participants one cute versus one non-cute speaker, and asked for their purchase intention. Next, we measured need for protection (Goff et al. 2014). The results not only supported the interactive effect of PDB and social status on purchase intention for cute products, but also supported need for protection as the mediator.

Study 3 tests high psychological security as a boundary condition for the proposed effect. Specifically, if consumers have high psychological security, they will have very low need for protection, regardless of their PDB and social status. It was a 2 (PDB: high vs. low) × 2 (social status: high vs. low) × 2 (psychological security: high vs. low) between-subjects design. We first manipulated PDB and social status. Next, we manipulated psychological-security by offering participants either a one-year versus life-long contract. Then, participants indicated their preferences between one cute versus one non-cute keychain. The results showed that the interactive effect of PDB and social status was replicated in the low psychological security condition, but attenuated in the high psychological security condition.

Study 4 tests locus-of-control as another moderator. Specifically, consumers with internal (vs. external) locus-of-control should have lower need for protection given they believe in themselves. It was a 2 (PDB: high vs. low) × 2 (status: high vs. low) × 2 (locus-of-control: measured) mixed design. We first manipulated PDB and status Next, participants encountered one cute and non-cute air purifiers, and indicated their preferences. Then, we measured locus-of-control (Burroughs and Mick 2004). The results showed that the interactive effect of PDB and status was replicated among externals, but attenuated among internals.

This research first contributes to the cute-product design literature by identifying PDB and social status as important antecedents of consumers' preference for cute over non-cute products. Second, it indicates that social status has a broader impact on consumer decision making, even for products that are seemingly unrelated to status. Third, we extend the PDB literature by introducing the concept into a new research filed and identifying need for protection as a new mechanism through which PDB exerts its effect. Lastly, by testing the moderating roles of psychological security and locus-of-control, we further extend our understanding of the joint effect of PDB and social status on preference for cute versus non-cute products.

REFERENCES

Anderson, Cameron, Michael W. Kraus, Adam D. Galinsky, and Dacher Keltner (2012), "The Local-Ladder Effect: Social Status and Subject Well-Being," *Psychological Science*, 23(7), 764-71.

Atwater, Leanne, Mo Wang, James W. Smither, and John W. Fleenor (2009), "Are Cultural Characteristics Associated With the Relationship Between Self and Others' Ratings of Leadership?" *Journal of Applied Psychology*, 94 (4), 876-86.

Belk, Russell W. (1988), "Possessions and the Extended Self," *Journal of Consumer Research*, 15(2), 139-68.

Burroughs, James and David Glen Mick (2004), "Exploring Antecedents and Consequences of Consumer Creativity in a Problem-Solving Context," *Journal of Consumer Research*, 31(2), 402-11.

Gao, Huachao, Karen Page Winterich, and Yinlong Zhang (2016), "All That Glitters is Not Gold: How Others' Status Influences the Effect of Power Distance Belief on Status Consumption," *Journal of Consumer Research*, 43(2), 265-81.

Glocker, Melanie L., Daniel D. Langleben, Kisha Ruparel, James W. Loughead, Rubem C. Gur, and Nobert Sachser (2009), "Baby Schema in Infant Faces Induces Cuteness Perception and Motivation for Caretaking in Adults," *Ethology*, 115(3), 256-63.

Goff, Phillip A., Matthew C. Jackson, Brook A.L. Di Leone, Carmen M. Culotta, and Natalie, A. Ditomasso (2014), "The Essence of Innocence: Consequences of Dehumanizing Black Children," *Journal of Personality and Social Psychology*, 106(4), 526-45.

Han, Dahee, Ashok K. Lalwani, and Adam Duhachek (2017), "Power Distance Belief, Power, and Charitable Giving," *Journal of Consumer Research*, 44 (1), 182-95.

Hellén, Katarina and Maria Sääksjärvi (2013), "Development of a Scale Measuring Childlike Anthropomorphism in Products," *Journal of Marketing Management*, 29(1-2), 141-57.

Jia, Michael He, Gratiana Pol, and C. Whan Park (2016), "I'll Keep the Cuddly One: Effects of Visual Cuteness versus Elegance on Product Retention," working paper.

Lian, Huiwen, D. Lance Ferris, and Douglas J. Brown (2012), "Does Power Distance Exacerbate or Mitigate the Effects of Abusive Supervision? It Depends on the Outcome," *Journal of Applied Psychology*, 97(1), 107-23.

Lorenz, K. (1943), "Die angeborenen Formen moglicher Erfahrung," *Zeitschrift fur Tierpsychologie*, 5, 245–409.

McGrath, Maggie (2015), "The Frozen Effect Persists: Disney Revenue Grows 7% In Fiscal 2015," *Forbes*, Nov. 5.

Nenkov, Gergana Y. and Maura L. Scott (2014), "So Cute I Could Eat It Up": Priming Effects of Cute Products on Indulgent Consumption," *Journal of Consumer Research*, 42(2), 326-41.

Oyserman, Daphna (2006), "High Power, Low Power, and Equality: Culture Beyond, Individualism and Collectivism," *Journal of Consumer Psychology*, 16(4), 352-56.

Wang, Jessie J., Carlos J. Torelli, and Ashok K. Lalwani (2020), "The Interactive Effect of Power Distance Belief and Consumers' Status on Preference for National (vs. Private-Label) Brands," *Journal of Business Research*, 107 (3), 1-12.

Winterich, Karen Page, Manish Gangwar, and Rajdeep Grewal (2018), "When Celebrities Count: Power Distance Beliefs and Celebrity Endorsements," Journal of Marketing, 82 (3), 70-86.

Winterich, Karen Page and Yinlong Zhang (2014), "Accepting Inequality Deters Responsibility: How Power Distance Decreases Charitable Behavior," Journal of Consumer Research, 41 (2), 274-93.

Yoo, Boonghee, Naveen Donthu, and Tomasz Lenartowicz (2011), "Measuring Hofstede's Five Dimensions of Cultural Values at the Individual Level: Development and Validation of CVSCALE," *Journal of International Consumer Marketing*, 23 (3/4), 193-210.

Zhang, Yinlong, Karen P. Winterich, and Vikas Mittal (2010), "Power Distance Belief and Impulsive Buying," *Journal of Marketing Research*, 47(5), 945-54.

How Experiences of Freedom Foster Consumer Happiness? A Distinction Between "Freedom to" and "Freedom from" Experiences of Consumption

Charlotte Gaston-Breton, ESCP Business School, Spain
Elin Brandi Sørensen, University of Southern Denmark, Denmark
Thyra Uth Thomsen, Copenhagen Business School, Denmark

EXTENDED ABSTRACT

In many societies today, a personal feeling of freedom is a valued experience, but how many people miss out on it because they are caught up in the activities of modern life? This could include the feeling of being entrapped in the duties and activities of work and family, even if someone really loves his or her job and is truly devoted to family. Despite this, how many people do not try to find ways, through consumption, to help them feel free from the pace of life, at least for a short time, or to reconnect with themselves? People's efforts to provide themselves with experiences of freedom through consumption can also be regarded as attempts to make themselves happier.

Consumer behavior literature traditionally investigates freedom in consumption through the concept of "freedom of choice" (see Markus & Schwartz, 2010). Still, little is known about experiences of freedom versus conditions of freedom, and thus there is a need to shed light on the positive and negative aspects of freedom in consumption. As the philosopher Erich Fromm (1941) discussed, "Freedom From" (FF), or negative freedom, is the absence of something (i.e. of obstacles, barriers, constraints or interference from others) whereas "Freedom To" (FT), or positive freedom, is the presence of something (i.e., of control, self-mastery, self-determination or self-realization). This mechanism echoes the prevention/ promotion theory of regulatory focus (Higgins, 1998) and, in consumer research, those concepts have been indirectly studied considering consumption either as an escape from the structures of everyday life (Cova, Carù, & Cayla, 2018) or as the form of free access to fluid identity construction (Belk, 1988). Against this backdrop, we wonder how these FF and FT notions of freedom in consumption are represented and are linked to consumer happiness.

Fueled by the classic work of Van Boven and Gilovich (2003), a large stream of research has investigated the impact of experiences of consumption on happiness. In general, studies show that the type of good (e.g., experiential vs. material; Gilovich, Kumar, & Jampol, 2015) but also the nature of the experience (e.g., ordinary vs. extraordinary; Bhattacharjee & Mogilner, 2014) influence consumer happiness. These findings are often criticized, however. The measure of consumer happiness is indeed commonly limited to the hedonic, pleasure-based form of happiness (e.g., Etkin & Mogilner, 2016; Guevarra & Howell, 2015) but it is now widely acknowledged that the eudaimonic, meaning-based form of happiness is also an important and distinct aspect of well-being, in general (Huta & Waterman, 2014; Ryan & Deci, 2001) and of consumer happiness, in particular (Schmitt, Brakus & Zarantonello, 2015; Sääksjärvi, Hellén, & Desmet, 2016). To cover this gap, we investigate how experiences of FF and FT achieved through consumption (both immaterial and material) affect the hedonic and eudaimonic dimensions of happiness.

Our research addresses three questions: How are experiences of freedom in the consumption realm linked to consumer happiness? What are the characteristics of such experiences of freedom? and How do experiences of FF influence consumer happiness, especially in comparison with FT? We conducted a qualitative study, a semantic analysis and an experiment to answer respectively each question.

Study 1. To explore consumers' own meanings of experiences of freedom and their relationships with happiness, we conducted a multi-sensory sculpting (MSS) study, which is a projective technique that taps into embodied consumer knowledge (Von Wallpach & Kreuzer, 2013). We organized two MSS workshops with a mixed-gender postgraduate student population (N = 32). Each participant was asked to build a sculpture from a toolkit containing building materials of different shapes, colors, textures, smells, and sounds. The sculpting process was initiated with the following prompt: "Using the materials you find on the table, build a sculpture that represents your experience with the consumption of a product or service that brings you happiness." Next, we interviewed participants from a semi-structured guide. The participants built sculptures representing happiness that related to the consumption of both objects (e.g., a sweater, a store, ice cream) and activities (e.g., yoga, a bus ride, surfing, manicure). We recorded the interviews and analyzed the transcripts, approximately 60 pages, by means of a "hermeneutic circle," including going back and forth between interpreting the parts based on an understanding of the whole (Thompson, Pollio, & Locander, 1994) both intra-textually (i.e., within one sculpting interview) and inter-textually (i.e., comparing themes emerging from one sculpting interview with themes from other sculpting interviews).

Analysis of the MSS interviews shows that both dimensions of hedonic and eudaimonic consumer happiness were related to the concept of freedom, which surfaced repeatedly in our analysis. In the 32 interviews, the words freedom or being free were mentioned directly 21 times. However, the concept of freedom was represented much more often indirectly, for example when the accounts echoed the conceptual difference between FF (e.g. escaping from worry) and FT (e.g. becoming whatever you want to be). For example, FF surfaced in Jenny's description of the sculptured Disney brand as follows: *"For me I think it is kind of an escape. For me even though I am 20 years old I can still go and watch a Disney movie. It makes me not have to worry about what's going on in the real world. Everything is just perfect in those two hours. It is just nice to have a little escape like a little paradise. [...] you can just kind of let go of all your worries…".* In terms of FT, Jim described his sculpture of an island as a "sweet and warm" children's wonderland, with the island representing a place and time in life in which everything is possible: *"Maybe because of the freedom when you can think whatever you want to be and you feel the freedom like in your life that you can achieve anything you want to. So this kind of freedom brings me the achievements that can be done in my life and it feels good."* The wonderland clearly illustrates the breadth of self-development options available (FT).

Study 2. To shed further light on the differences between experiences of FF and FT in the consumption realm, we replicated the methodological approach Bhattacharjee and Mogilner (2014) used to distinguish the different ways consumption can be experienced. We recruited a sample of 95 Amazon Mechanical Turk participants (aged 19–65 years; *M* = 38; 53% female) and we randomly assigned them to situations in which they recalled a consumption experience that was either an FF or an FT. Given the findings of the MSS study, the instructions intended to place some participants in the FF condition read: "Please bring to mind an experience with the consumption of a product, a brand, or a service encounter that makes you feel free from worries and allows you to escape from routine." The instructions that

placed the other participants in the FT condition read: "Please bring to mind an experience with the consumption of a product, a brand, or a service encounter that makes you feel free to be yourself and allows you to reconnect with your true self." Subsequently, we asked participants in both conditions to choose three keywords representing the "essence of that experience."

After discarding irrelevant accounts as well as those directly related to the instructions given, we finally analyzed 84 quotes and 205 keywords. Although each participant's recalled experience of consumption was unique, three independent coders agreed on the distribution of those 205 keywords into 10 broad categories. Among them, the most reported categories are peacefulness (27.8%), invigoration (14.6%), happiness (11.7%), satisfaction (8.8%), playing (8.3%), social connection (5.4%) or health (2.9%). Scrutinizing the categories of keywords in more detail, we find that their relative frequencies differ by condition ($\chi^2(9) = 17.6$, $p < .05$), which supports the notion that consumers in the FF condition experience consumption differently from how consumers in the FT condition experience consumption. More specifically, a z-test shows that differences are significant for the keyword categories of "invigoration," "social connection," and "health" (respectively, $z = 3.33$; $z = 2.27$; $z = 2.27$; $p < .10$). We find that the condition of FT is associated to "invigoration" as this refers to an inner state that may arise from seeking self-actualization through consumption choices. For example, one participant explained how the consumption of coffee boosts the potential for achievement.

Study 3. We tested the following hypotheses: "FF experiences of consumption lead to greater hedonic happiness than FT experiences" (H1) and "FT experiences of consumption lead to greater eudaimonic happiness than FF experiences" (H2). We recruited a sample of 90 individuals (aged 20–63 years; $M = 37$; 56% female) from Amazon Mechanical Turk to participate in the study. Respondents were assigned to either FF or FT conditions as instructed in study 2. After describing their experience, participants indicated how much it contributed to their happiness in life (Van Boven & Gilovich, 2003) on one item: "How much do you think that this type of experience contributes to your happiness in life?". They also reported the contribution of their recalled experience to hedonic and eudaimonic happiness on, respectively, the scale of affect (four-item index; e.g., "This type of experience makes me feel in a good mood"; $\alpha = .866$) and the scale of meaning (four-item index; e.g., "This type of experience makes me feel life has a purpose"; $\alpha = .926$) used by Hepper et al. (2012).

The manipulation checks confirm that respondents were correctly assigned to FF condition ($F(1, 88) = 5.17$, $p = .02$) and FT condition ($F(1, 88) = 4.18$, $p = .06$). Both dimensions of happiness are related to general happiness ($F(1, 89) = 27.25$, $p = .000$), but the manipulation of the nature of the experience recalled (FF vs. FT) has a different influence on the hedonic and eudaimonic dimensions of happiness. Participants in the FF condition were more likely to report greater hedonic happiness than those in the FT condition ($M_{FF} = 6.46 > M_{FT} = 6.02$; $F(1, 88) = 4.22$, $p < .05$), in support of H1. Alternatively, participants in the FT condition were more likely to report greater eudaimonic happiness than those in the FF condition ($M_{FT} = 4.65 > M_{FF} = 4.10$; $F(1, 88) = 2.72$, $p < .10$), in support of H2.

This research shows the existence, meaning, and role of FF and FT in regulating consumer happiness in two ways: experiences of FF foster more hedonic than eudaimonic happiness, while experiences of FT foster more eudaimonic happiness than hedonic happiness. Table 1 proposes a summary of the findings of each study. Our research contributes theoretically to the transformative consumer research agenda (Crockett et al., 2013) and adds to the stream of

research related to the regulatory functions of the marketplace on individual well-being (Machin et al., 2019). Managerially, we identify a typology of experiences that can strengthen either an affective or meaningful relationship with customers and consequently increase customer loyalty (Askoy et al. 2015). We also informs consumers, who often fail to choose situations that maximize their happiness because they cannot identify those that make them happy (Hsee & Hastie, 2006), about routes to happiness.

REFERENCES

Askoy, L., Keiningham, T. L., Buoye, A., Larivière, B., Williams, L., & Wilson, I. (2015). Does loyalty span domains? Examining the relationship between consumer loyalty, other loyalties and happiness. *Journal of Business Research, 68*(12), 2464-2476.

Belk, R. W. (1988). Possessions and the extended self. *Journal of Consumer Research*, *15*(2), 139–168.

Bhattacharjee, A., & Mogilner, C. (2014). Happiness from ordinary and extraordinary experiences. *Journal of Consumer Research*, *41*(1), 1–16.

Cova, B., Carù, A., & Cayla, J. (2018). Re-conceptualizing escape in consumer research. *Qualitative Market Research: An International Journal*, *21*(4), 445-464.

Crockett, D., Downey, H., Fırat, A. F., Ozanne, J., & Pettigrew, S. (2013). Conceptualizing a transformative research agenda. *Journal of Business Research, 66*(8), 1171-1178.

Etkin, J., & Mogilner, C. (2016). Does variety among activities increase happiness? *Journal of Consumer Research*, *43*(2), 210–229.

Fromm, E. (1941). *Escape from freedom*. New York: Henry Holt & Co.

Gilovich, T., Kumar, A., & Jampol, L. (2015). A wonderful life: Experiential consumption and the pursuit of happiness. *Journal of Consumer Psychology*, *25*(1), 152–165.

Guevarra, D. A., & Howell, R. T. (2015). To have in order to do: Exploring the effects of consuming experiential products on well-being. *Journal of Consumer Psychology*, *25*(1), 28-41.

Hepper, E. G., Ritchie, T. D., Sedikides, C., & Wildschut, T. (2012). Odyssey's end: Lay conceptions of nostalgia reflect its original homeric meaning. *Emotion*, *12*(1), 102-119.

Higgins, E.T. (1998). Promotion and prevention: Regulatory focus as a motivational principle. *Advances in Experimental Social Psychology*, 20, 1-46.

Hsee, C. K., & Hastie, R. (2006). Decision and experience: Why don't we choose what makes us happy?. *Trends in Cognitive Sciences*, *10*(1), 31-37.

Huta, V., & Waterman, A. S. (2014). Eudaimonia and its distinction from hedonia: Developing a classification and terminology for understanding conceptual and operational definitions. *Journal of Happiness Studies*, *15*(6), 1425-1456.

Machin, J. E., Adkins, N. R., Crosby, E., Farrell, J. R., & Mirabito, A. M. (2019). The marketplace, mental well-being, and me: Exploring self-efficacy, self-esteem, and self-compassion in consumer coping. *Journal of Business Research*, *100*, 410-420.

Markus, H. R., & Schwartz, B. (2010). Does choice mean freedom and well-being?. *Journal of Consumer Research*, *37*(2), 344-355.

Mogilner, C., Aaker, J., & Kamvar, S. D. (2012). How happiness affects choice. *Journal of Consumer Research*, *39*(2), 429–443

Ryan, R., & Deci, E. (2001). On happiness and human potentials: A review of research on hedonic and eudaimonic well-being. *Annual Review of Psychology*, *52*, 141–66.

Sääksjärvi, M., Hellén, K., & Desmet, P. (2016). The effects of the experience recommendation on short-and long-term happiness. *Marketing Letters*, *27*(4), 675-686.

Schmitt, B., Brakus, J. J., & Zarantonello, L. (2015). From experiential psychology to consumer experience. *Journal of Consumer Psychology*, *25*(1), 166–171.

Thompson, C. J., Pollio, H. R., & Locander, W. B. (1994). The spoken and the unspoken: A hermeneutic approach to understanding the cultural viewpoints that underlie consumers' expressed meanings. *Journal of Consumer Research*, *21*(3), 432–452.

Van Boven, L., & Gilovich, T. (2003). To do or to have? That is the question. *Journal of Personality and Social Psychology*, *85*(6), 1193–1202.

Von Wallpach, S., & Kreuzer, M. (2013). Multi-sensory sculpting (MSS): Eliciting embodied brand knowledge via multi-sensory metaphors. *Journal of Business Research*, *66*(9), 1325–1331.

Any Item, Only $10! When and Why Same-Price Promotions Can Reduce Regret and the Pain of Paying

Shirin Gatter, University of Hohenheim, Germany
Verena Hüttl-Maack, University of Hohenheim, Germany

EXTENDED ABSTRACT

Lately, practitioners have increasingly used a type of promotion that has not been researched until now, a price promotion characterized by an assortment of products that are all reduced to the same price ("same-price promotions," SPP). Examples include clearance sales where clothing items are reduced to a uniform price. Previous research on choice overload found that product assortments can overwhelm consumers (Iyengar and Lepper 2000). This can elicit regret (Chernev, Böckenholt, and Goodman 2015; Schwartz 2000), characterized by the perception that money was misspent and that alternative choices would have been better (Zeelenberg et al. 2002). Reducing regret is important for marketers because it influences repurchasing and complaint intentions (e.g., Tsiros and Mittal 2000). We hypothesized that choice overload and regret were less likely to be elicited by SPPs. If prices are uniform, people think less about them, which is likely to reduce the subjective monetary sacrifice (Bornemann and Homburg 2011), also termed the pain of paying (PoP; Prelec and Loewenstein 1998). Courty and Nasiry (2018) explained this by a reduced risk to pay too much. Bertini and Wathieu (2010) assumed that people instead focus on their preferences. In addition, when people face promotions with differentiated prices (DPP), they might experience anticipated loss when considering buying expensive products and gains when considering cheaper products. Losses outweigh gains (Kahneman and Tversky 1979), and consequently, DPP might enhance the attention to monetary losses. SPP should consequently reduce PoP and therefore also regret. A boundary condition might apply when products are labelled as remaining stock. This might trigger people to fixate on prices and elicit the wish to obtain bargains, which is less achievable if no cheaper options are available. We further expected that if no original prices were provided, the attractiveness of a SPP could not be assessed while a uniform percentage reduction gives an informational advantage and would therefore enhance the attractiveness and reduce regret compared to the SPP.

The voluntary participants in our four online studies were told to imagine that they had thought about purchasing the respective product and had come upon the offers. The prices in the DPPs on average corresponded to the prices in the SPPs. Participants indicated whether they wanted to make a choice, and if so, clicked on the product(s). Only if participants made a choice, their data were further analyzed (between 81% and 96% among the studies) because anticipated regret could not be meaningfully interpreted without a choice. The percentages of participants choosing a product did not vary significantly between the conditions.

Study 1 used a one-factorial design with two conditions (DPP vs. SPP) ($N = 83$). The choice set consisted of six lawn mowers. The anticipated regret was measured with a single item ("I think I would not regret my choice," recoded so that high values represented high regret; Inbar, Botti, and Hanko 2011). In the case of the SPP, the participants were less likely to assume that they would regret their choice ($M_{DPP} = 3.03$, $M_{SPP} = 2.42$, $F(1, 81) = 4.23$, $p = .043$).

Study 2 applied two conditions (DPP vs. SPP) ($N = 154$). Participants were guided to an online shop mock-up offering ten mixers. The statement to assess PoP read: "In this decision, how would you have felt with regard to spending money?" The answering scale consisted of smiley-face images (1-*looked very sad*/7-*looked very happy*, recoded so that high values represented high pain; Thomas, Desai, and Seenivasan 2011). In the case of the SPP, the participants were less likely to assume that they would regret their choice ($M_{DPP} = 2.83$, $M_{SPP} = 2.09$, $F(1, 152) = 13.67$, $p < .001$) and perceived lower PoP ($M_{DPP} = 3.17$, $M_{SPP} = 2.30$, $F(1, 152) = 17.84$, $p < .001$). The regret-reducing effect of SPP was fully mediated by a reduced PoP (PROCESS, Hayes, 2018, IE = –.41, CI: [–.64, –.21]).

Study 3 used a 2 (promotion: DPP vs. SPP) × 2 (labelling: none vs. "remaining stock") factorial design ($N = 131$). People were guided to an online shop mock-up with an assortment of six coffee machines. A large red sign stating "remaining item" was used as labelling. The interaction between the type of price promotion and labelling was significant ($F(1, 127) = 5.29$, $p = .023$), while labelling ($p = .062$) and type of promotion ($p = .667$) were not significant. With remaining stock labelling, the participants assumed higher levels of expected regret of their choice in the SPP condition ($M_{DPP} = 2.43$, $M_{SPP} = 3.00$); without such labelling, they assumed that they would regret their choice less in the case of the SPP ($M_{DPP} = 2.52$, $M_{SPP} = 2.13$).

Study 4 used a 2 (promotion: 20%-discount vs. SPP) × 2 (provision of original prices: no vs. yes) experimental design ($N = 131$). The choice sets consisted of 12 pullovers for women. The assortment attractiveness was assessed with three items (e.g., "The choice set is…," 1-*not at all appealing*/7-*very appealing*, α = .923). Only the interactions between the type of price promotion and the presence of original prices on regret ($F(1, 126) = 6.09$, $p = .015$) and assortment attractiveness, ($F(1, 123) = 7.89$, $p = .006$) were significant (all others, $p > .361$). In the case where original prices were absent, promotions with a uniform percentage discount caused lower regret than the SPP ($M_{20\%} = 3.09$, $M_{SP} = 3.77$) and a higher perceived assortment attractiveness ($M_{20\%} = 4.60$, $M_{SPP} = 3.88$), while the opposite pattern was shown when the original prices were depicted (regret: $M_{20\%} = 3.50$, $M_{SPP} = 2.91$; assortment attractiveness $M_{20\%} = 3.69$, $M_{SPP} = 4.34$). The effect on reduced regret was mediated by assortment attractiveness (IE = –.58, CI: [–1.19, –.15]).

Our research builds on the literature regarding choice overload, uniform pricing, and choice regret. We demonstrated that SPPs can reduce choice regret and that this was mediated by PoP and perceived assortment attractiveness. However, regret was not reduced if a cue contested the attractiveness of the assortment or when no original prices were depicted.

REFERENCES

Bertini, Marco and Luc Wathieu (2010), "How to Stop Customers From Fixating on Price," *Harvard Business Review*, 88 (5), 85–91.

Bornemann, Torsten and Christian Homburg (2011), "Psychological Distance and the Dual Role of Price," *Journal of Consumer Research*, 38 (3), 490–504.

Courty, Pascal, and Javad Nasiry (2018), "Loss Aversion and the Uniform Pricing Puzzle for Media and Entertainment Products," *Economic Theory*, 66 (1), 105–40.

Chernev, Alexander, Ulf Böckenholt, and Joseph Goodman (2015), "Choice Overload: A Conceptual Review and Meta-Analysis," *Journal of Consumer Psychology*, 25 (2), 333–58.

Hayes, Andrew F. (2018), *Introduction to Mediation, Moderation, and Conditional Process Analysis: A Regression-Based Approach*, New York, NY: Guilford.

Inbar, Yoel, Simona Botti, and Karlene Hanko (2011), "Decision Speed and Choice Regret: When Haste Feels Like Waste," *Journal of Experimental Social Psychology*, 47 (3), 533-540.

Iyengar, Sheena S., and Mark R. Lepper (2000), "When Choice is Demotivating: Can One Desire Too Much of a Good Thing?" *Journal of Personality and Social Psychology*, 79 (6), 995–1006.

Kahneman, Daniel, and Amos Tversky (1979), "Prospect Theory: An Analysis of Decision Under Risk," *Econometrica*, 47, 263–91.

Prelec, Drazen and George Loewenstein (1998), "The Red and the Black: Mental Accounting of Savings and Debt," *Marketing Science*, 17 (1), 4–28.

Schwartz, Barry (2000), "Self-Determination: The Tyranny of Freedom," *American Psychologist*, 55 (1), 79–88.

Thomas, Manoj, Kalpesh Kaushik Desai, and Satheeshkumar Seenivasan (2011), "How Credit Card Payments Increase Unhealthy Food Purchases: Visceral Regulation of Vices," *Journal of Consumer Research*, 38 (1), 126–39.

Tsiros, Michael, and Vikas Mittal (2000), "Regret: A Model of Its Antecedents and Consequences in Consumer Decision Making," *Journal of Consumer Research*, 26 (4), 401–17.

Zeelenberg, Marcel, Kees van den Bos, Eric van Dijk, and Rik Pieters (2002), "The Inaction Effect in the Psychology of Regret," *Journal of Personality and Social Psychology*, 82 (3), 314–27.

Corporate Social Responsibility Information Dilutes Brand Positioning

Tarje Gaustad, Kristiania University College, Norway
Jakob Utgård, Kristiania University College, Norway

EXTENDED ABSTRACT

The current research investigates the consequences of communicating CSR-activities on consumers' price expectations for a given brand. The results of three studies show that CSR information increases price expectations for low price image brands and decreases price expectations for high price image brands.

The current paper investigates unintended consequences of communicating CSR- activities on consumers price expectations for a given brand. We study how the relationship between CSR and consumers' price expectations is influenced by a brand's existing price image - whether the brand is perceived as low-cost or a premium priced luxury brand. We propose that for low price image brands, CSR information increase quality perceptions and thereby also price expectations (Chernev & Blair 2015). For price image brands, however, CSR information signal social consciousness and thereby decrease price expectations (Torelli, Monga, & Kaikati 2012). Consequently, corporate social responsibility information may dilute brand positioning for both low-cost and luxury positioned brands.

THEORY AND HYPOTHESES DEVELOPMENT

Price image is the general belief about the overall level of prices that consumers associate with a retailer or brand. Price image is not related to the evaluation of a single price or a set of prices but the overall impression of the aggregate price level (Hamilton & Chernev 2013). In the current research, we apply the term price image to describe the general impression of whether a brand is expensive or inexpensive. Particularly, we investigate how consumers respond to communication of CSR initiatives from low-cost positioned brands (low price image) and highly priced, luxury brands (high price image), respectively.

Research has shown that information about CSR initiatives can enhance company reputation and create goodwill among customers (Sen, Du, & Bhattacharya 2016).

Interestingly, CSR information has also been shown to influence consumers' product quality judgements directly (Chernev & Blair 2015). This occurs because consumers tend to interpret engagement in CSR activities as a signal of the brand's moral values (Chernev & Blair 2015).

For low price image brands, we believe that the effect of CSR as a quality signal is particularly strong. Low price image brands typically are perceived to be pushing margins and for going to great lengths to reduce cost, and then also sometimes compromise quality. By engaging in CSR activities, low price image brands signal that they have a social consciousness and that they do not only care about reducing cost. This is a signal that they can be trusted in terms of delivering sufficient quality. Hence, for a low price image brand, we expect information about CSR initiatives to increase price expectations.

High price image brands, however, are generally expected to be of high quality. Engaging in CSR activities does not increase quality perceptions even further. Torelli, Monga, and Kaikati (2012) have demonstrated that communicating the CSR actions of a luxury brand causes a decline in brand attitude ratings. This happens because a luxury brand's self-enhancement concept (i.e., dominance over people and resources) conflicts with the CSR information's self-transcendence concept (i.e., protecting the welfare of all), which causes disfluency and thereby a decline in brand attitude. Extending from

this, we suggest that CSR information from a high price image brand signals social consciousness, that the brand is not only about self-enhancement, but also cares about others. We posit that this, in turn, decrease price expectations as a pro-social brand is not expected to push margins too extremely. We apply the term *brand halo* to describe the goodwill endowed to a brand due to the perception of its social consciousness.

Summary of hypotheses:

Hypothesis 1:   *Information about CSR initiatives (vs. no CSR information) from a low price image brand increases price expectations*

Hypothesis 2:   *For low price image brands, the effect of information about CSR initiatives (vs. no CSR information) on price expectations is mediated through perceived quality*

Hypothesis 3:   *Information about CSR initiatives (vs. no CSR information) from a high price image brand decreases price expectations*

Hypothesis 4:   *For high price image brands, the effect of information about CSR initiatives (vs. no CSR information) on price expectations is mediated through brand halo*

Study 1

We conducted a 2 (CSR: no information vs. information) ☐ 2 (Price Image: low vs. high) experiment. The data was collected on Qualtrics' online panel with American participants (n = 734), as a filler task in another, unrelated study.

Procedure

Participants read a short text about Pure Jeans (fictitious), a European brand soon to be launched on the US market. The text was designed to manipulate price image. Excerpt from the manipulation: "(Pure Jeans) today holds an inimitable position in the sphere of low-cost but trendy jeans *(vs. trend inspired fashion)*. Pure Jeans offers more affordable jeans to the price-conscious consumer *(vs. upscale jeans to the sophisticated high-end consumer)*."

CSR information was manipulated by including (vs. not including) information about Pure Jeans bearing the responsibility to provide an economically sound, safe, fair and ethical working environment for all the people who are involved in the manufacture of their jeans.

After reading the information about Pure Jeans, participants answered the dependent variable, price expectation. Price expectation was measured with both a direct price estimate

("If you were to guess, how much would you say a pair of Pure Jeans will cost on the US market?") and a scale of expected relative price level (three items like "I expect Pure Jeans' prices to be," on a 1-7 scale, where 1 = Low and 7 = High).

Results

The result showed an interaction between CSR information and price image on price expectation (direct price estimate) ($F(1, 730)$ = 21.67, $p < .01$). In the low price image condition, there was a sig-

nificant positive effect of CSR information ($p < .05$). That is, when initial price image was low, those who received CSR information expected the prices of Pure Jeans to be higher (MCSR = $ 50.07) than those who did not get any CSR information (MNOCSR = $ 41.48). In the high price image condition, there was a negative effect of CSR information ($p < .01$). When price image was high, those who received CSR information expected prices of Pure Jeans to be lower (MCSR = $ 71.42) than those who did not get any CSR information (MNOCSR = $ 91.41). The pattern of results was the same, and also significant, when the index of expected relative price was used as the dependent measure ($F(1, 732) = 29.65$, $p < .01$).

Discussion

The result of Study 1 support the prediction that CSR information from a low price image brand increases price expectations, while the same information from a high price image brand decreases price expectations.

Study 2

Study 2 was designed to replicate the results in another context (wine store) and to test the hypothesis that perceived product quality mediate the effects. The data was collected on Prolific's online panel with American respondents (n = 403).

Procedure

The general experimental set-up was similar to that of Study 1. First, we collected a measure of subjective wine knowledge. Next, participants read about a fictitious wine store (Cellar Maison). The text manipulated price image (low vs. high) and CSR information (filler information vs. CSR information) and described the house wine of Cellar Maison. The participants were randomly assigned to the experimental conditions. Excerpt from the price image manipulation: Cellar Maison is a new chain that specializes in affordable *(fine)* wines to the price-conscious *(sophisticated high-end)* consumer. Excerpt from the CSR information manipulation: Cellar Maison use the most innovative techniques available to manufacture their wines and create value for their customers and stakeholders *(improve energy efficiency, water conservation and packaging, and take all measures available to avoid waste and pollution).*

Next, participants evaluated price expectation and perceived product quality for the store's most popular private label wine. Price expectations was measured similarly as in Study 1, while perceived quality was measured with three items adapted from Sweeney and Soutar (2001) and Habel et al. (2016) ("The Cellar Maison has/is..."1-7 scale, where 1 = Very poor quality/Inferior/Poorly made and 7 = Very high quality/Superior/Well made). Last, we administered a test of objective wine knowledge (Robson, Plangger, Campbell, & Pitt 2014).

Results

We used bootstrapping to test our predictions in a mediated-moderation model (model 8, Hayes 2013). The pattern of results was the same both with and without subjective and objective wine knowledge as covariates.

The results showed an interaction between CSR information and price image on perceived quality ($b = - .65$, $t(399) = - 3.32$, $p < .01$). As expected, perceived quality had a positive effect on price expectations - both for the direct price estimate ($b = 11.04$, $t(394) = 5.39$, $p < .01$) and the index of relative price expectation ($b = .55$, $t(399) = 11.04$, $p < .01$).

Analysis of the full mediated-moderation model showed that the effect of CSR on price expectations was mediated through perceived quality when price image was low (direct price estimate: $b = 5.07$, CI 95%: 2.01 to 9.27; index of relative price expectation:

$b =.25$, CI 95%:.10 to .44). When price image was high, the conditional indirect effect was not significant (direct price estimate: $b = - 2.28$, CI 95%: - 5.60 to .68; index of relative price expectation: $b= - .10$, CI 95%: - .25 to .05).

Discussion

Study 2 support the prediction that quality perceptions mediates the effect of CSR information on price expectations in the low, but not the high, price image condition.

Study 3

We conducted a 2 (CSR: no information vs. information) x 2 (Price Image: low vs. high) experiment, including measures of perceived quality and brand halo, as well as other potentially alternative processes (CSR price markup and luxury associations). In this study, we used a restaurant as the context. The data was collected on MTurk with American participants (n = 400).

Procedure

The general procedure was similar to the previous studies. First, participants read about a fictitious restaurant (Giuliana Ristorante). The text manipulated price image (low vs. high) and CSR information (filler information vs. CSR information). The participants were randomly assigned to the experimental conditions. Excerpt from the price image manipulation: Our low-key *(fashionable)* Italian ristorante, features a mouthwatering variety of inexpensive *(specialty)* pies made with the freshest local ingredients (…). Giuliana Ristorante isn't your average ristorante; it's delicious value for money dining *(fine dining)*.

Excerpt from the CSR information manipulation: Giuliana Ristorante is committed to operate in a professional manner *(responsible and sustainable manner)*. They use the most innovative techniques available to create value for their customers and stakeholders *(improve energy efficiency, water conservation, and take all measures available to avoid waste and pollution)*.

Next, participants evaluated price expectation and the process measures (counterbalanced). Price expectations and perceived quality was measured with the same scales as in the previous studies. Brand halo was measured with seven items adapted from Foreh and Grier (2003) ("Giuliana Ristorante is…" Bad-Good/Unhelpful-Helpful/Unlikable-   Likeable/Insincere-Sincere/Untrustworthy-Trustworty/No at all involved in community-Very involved in community/Doesn't care about customers-Cares very much about customers).

Luxury associations was measured with scales assessing how descriptive different luxury associations (premium, upscale, luxury, prestige, sophisticated, exclusive, and glamorous) was of Giuliana Ristorante. CSR price markup was measured with three items based on Habel et al. (2016) (e.g., "I think Giuliana Ristorante has included its corporate social responsibility activities into its prices). All the measures were on 1-7 scales.

Results

We used bootstrapping to test our predictions in a mediated-moderation model (model 8, Hayes 2013). We included CSR information and price image as independent variables, and perceived quality and brand halo as mediations variables, and price expectation as the dependent variable. CSR price markup and luxury associations was included as covariates.

The results showed that the interaction between CSR information and price image was significant on brand halo ($b = .41$, $t(394) = 2.10$, $p < .4$) but not on perceived quality ($b = -.21$, $t(394) = - 1.25$, $p = .21$). As expected, the effect on price expectations was positive for

perceived quality (b = .32 , t(392) = 5.25, p < .01) and negative for brand halo (b = - .44, t(392) = - 8.45, p < .01).

Analysis of the full mediated-moderation model showed that the effect of CSR on price expectations was positively mediated through perceived quality when price image was low (b= .09, CI 95%: .02 to .19), but not when price image was high (CI 95%: - .05 to .12). Furthermore, the effect of CSR on price expectations was negatively mediated through brand halo when price image was high (b = - .28, CI 95%: - .43 to - .14), but not when price image was low (CI 95%: - .23 to .02).

Analyses of the alternative process measures showed no effects of luxury associations, neither when we tested the interaction between CSR information and price image on luxury associations (p = .79) nor when luxury associations was included as a mediator in the full mediated-moderation model (CI 95%: - .23 to .18). There was, however, an interaction between CSR information and price image on CSR price markup (b = .70, t(400) = 2.58, p <.02). The effect was such that CSR information increased perceived price markup in both price image conditions (Low price image: b = .13, t(395) = 6.90, p < .01; High price image: b= .20, t(395) = 10.50, p < .01). This pattern was also present when CSR price markup was included as a mediator in the full mediated-moderation model (CI 95%: .23 to .23). Hence, even though CSR price markup influences price expectations, it does not explain the diverging results between price image conditions.

Discussion

Study 3 support the prediction that perceived quality positively mediates the effect of CSR information in the low price image condition, while brand halo negatively mediates this effect in the high price image condition. These effects are prevalent even when controlling for luxury associations and CSR price markup.

General Discussion

In three studies we have found that CSR information influences price expectations. The results show that CSR information increases price expectations for low price image brands and decreases price expectations for high price image brands. These effects are mediated through perceived quality and brand halo, for low and high price image brands respectively.

These results demonstrate intriguing adverse consequences of communicating CSR initiatives. CSR information can dilute brand positioning. Albeit the positive influence of CSR information on quality perceptions for low price image brands, an increase in price expectations moves the brand away from a low-end positioning. For high-end positioned brands, our results allude that CSR information might decrease quality perceptions and move the brand away from a high-end positioning. For both low and high price image brands, CSR information moves price perceptions towards the middle, which might not be a good place to be stuck.

REFERENCES

Chernev, A., & Blair, S. (2015). Doing well by doing good: The benevolent halo of corporate social responsibility. *Journal of Consumer Research*, *41*(6), 1412-1425.

Foreh, M. R., & Grier, S. (2003). When is honesty the best policy? The effect of stated company intent on consumer skepticism. *Journal of Consumer Pychology*, *13*(3), 349-356.

Habel, J., Schons, L. M., Alavi, S., & Wieseke, J. (2016). Warm glow or extra charge? The ambivalent effect of corporate social responsibility activities on customers' perceived price fairness. *Journal of Marketing*, *80*(1), 84-105.

Hamilton, R., & Chernev, A. (2013). Low prices are just the beginning: Price image in retail management. *Journal of Marketing*, 77(6), 1-20.

Hayes, A. F. (2017). *Introduction to mediation, moderation, and conditional process analysis: A regression-based approach*. Guilford Publications.

Robson, K., Plangger, K. A., Campbell, C. L., & Pitt, L. F. (2014, June). Objective and subjective wine knowledge: evidence from an online study. In *Proceedings of the 8th international conference of the academy of wine business research*.

Sen, S., Du, S., & Bhattacharya, C. B. (2016). Corporate social responsibility: a consumer psychology perspective. *Current Opinion in Psychology*, 10, 70-75.

Sweeney, J. C., & Soutar, G. N. (2001). Consumer perceived value: The development of a multiple item scale. *Journal of Retailing*, *77*(2), 203-220.

Torelli, C. J., Monga, A. B., & Kaikati, A. M. (2012). Doing poorly by doing good: Corporate social responsibility and brand concepts. *Journal of Consumer Research*, 38(5), 948-963.

Offering Initial Evidence of a Choice-Removal Effect

Brian Gillespie, University of New Mexico, USA
William Ryall Carroll, St. John's University, USA
Christian Otto, Backcountry.com

EXTENDED ABSTRACT

Consumers are often presented with consideration sets in which they are required to simultaneously compare multiple options before making a choice (Hsee et al., 1999). In response, consumers make comparative judgments of individual option attributes against an average of all option attributes in a series of weighted evaluations (Bhargava, Kim, & Srivastava, 2000). Furthermore, extant research has indicated that as choice sets vary, these averaged attribute evaluations, but not the weighted importance of the attributes themselves, may also change. This is relevant to the current research as the systematic removal of options is often combined with these weighted evaluations in an effort to simplify decisions, minimize choice overload, and optimize choice outcomes (Kahn et al., 1987; Marcus & Schwartz, 2010; Schrift et al., 2011; Tversky & Sattath, 1979). This is intuitively reasonable as simplifying decisions by removing undesirable options could minimize negative choice effects, increase decision process ease, maximize positive outcomes, and result in increased satisfaction with the final choice.

We argue that the opposite is likely, and propose a choice-removal effect through which removing an option (or thinking about which option would be removed) instantaneously shifts or removes traditional choice motivations (e.g., value maximization, risk aversion, need for uniqueness), while not influencing attribute evaluations themselves.

We offer a series of studies examining these motivational shifts through observed differences in individuals' choice selections, and demonstrate a robust choice-removal effect that often leads to sub-optimal decisions. In study 1 we consider shifts in value maximizing motivations by asking participants to select an option from a choice set containing different gambles. In study 2 we consider shifts in another established choice motivation, namely need for uniqueness (Tian, Bearden, & Hunter, 2001). Studies 1 and 2 therefore provide a proof of concept for this choice-removal effect across two different choice based scenarios, and offer evidence that this process indeed removes or shifts choices away from traditional motivations. It also appears to be an instantaneous effect, as the removal of an option was immediately followed by a final choice. Study 2 also demonstrates that choice-removal is a mental process (potentially involving framing), as simply thinking about which choice they would remove led individuals to make choices similar to those who actually removed an option.

In studies 3, 4, and 5, we explore the internal processes associated with choice-removal before offering boundary conditions in which removing options does not influence final choices. Studies 3 and 4 demonstrate that the choice-removal effect is an internal process specifically centered on the *removal* of an option by the individual. Specifically, the choice-removal effect does not occur when the option is "randomly" removed for the individual (study 3). The effect also does not occur when the individual selects options from the initial choice set to keep (vs. selecting options to remove) (study 4). These studies also demonstrate that results cannot be explained by a choice set reduction, as individuals who had a choice removed for them and those who selected options to keep made final choice decisions in-line with those who did not minimize the choice set. In study 5 we consider the effect of the initial choice set size, and demonstrate that the choice-removal effect abates as the choice set size increases. Specifically, while we replicate the choice-removal effect with an initial choice set of three or four options, the effect does not exist when the initial choice consists of five, seven, nine, or eleven options.

Collectively, we introduce and repeatedly demonstrate a choice-removal effect in which the removal of an option from an initial choice set influences the ultimate choice selected. This effect appears to shift or remove traditional choice-based motivations (e.g., risk aversion, value maximization, need for uniqueness), and encourages sub-optimal decisions and evaluations. Interestingly, the choice-removal effect occurs when the choice set is minimized by removing (or thinks about removing) an undesirable option, but not when desirable options are kept, or when an option is removed by an outside source (e.g., "random" removal). The effect also appears to subsides as the initial choice set increases, though this result requires further consideration. Finally, removing an option before making a final choice appears to have little impact on decision process ease, though we observed more instances in which choice removal increased difficulty in making a final decision.

While continued examinations are warranted, we believe that implications for consumers and consumer welfare are many. The most important of which is to evaluate entire choice sets when making decisions. If, however, consumers decide to engage in choice-removal, they should avoid mental remove, as mental removal of an option results in lower levels of satisfaction with the final choice.

Manuscript

Consumers are often presented with consideration sets in which they are required to simultaneously compare multiple options before making a choice (Hsee et al., 1999). In response, consumers make comparative judgments of individual option attributes against an average of all option attributes in a series of weighted evaluations (Bhargava, Kim, & Srivastava, 2000). Furthermore, extant research has indicated that as choice sets vary, these averaged attribute evaluations, but not the weighted importance of the attributes themselves, may also change. This is relevant to the current research as the systematic removal of options is often combined with these weighted evaluations in an effort to simplify decisions, minimize choice overload, and optimize choice outcomes (Kahn et al., 1987; Marcus & Schwartz, 2010; Schrift et al., 2011; Tversky & Sattath, 1979). This is intuitively reasonable as simplifying decisions by removing undesirable options could minimize negative choice effects, increase decision process ease, maximize positive outcomes, and result in increased satisfaction with the final choice.

We argue that the opposite is likely, and propose a choice-removal effect through which removing an option (or thinking about which option would be removed) instantaneously shifts or removes traditional choice motivations (e.g., value maximization, risk aversion, need for uniqueness), while not influencing attribute evaluations themselves.

We offer a series of studies examining these motivational shifts through observed differences in individuals' choice selections, and demonstrate a robust choice-removal effect that often leads to sub-optimal decisions. In study 1 we considered shifts in value maximizing motivations by asking participants to select an option from a choice set containing different gambles. In study 2 we consider shifts

in another established choice motivation, namely need for uniqueness (Tian, Bearden, & Hunter, 2001). And, along with studies 3, 4, and 5, we explore the internal processes associated with choice-removal before offering boundary conditions in which removing options does or does not influence final choices.

All studies were conducted using online panels (e.g., Prolific, Mechanical Turk). Participants in studies 1a, 1b, 1c, and 1d were asked to choose between gambles that varied in probability of winning and payout amounts. Study 1a was a $100 gamble [73% chance of winning $146], [42% chance of winning $254], [11% chance of winning $969], all with the same expected payout of $106. Study 1b was a $5 gamble [75% chance of winning $15], [25% chance of winning $40], [25% chance of winning $35] with balanced expected payouts of $11.25, $10.00, and $8.75, respectively. Study 1c was a $5 gamble [78% chance of winning $12], [28% chance of winning $33], [23% chance of winning $30] with unbalanced expected payouts of $9.36, $9.24, and $6.90, respectively. Study 1d was a larger $100 gamble [78% chance of winning $197], [28% chance of winning $516], [23% chance of winning $507] with expected payouts of $153.66, $144.48, and $116.61, respectively. In the control condition respondents were asked to make a choice between the three alternatives. In the removal condition respondents were asked to make a choice between the same set of alternatives, but to eliminate a gamble before making a final choice between the remaining two options. The option order was randomized to avoid any order effects.

Chi-square analyses demonstrated that participants in the control conditions optimized their choice by selecting the least risky option with the highest expected payout. Participants in the removal condition were most likely to identify and remove the least optimal option, but were on average twice as likely to select a more risky choice with a smaller expected payout (study 1a: $\chi^2 (2) = 6.94$, $p < .05$; study 1b: $\chi^2 (2) = 33.99$, $p < .001$; study 1c: $\chi^2 (2) = 20.09$, $p < .001$; study 1d: $\chi^2 (2) = 5.73$, $p = .05$), see table 1. In addition, participants reported removing an option made the decision process more easy in study 1a ($F(1,312) = 6.52$, $p < .05$), more difficult in study 1b ($F(1,313) = 4.05$, $p < .05$), and no difference in decision process ease in studies 1c or 1d ($ps > .25$).

In studies 2a and 2b participants from an online panel were asked to imagine they were shopping for an apartment. The choice set consisted of three options and each apartment included a list of features. The features of one apartment were unique relative to the other two options. The other two apartments included identical lists of features, but the features were listed in different orders. In study 2b the description of the unique option from study 2a became the identical option, while the description of the identical option from study 2a became the description of the unique option in study 2b. This was done to control for potential apartment preference effects.

The removal conditions described in study 1 were used in study 2, but a third condition was added in which participants were asked to mentally remove (i.e., think about which option they would remove) an apartment from the choice set before selecting from the complete set of three options. Measures of respondents' attitudes toward their final selection were also included and the option order was again randomized to avoid any order effects. We expected that a need for uniqueness would drive individuals in the control condition to select the house with unique features (Simonson & Nowlis, 2000). For those in the removal conditions, however, we expected that actual or mental removal of a house from consideration would also remove need for uniqueness as a motivator of choice.

Results of study 2a and 2b demonstrated that actual or mental removal of an option made participants more likely to shift their choice from the unique option to the similar options (study 3a: $\chi^2 (4)$ = 169.01, $p < .001$; study 3b: $\chi^2 (4) = 22.46$, $p < .001$), see table 3. Moreover, mentally removing an option that was still available when making the final choice resulted in less favorable evaluations (study 3a: $M = 4.69$; study 3b: $M = 5.78$) than either not removing an option (study 2a: $M = 5.29$; study 2b: $M = 6.04$) or actually removing an option (study 2a: $M = 5.18$, $F(2, 665) = 10.38$, $p < .001$; study 2b: $M = 6.04$, $F(2, 665) = 5.08$, $p < .01$). There was no difference in participants' reported decision process ease (study 2a: $p > .90$; study 2b: $p > .50$).

Studies 1 and 2 therefore provide a proof of concept for this choice-removal effect across two different choice based scenarios, and offers evidence that this process removes or shifts choices away from traditional motivations. It also appears to be an instantaneous effect, as the removal of an option was immediately followed by a final choice. Finally, study 2 demonstrates that choice-removal is a mental process (potentially involving framing), as simply thinking about which choice they would remove led individuals to make choices similar to those who actually removed an option.

Participants in studies 3a and 3b were members of an online panel asked to make a choice using the same gamble choice set described in study 1d, a $100 gamble [78% chance of winning $197], [28% chance of winning $516], [23% chance of winning $507] with expected payouts of $153.66, $144.48, and $116.61, respectively. The two choice conditions described in study 1 were used in study 3, but a third condition was added in which the participants were told that prior to their choice, one option would be "randomly" removed. In study 3a the "randomly" removed gamble was the 23% chance of winning $507 with and expected payout of $116.61. This gamble was demonstrated to be the least desirable option in study 1d, and "randomly" removing it for the participants allowed us to consider the degree to which the removal process played a role in final choices. In study 3b the removed gamble was the gamble with a 78% chance of winning $197 with and expected payout of $153.66. This gamble was demonstrated to be the most desirable option in study 1d.

Results again demonstrated a choice-removal effect (study 3a: $\chi^2 (4) = 25.74$, $p < .001$; study 3b: $\chi^2 (4) = 166.87$, $p < .001$), see table 2. Results also replicated those found in study 1 such that individuals who removed an option prior to making their selection were more likely to ultimately choose a more risky gamble than participants who did not remove an option (study 3a: $\chi^2 (2) = 18.05$, $p < .001$; study 3b: $\chi^2 (2) = 20.17$, $p < .001$). In study 3a, however, individuals who had the least appealing option removed for them were just as likely to select the least risky option as those who did not remove an option before making a choice ($\chi^2 (2) = 3.47$, $p = .18$). Removing an option had no effect on decision process ease in study 3a ($p > .23$), but a significant effect on decision process ease existed in study 3b such that individuals who removed an option prior to making a final choice reported making a final choice was more difficult ($M = 5.21$) than individuals who did not remove an option prior to making a choice ($M = 5.55$) or had the most desirable option removed for them ($M = 5.76$; $F(2, 305) = 3.91$, $p < .05$). A significant effect of condition on attitudes toward the chosen option was also observed (study 3a: $F(2, 311) = 6.03$, $p < .01$; study 3b: $F(2, 305) = 26.93$, $p < .001$). Linear contrasts in study 3a indicated that individuals who had the least favorable option removed for them evaluated their chosen bet more favorably ($M = 5.67$) than individuals who removed an option before making a final choice ($M = 5.38$) and individuals who did not have an option removed before making a choice ($M = 5.03$; $F(1, 311) = 12.01$, $p < .001$). Linear contrasts in study 3b indicated that individuals who had the most favorable option removed for them evaluated their chosen bet less favorably ($M = 4.29$) than individuals who

removed an option before making a final choice ($M = 5.39$), while individuals who did not have an option removed before making a choice reported the most favorable attitudes toward their choice ($M = 5.74$; $F(1, 305) = 49.16$, $p < .001$).

Participants in study 4 were exposed to the same apartment choice set described in study 2, but we replaced the mental removal condition with a third condition in which we asked participants to select two options they would like to choose from (keep condition) as part of their final choice set. In doing this, we were able to 1) manipulate participants' motivation by either focusing on the best choice (keeping desirable options) or the worst choice (removing undesirable options), and 2) further isolate the removal process from any possible choice effects derived from having a smaller final choice set. Results offered further support for the choice removal effect ($\chi^2(4) = 11.64$, $p < .05$), see table 4, and demonstrated a significant difference in choice between those in the removal condition, and those in the keep condition ($\chi^2(2) = 7.97$, $p < .05$). Importantly, there was no difference in choice between the control condition and the keep condition ($\chi^2(2) = .17$, $p = .92$). There were also no differences in attitudes toward the final choice ($p = .83$) or in difficulty making the decision ($p = .17$).

Collectively, Studies 3 and 4 demonstrate that the choice-removal effect is an internal process centered on the removal of an option. These studies also demonstrate that results cannot be explained by a choice set reduction, as individuals who had a choice removed for them and those who selected two options to keep made final choice decisions in-line with those who did not minimize the choice set.

In study 5 we used the gamble scenario presented in study 1 to consider the effect of choice set size. Specifically, study 5a included three options, study 5b included four options, and studies 5c, 5d, 5e, and 5f included 5, 7, 9, and 11 option choice sets, respectively. Results indicated that the choice-removal effect existed for the three and four option choice sets (study 5a: $\chi^2(2) = 12.57$, $p < .01$; study 5b: $\chi^2(2) = 19.20$, $p < .001$). The effect was not demonstrated in the larger choice sets (all $ps > .05$), however, suggesting that the choice-removal effect is also a function of the size of the choice set.

Across these five studies we introduce and repeatedly demonstrate a choice-removal effect in which the removal of a choice from a larger choice set influences the final choice made. This effect appears to shift or remove traditional choice-based motivations (e.g., risk aversion, value maximization, need for uniqueness), and encourages sub-optimal decisions and evaluations. Interestingly, the choice-removal effect occurs when the choice set is minimized by removing (or thinks about removing) an undesirable option, but not when desirable options are kept, or when an option is removed for them. The effect also appears to abate as the initial choice set increases, though this result requires more consideration. Finally, removing an option before making a final choice appears to have little impact on decision process ease, though we observed more instances in which choice removal increased difficulty in making a final decision.

While continued examinations are warranted, we believe that implications for consumers and consumer welfare are many. The most important of which is to evaluate entire choice sets when making decisions. If, however, consumers decide to engage in choice-removal, they should avoid mental remove, as mental removal of an option results in lower levels of satisfaction with the final choice.

REFERENCES

Bhargava, Mukesh, John Kim, and Rajendra K. Srivastava (2000), Explaining Context Effects on Choice Using a Model of Comparative Judgement," *Journal of Consumer Psychology,* 9(3), 167-177.

Hsee, Christopher K., George F. Loewenstein, Sally Blount, and Max H. Bazerman (1999), "Preference Reversals Between Joint and Separate Evaluations of Options: A Review and Theoretical Analysis," *Psychological Bulletin,* 125(5), 576-590.

Kahn, Barbara, William L. Moore, and Rashi Glazer (1987), "Experiments in Constrained Choice," *Journal of Consumer Research,* 14(June), 96-113.

Markus, Hazel Rose, and Barry Schwartz (2010), "Does Choice Mean Freedom and Well-Being?" *Journal of Consumer Research,* 37(August), 344-355.

Schrift, Rom Y., Oded Netzer, and Ran Kivetz (2011), "Complicating Choice," *Journal of Marketing Research,* 48(April), 308-326.

Simonson, Itamar and Stephen M. Nowlis (2000), "The Role of Explanations and Need for Uniqueness in Consumer Decision Making: Unconventional Choices Based on Reasons," *Journal of Consumer Research,* 27(June), 49-68.

Tian, Kelly Tepper, William O. Bearden, and Gary L. Hunter (2001), "Consumers' Need for Uniqueness: Scale Development and Validation," *Journal of Consumer Research,* 28(June), 50-66.

Tversky, Amos and Shmuel Sattath (1979), "Preference Trees," *Psychological Review,* 86(6), 542-573.

Can't Catch a Break: When Working During Time Off Undermines Intrinsic Motivation

Laura M. Giurge, London Business School, UK
Kaitlin Woolley, Cornell University, USA

EXTENDED ABSTRACT

Goal pursuit has fundamentally changed. In previous decades, the five-day work week provided consumers a standard for when to pursue professional versus personal goals, with benefits for well-being (Young and Melin 2019). Today, 30% of full-time employees are working weekends and holidays (American Time Use Survey, 2018). How do perceptions of when consumers pursue professional goals affect how interesting and meaningful those goal pursuits are (i.e. intrinsic motivation)?

Research on self-perception (Bem 1967; de Charms 1968) and busyness (Hsee, Yang, and Wang 2010) would suggest that professional goal pursuit during non-standard work time (weekends and holidays) increases intrinsic motivation by leading people to infer that their goal pursuits are meaningful or that they are busy and productive.

However, we predict that working during non-standard work time *reduces* intrinsic motivation. Our prediction is grounded in work showing that consumers rely on socially constructed time-use norms to make sense of time (Feldman, Reid, and Mazmanian 2019; Aeon, Giurge, and Whillans 2020). People label Monday as the "true" start of the week (Davydenko and Peetz 2019) and are more motivated to achieve their goals on the first day of the week (Dai, Milkman, and Riis, 2014). Deviations from these norms can lead to discomfort and suboptimal behavior. Starting a work task at a non-standard (4:07pm) versus standard time (4:00pm) undermines work performance (Labianca, Moon, and Watt 2005) and tightly scheduled intervals of time lead consumers to engage in easier and less extensive tasks (Tonietto, Malkoc, and Nowlis, 2018). Thus, engaging in professional goal pursuits during non-standard work time could create goal conflict, reducing intrinsic motivation.

As an initial test of our prediction, we examined full-time employees responding to the 2002 National Study of the Changing Workforce (NSCW) survey (n = 1,298, M_{age} = 41.80, SD = 11.25; 48.2% female). We categorized "non-standard work-time" as working some weekend days, and "standard work-time" as working only Monday-Friday. Intrinsic motivation included items that emphasized work as providing meaning, developing skills, feeling good about oneself, and task autonomy (α = .72; Grant 2008; Woolley and Fishbach 2018). We found that working non-standard (vs. standard) work time decreased intrinsic motivation (B = -.22, t(296) = -5.31, p < .001), even when controlling for other factors such as, life satisfaction, income, and work hours.

To provide a causal test of this effect, we conducted a pre-registered experiment. We randomly assigned 123 US students studying on campus during a federal holiday (65% female, M_{age} = 20.68, SD = 2.14) to one of two conditions. In the standard work time condition, participants read: "Today is February 17th." In the non-standard work time condition, participants read: "Today is February 17th, President's Day. Presidents' Day is a state holiday celebrated on the 3rd Monday of February when many people have off from work." Intrinsic motivation captured how much students found their materials to be interesting, enjoyable, engaging, and fun (α = .86; McAuley, Duncan, and Tammen, 1989). Participants in the non-standard work time condition reported lower intrinsic motivation (M = 3.70) than those in the standard work time condition (M = 4.31; t(121) = -2.80, p = .006, d = -.50).

In Study 3 we used a within-subject design, surveying the same people working during non-standard (Sunday) and standard (Tuesday) work time. A total of 271 participants completed both surveys (43.2% female, M_{age} = 40.31, SD = 13.04). Aside from intrinsic motivation (α_{Sunday} = .85; $\alpha_{Tuesday}$ = .89), we also assessed our mechanism by capturing how much conflict participants felt between wanting to pursue their professional versus their personal goals. Participants reported lower intrinsic motivation on Sunday (M = 4.71) than on Tuesday (M = 4.86; t(270)= -2.17, p = .031, d = -.13), and experienced greater goal conflict (M_{Sunday} = 3.27; $M_{Tuesday}$ = 3.03; t(270) = 2.14, p = .034, d = .13). The indirect path via goal conflict was significant (B = .02, 95% CI = [.002, .06]), with no significant direct effect (95% CI = [-.02, .26]) nor mediation in the opposite direction (95% CI = [-.07, .00]). Thus, working on a Sunday (vs. Tuesday) undermined intrinsic motivation via greater goal conflict.

Studies 4a-4b tested an intervention designed to attenuate goal conflict by modifying perceived time-use norms. In both studies, we reminded all participants that they were working during non-standard work time and randomly assigned them to two conditions (baseline vs. intervention). The intervention instructed participants to reframe non-standard work time as time to catch up/get ahead with work.

In Study 4a, we recruited 71 undergraduate and graduate students working at a campus library during the university's spring break holiday (64.8% female, M_{age} = 22.94, SD = 7.06). The intervention increased intrinsic motivation, ($M_{intervention}$ = 4.89; $M_{baseline}$ = 4.06; t(69) = 2.37, p = .021, d = .56).

In Study 4b, we recruited 180 participants on MTurk on a Saturday (64.8% female, M_{age} = 22.94, SD = 7.06). We included a behavioral measure to examine a real consequence of the effect of time-use on intrinsic motivation: whether people choose to complete a higher paying "work task" or a lower paying "fun task." The intervention increased intrinsic motivation ($M_{intervention}$ = 4.81; $M_{baseline}$ = 4.25; t(179) = 2.53, p = .012, d = .38) and the likelihood to choose a work task (intervention: 34.4% vs. baseline: 16.5%), χ^2(1, 181) = 7.70, p = .006, ϕ = -.21.

This research is the first to suggest that beyond what your professional goals are, when you pursue these goals determines intrinsic motivation. The implications of this research are meaningful: the removal of temporal boundaries around goal pursuit has implications not only for well-being, but also for motivation.

REFERENCES

Aeon, Brad, Laura M. Giurge, and Ashley W. Whillans. (2020). "Toward a Theory of Subjective Time." In *Proceedings of the Eightieth Annual Meeting of the Academy of Management*, edited by Guclu Atinc.

"American Time Use Survey." (2018). Washington, DC: U.S. Bureau of Labor Statistics.

Bem, D. J. (1967). "Self-Perception: An Alternative Interpretation of Cognitive Dissonance Phenomena." *Psychological Review* 74 (3): 183–200. https://doi.org/10.1037/h0024835.

Charms, R. de. (1968). *Personal Causation*. New York, NY, US: Academic Press.

Dai, Hengchen, Katherine L. Milkman, and Jason Riis. (2014). "The Fresh Start Effect: Temporal Landmarks Motivate Aspirational Behavior." *Management Science* 60 (10): 2563–82. https://doi.org/10.1287/mnsc.2014.1901.

Davydenko, Mariya, and Johanna Peetz. (2019). "Does It Matter If a Week Starts on Monday or Sunday? How Calendar Format Can Boost Goal Motivation." *Journal of Experimental Social Psychology* 82: 13–15. https://doi.org/10.1016/j.jesp.2019.02.005.

Feldman, Elana, M. Erin Reid, and Melissa Mazmanian. (2019). "Signs of Our Time: Time-Use as Dedication, Performance, Identity, and Power in Contemporary Workplaces." *Academy of Management Annals*.

Grant, Adam M. (2008). "Does Intrinsic Motivation Fuel the Prosocial Fire? Motivational Synergy in Predicting Persistence, Performance, and Productivity." *Journal of Applied Psychology* 93 (1): 48–58. https://doi.org/10.1037/0021-9010.93.1.48.

Heath, Chip. (1999). "On the Social Psychology of Agency Relationships: Lay Theories of Motivation Overemphasize Extrinsic Incentives." *Organizational Behavior and Human Decision Processes* 78 (1): 25–62.

Hennecke, Marie, and Benjamin A. Converse. (2017). "Next Week, Next Month, Next Year: How Perceived Temporal Boundaries Affect Initiation Expectations." *Social Psychological and Personality Science* 8 (8): 918–26. https://doi.org/10.1177/1948550617691099.

Hsee, Christopher K, Adelle X Yang, and Liangyan Wang. (2010). "Idleness Aversion and the Need for Justifiable Busyness." *Psychological Science* 21 (7): 926–30.

Labianca, Giuseppe, Henry Moon, and Ian Watt. (2005). "When Is an Hour Not 60 Minutes? Deadlines, Temporal Schemata, and Individual and Task Group Performance." *The Academy of Management Journal* 48 (4): 677–94.

McAuley, E., T. Duncan, and V. V., Tammen. (1989). "Psychometric Properties of the Intrinsic Motivation Inventory in a Competitive Sport Setting: A Confirmatory Factor Analysis." *Research Quarterly For Exercise And Sport* 60 (1): 48–58.

Tonietto, Gabriela N, Selin A Malkoc, and Stephen M Nowlis. (2018). "When an Hour Feels Shorter: Future Boundary Tasks Alter Consumption by Contracting Time." *Journal of Consumer Research* 0 (May): 1–18. https://doi.org/10.1093/jcr/ucy043.

Vallerand, Robert J. (1997). "Toward a Hierarchical Model of Intrinsic and Extrinsic Motivation." In *Advances in Experimental Social Psychology*, 29:271–360. https://doi.org/10.1016/S0065-2601(08)60019-2.

Woolley, Kaitlin, and Ayelet Fishbach. (2018). "It's about Time: Earlier Reward Increases Intrinsic Motivation." *Journal of Personality and Social Psychology*. https://doi.org/10.1037/h0021466.

Young, Cristobal, and Julia Melin. (2019). "Time Is a Network Good." *Current Opinion in Psychology* 26: 23–27. https://doi.org/10.1016/j.copsyc.2018.03.009.

(Not) Giving the Same old Song and Dance: Gift-Givers' Aversion to Repeating Gifts

Julian Givi, West Virginia University, USA

EXTENDED ABSTRACT

Oftentimes when a gift-giver is selecting a gift, the recipient is someone whom the giver has given a gift to previously. The present research examines how givers' decision-making and recipients' desires are influenced by gifts given from giver to recipient on prior occasions; specifically, this research examines whether givers and recipients agree when it comes to the decision of whether to repeat a gift that the giver previously gave to the recipient (but is the best match with the recipient's preferences; i.e., a 'repeat' gift) or opt for some alternative gift that the giver is yet to give to the recipient (but is a poorer match with the recipient's preferences; i.e., a 'novel' gift). Study 1 examined whether givers and recipients agree when it comes to the repeat versus novel gift decision. Givers first read a scenario in which they were selecting a winter holiday gift for a friend and chose whether they would give him/her a $25 gift card to Starbucks, Subway, AMC, or Best Buy. Next, they read another scenario in which some time later they were selecting a birthday gift for their friend and again chose among the same four gift cards. Recipients completed the study in a similar manner, only from the recipient's perspective (i.e., they chose which gifts they would prefer to receive). (Note that with this type of design, it is clear the repeat gift is perceived as the best match with the recipient's preferences, since participants chose it over the other gifts initially.) Givers gave the repeat gift less often for the second occasion than recipients preferred (30% vs. 62%; $p < .001$).

Study 2 tested whether givers view the act of giving a repeat gift to be less thoughtful and more boring than do recipients, which could potentially lead to the gift choice asymmetry. The study was liked study 1, except: 1) Only wine-drinkers were eligible to participate, given the nature of the gifts; 2) Participants thought specifically of a friend *who drank wine*; 3) The first gift was given as a housewarming gift, and the second as a birthday gift a few months later; 4) The gifts were $25 bottles of Riesling, Viognier, and Sauvignon Blanc; and 5) Prior to making their second choice, participants indicated how thoughtful and how boring it would be of the giver to give the same gift that s/he gave previously (1 = Not at all, 7 = Very). Givers gave the repeat gift less often than recipients preferred (27% vs. 57%; $p < .001$). Additionally, givers considered the act of giving the repeat gift to be less thoughtful (M's = 3.38 vs. 4.91; $p < .001$) and more boring (M's = 4.78 vs. 3.49; $p < .001$) than did recipients. Bootstrapped mediation (Hayes 2013) revealed that these discrepancies mediated the gift choice asymmetry.

Study 3 again examined whether givers' aversion to repeat gifts stems from concerns about thoughtfulness and boringness. One implication of these hypotheses is that, when consumers are choosing multiple products for someone else in a non-gift-giving (vs. gift-giving) context, and thus are presumably less concerned with thoughtfulness and boringness, they should be more likely to choose a repeat option. Thus, in study 3, some participants ('choosers') made multiple decisions for a friend in a non-gift-giving context, while others ('givers') made the same decisions in a gift-giving context. Specifically, givers began the study in a similar manner as givers in study 1, except: 1) The gifts were $25 gift cards to Chipotle, Uber, and Starbucks; and 2) The first gift was given as a housewarming gift, and the second as a birthday gift a few months later. Choosers began the study in a similar manner except that their choices were not made in a gift-giving context. Specifically, they imagined that they and their friend completed two sets of surveys (separated by a

few months), and that after each set, the survey center allowed them to choose one of the gift cards for their friend to receive as part of his/her compensation. Participants in both conditions then indicated the extent to which they were concerned that choosing the same gift card twice i) would not be thoughtful, and ii) would be boring (1 = Not at all, 7 = Very). Givers selected the repeat gift card less often compared to choosers (42% vs. 61%; $p = .002$). Additionally, givers were more concerned that choosing the same gift card twice would not be thoughtful (M's = 4.11 vs. 2.81; $p < .001$) and would be boring (M's = 4.26 vs. 2.83; $p < .001$). Bootstrapped mediation (Hayes 2013) revealed that these discrepancies mediated the asymmetry in the percentage of participants choosing the repeat gift card.

The previous studies suggest that givers lost focus on a motivation to select the gift that best matched preferences because they became too focused on thoughtfulness and boringness. This means that, if givers can re-gain focus on a preference-matching motive, they should be more likely to give repeat gifts (i.e., make better choices). One way givers may be able re-gain such a focus is by first *predicting* the recipient's preference (Baskin et al. 2014). To that end, in study 4, some givers ('preference predicting givers') indicated which gift the recipient would prefer before they made their choice, while others ('control givers') did not. Specifically, control givers completed the study in the same manner as givers in study 3, except that they chose between only two of the gift cards (Chipotle and Starbucks). Preference predicting givers completed the study in a similar manner, except that, prior to making their second choice, they indicated which gift card they believed their friend would choose if s/he was purchasing one for him/herself. Givers who first predicted preferences gave the repeat gift more often than givers who chose without predicting preferences (76% vs. 60%; $p = .017$).

This research adds to the gift-giving literature by demonstrating a novel giver-recipient gift choice asymmetry (in which givers *knowingly* give non-preference-matching gifts) and documenting the mechanisms behind it.

REFERENCES

Baskin, Ernest, Cheryl J. Wakslak, Yaacov Trope, and Nathan Novemsky (2014), "Why Feasibility Matters More to Gift Receivers than to Givers: A Construal-Level Approach to Gift Giving," *Journal of Consumer Research*, 41 (1), 169-82.

Hayes, Andrew F. (2013), Introduction to Mediation, Moderation, and Conditional Process Analysis: A Regression-Based Approach, New York: Guilford.

What Makes Consumer–Brand Relationships Bad? Enlightening Relational Negativity

Maja Golf-Papez, University of Sussex, UK
Michael Beverland, University of Sussex, UK

EXTENDED ABSTRACT

In the past two decades, a considerable amount of research has been published on the relationships formed between consumers and brands. These studies mostly consider the bright side of brand relationships, with scholars idealizing the marital brand relationship style or any type of strong, easily strengthened or positive relationship (Fournier 2009; Fournier and Alvarez 2013). This focus on positive relationships seems somewhat divorced from reality, since consumer–brand relationships can be "troublesome, irking, unpleasant, aggravating, difficult, and problematic" (Spitzberg and Cupach 2007, 8). In fact, such negative brand relationships are more prevalent (Fournier and Alvarez 2013) and more salient (Baumeister et al. 2001) than positive ones.

Although there has been far less research on negative brand relationships than on positive ones, a growing body of literature analyzes the dark side of consumer–brand relationships. Studies have sought to examine, for instance, brand hate (Zarantonello et al. 2016), unliked strong brands (Veloutsou, Chatzipanagiotou, and Christodoulides 2020), and strong relationships that have been transgressed (Aaker, Fournier, and Brasel 2004). In addition, negatively valenced relationships are included in the recent customer–brand relationships model (see Park, Eisingerich, and Park 2013) and consumer–smart object interactions model (Novak and Hoffman 2019). Notwithstanding the insightfulness of all these studies, very little is known about how the diverse forms of consumer–brand relationship (strong or weak, and positive, negative, or neutral) actually become negative.

To answer the calls for "a science of negative relationships concerning the negative outcomes, processes, states, and attributes of consumers' relationships with brands" (Fournier and Alvarez 2013, 253) and for an overarching theory that will explain what "causes changes in relationships" (MacInnis and Folkes 2017, 366), we explore the phenomenon of *relational negativity*. We use the term 'relational negativity' to refer to the negativity (negative attitudes) that arises within or because of consumer–brand relationships. Our specific research questions are: (1) How does relational negativity come about? In other words, what makes relationships, however temporarily, bad? and (2) What does the negativity lead to?

To understand the negative aspects of brand relationships, we conducted image-elicitation in-depth interviews with 25 participants. Prior to and during the interviews, participants were asked to find pictures that represented their feelings and thoughts about three negative personal brand experiences. In total, we discussed 103 pictures and 75 brand experiences. Using Fiske's (1992) relational models as our analytical lens, we performed iterative interpretive analyses, focusing particularly on the actions, perceptions, and conditions that caused the negativity within the particular type of relationship and the outcomes of this negativity. To ensure the credibility of our findings, we used data and within-method triangulation and member checks.

Our analyses revealed the usefulness of understanding the interactions between consumers and brands in terms of four of Fiske's (1992) discrete relational models (i.e. communal sharing, authority ranking, equality matching, and market pricing). Interactions governed by the communal-sharing model were based on strong consumer identification with a brand. Reminiscent of Aggarwal's (2004) and Miller, Fournier, and Allen's (2012) communal relationships, communal-sharing relationships include relationships in which a consumer genuinely supports and cares about the brand. Authority-ranking relations were characterized by the consumer's perception of being subordinated to or dependent on the brand. Equality-matching relations included balanced, reciprocal exchanges between a consumer and a brand. Finally, in the brand market-pricing relations, roughly corresponding to Aggarwal's (2004) and Miller, Fournier, and Allen's (2012) exchange relationships, a consumer thought about a brand mainly in terms of its value for money.

In general, our informants related to each brand in terms of one predominant model. The negativity that arose in the brand relationships could be explained by: (1) the brand directly violating the rules and expectations of the enacted relational model (i.e., *within-model negativity*), (2) the brand enacting a different relational model than the consumer and therefore, indirectly violating the relational rules (i.e., *between-model negativity*), and (3) the negative aspects of being in a particular type of brand relationship (i.e., *by-model negativity*). These three different types of relational negativity influenced the consumer's decision to maintain or terminate the current relationship and whether to start using a competing brand.

This research contributes to our understanding of negative brand relationships. We demonstrate the fluidity and multidimensionality of relational negativity by illustrating how some consumer–brand relationships have never been positive, how some consumer–brand relationships become negative, and how some seemingly negative consumer–brand relationships are, in fact, positive. The presented framework with the four consumer–brand relationship types and the governing rules may give marketing and brand managers an alternative understanding of how consumers relate to their brands and what the brand's 'must dos' and 'shouldn't dos' are if they want to keep or fire the customer, respectively.

REFERENCES

Aaker, Jennifer, Susan Fournier, and S. Adam Brasel (2004), "When Good Brands Do Bad," *Journal of Consumer Research*, 31(1), 1–16.

Aggarwal, Pankaj (2004), "The Effects of Brand Relationship Norms on Consumer Attitudes and Behavior," *Journal of Consumer Research*, 31(1), 87–101.

Baumeister, Roy F., Ellen Bratslavsky, Catrin Finkenauer, and Kathleen D. Vohs (2001), "Bad Is Stronger than Good," *Review of General Psychology*, 5(4), 323–70.

Fiske, Alan P. (1992), "The Four Elementary Forms of Sociality: Framework for a Unified Theory of Social Relations.," *Psychological review*, 99(4), 689–723.

Fournier, Susan (2009), "Lessons Learned About Consumers' Relationships With Their Brands," in *Handbook of Brand Relationships*, ed. Deborah J. MacInnis, C. Whan Park, and Joseph R. Priester, New York: M.E. Sharpe, 5–23.

Fournier, Susan and Claudio Alvarez (2013), "Relating Badly to Brands," *Journal of Consumer Psychology*, 23(2), 253–64.

MacInnis, Deborah J. and Valerie S. Folkes (2017), "Humanizing Brands: When Brands Seem to Be like Me, Part of Me, and in a Relationship with Me," *Journal of Consumer Psychology*, 27(3), 355–74.

Miller, Felicia M., Susan Fournier, and Chris T. Allen (2012), "Exploring Relationship Analogues in the Brand Space," in *Consumer-Brand Relationships: Theory and Practice*, ed. Susan Fournier, Michael Breazeale, and Marc Fetscherin, London: Routledge, 30–56.

Novak, Thomas P. and Donna L. Hoffman (2019), "Relationship Journeys in the Internet of Things: A New Framework for Understanding Interactions between Consumers and Smart Objects," *Journal of the Academy of Marketing Science*, 47(2), 216–37.

Park, C. Whan, Andreas B. Eisingerich, and Jason Whan Park (2013), "Attachment–Aversion (AA) Model of Customer–Brand Relationships," *Journal of Consumer Psychology*, 23(2), 229–48.

Spitzberg, Brian H. and William R. Cupach, Eds. (2007), *The Dark Side of Interpersonal Communication*, Second Edition, Mahwah, New Jersey: Lawrence Erlbaum Associates, Inc.

Veloutsou, Cleopatra, Kalliopi Chatzipanagiotou, and George Christodoulides (2020), "The Consumer-Based Brand Equity Deconstruction and Restoration Process: Lessons from Unliked Brands," *Journal of Business Research*, 111, 41–51.

Zarantonello, Lia, Simona Romani, Silvia Grappi, and Richard P. Bagozzi (2016), "Brand Hate," *Journal of Product & Brand Management*, 25(1), 11–25.

Helping Those that Hide: The Effect of Anticipated Stigmatization on Concealment and Debt Reduction

Miranda R. Goode, Ivey Business School, Canada
Michael Moorhouse, Ivey Business School, Canada
June Cotte, Ivey Business School, Canada
Jennifer Widney, Financial Fundamentals Ltd., Canada

EXTENDED ABSTRACT

Credit use is widespread, but there is a point where *normal* use turns into an unmanageable burden, and marginalization is experienced (Bernthal, Crockett, and Rose 2005; Peñaloza & Barnhart 2011). These findings, combined with the emotional experience of debt (e.g., shame and embarrassment; Hayes 2000; Thorne and Anderson 2006), suggest that stigma may be a relevant lens to investigate debt accumulation and reduction, which is the focus of our investigation.

Stigmatization is the devaluation of an individual who is believed to possess a stigma and may be experienced as negative evaluations and emotional reactions, exclusion, teasing, loss of status and opportunities, undesirable labelling, and/or discrimination (Crocker, Major, and Steele 1998; Crockett 2017; Hing and Russell 2017; Major and O'Brien 2005; Quinn and Chaudoir 2009). In addition to *experiencing* stigmatization, individuals may *anticipate* stigmatization (Angermeyer et al. 2004; Hing and Russell 2017), which we define as the stigmatization one expects if precarious personal finances are divulged. Anticipating stigmatization can be as devastating as experiencing stigmatization and is associated with depression and anxiety; decreases in self-esteem and satisfaction; and avoidance of social relationships and support (Hing and Russell 2017; Markowitz 1998; Quinn and Chaudoir 2009). Anticipated stigmatization in gambling, smoking, and substance abuse contexts has been linked to concealment behaviors (Link et al. 1997; Stuber, Galea, and Link 2009). Extending this research, we examine the relationship between anticipated stigmatization and concealment in a debt context. We predict that

Hypothesis 1: *There will be a positive relationship between anticipated stigmatization and concealment of debt.*

Concealment is problematic because of the potential long-term negative consequences (e.g., *withdrawal from social interactions*; Link et al. 1997) and, we propose, *accumulation of more debt*. Withdrawal may involve avoiding social situations or being dishonest during social interactions (Hayes 2000) to avoid disclosing one's debt and thus stigmatization. Concealment may also involve opting into social situations that require spending money to avoid divulging precarious finances, a type of concealment not yet investigated but possible given the accessibility of credit. For example, frequently dining out with friends may result in an indebted individual accumulating more debt but, at the same time, minimizes the potential of stigmatization because it is not necessary to explain why one is not dining out anymore.

Community-oriented behavior change is available for problematic alcohol consumption, gambling, overeating, and spending (e.g., Weight Watchers). Participating in behavior change communities can improve well-being by increasing positive emotions and belongingness (Gesell et al. 2016; Groh, Jason, and Keys 2008; Wang and Willis 2016). Thus, working toward debt reduction among individuals with similar experiences in a behavior change course should improve well-being. We expect well-being will be supported by new relation-

ships formed in the course and to be experienced, to a greater extent, by individuals who anticipate more (versus less) stigmatization. Underpinning this theorizing is the assumption that experiences of isolation are more common for individuals who anticipate greater stigmatization, which increases the potential benefit of new, supportive relationships. Indeed, prior findings suggest that people in support communities become positively involved with one another. Thus, we predict

Hypothesis 2: *For indebted individuals who anticipate more (vs. less) stigmatization, well-being will improve to a greater extent in a community-based (versus individual) behavior change course because of increases in new supportive relationships.*

We propose a similar hypothesis with actual debt reduction and outline a role for motivation.

Hypothesis 3: *Debt reduction will be greatest in a community-based (versus individual) behavior change course because of increases in new supportive relationships, which in turn enhance motivation.*

In study 1 (n = 66), we found that higher debt stress increased anticipated stigmatization, which, in turn, increased preference to conceal one's debt ($\beta_{indirect}$ = ,74 95% CI .23 to 1.33). In study 2, we manipulated anticipated stigmatization to examine how financially stressed individuals respond in a spending situation involving a valued peer group. Participants (n = 195) who experienced a manipulation designed to increase anticipated stigmatization (versus control condition) had greater intentions to spend when in direct contact with a peer (β = -1.04, SE = .45, χ^2 = 5.41, p = .02, Exp(B) = .35), which enabled them to keep their debt concealed.

In study 3, we also found that higher levels of anticipated stigmatization were associated with accepting a costly lunch invitation (a decision that would result in incurring more debt and similar to results observed in study 2; β = .38, CI: .11, .64). Interestingly, declining the invitation was associated with increased lying to justify the decision (β = .29, CI: .11, .47), presumably because participants were able to conceal (i.e., avoid disclosing their financial struggles) and thus stigmatization.

Altogether, studies 1, 2, and 3 support H1 and establish that anticipating stigmatization increases concealment through various strategies. In study 4, we collaborated with a financial education company to examine if a behavior change program could improve well-being and financial outcomes for middle class individuals seeking to reduce their debt and particularly for those anticipating stigmatization. Participants (n = 235) with an average consumer debt load of $32,600USD, not including mortgages, were randomly assigned to a control condition or to complete a five-month debt reduction course in a classroom with other participants (community condition) or alone (individual condition). In support of H2 and H3, individuals who anticipate a higher level of stigmatization benefited most from the community (vs. individual) condition, experiencing greater increases to their well-being through enhanced social support ($\beta_{indirect}$ =

.15, 95% CI = .01, .38) and in terms of debt reduction: paying down more debt due to enhanced social support and increased motivation ($\beta_{indirect}$ = 1.22, 95% CI = .13, 3.22). See table 1 for results in all studies.

Considering the importance of money-related decisions in our lives, we know little about the experiences of and helping individuals in debt, and particularly those fearing negative judgments by others. Our research increases understanding of anticipated stigmatization in a debt context and offers practial solutions for helping indebted individuals.

REFERENCES

Bernthal, Matthew J., David Crockett, and Randall L. Rose (2005), "Credit Cards as Lifestyle Facilitators," *Journal of Consumer Research*, 32 (June), 130–145.

Crocker, Jennifer, Brenda Major, and Claude Steele (1998), "Social Stigma," In *Handbook of Social Psychology*, ed. S Fiske, D Gilbert, G Lindzey, vol. 2, 504–553, Boston, MA: McGraw-Hill.

Crockett, David (2017), "Paths to Respectability: Consumption and Stigma Management in the Contemporary Black Middle Class," *Journal of Consumer Research*, 44 (3), 554–581.

Gesell, Sabina B., Shari L. Barkin, Evan C. Sommer, Jessica R. Thompson, and Thomas W. Valente (2016), "Increases in New Social Network Ties are Associated with Increased Cohesion among Intervention Participants," *Health Education and Behavior*, 43 (2), 208 – 216.

Groh, D. R., L. A. Jason, and C. B. Keys (2008), "Social Network Variables in Alcoholics Anonymous: A Literature Review," *Clinical Psychology Review*, 28 (3), 430–450.

Hayes, Terrel A. (2000), "Stigmatizing Indebtedness: Implications for Labeling Theory," *Symbolic Interaction*, 23 (1), 29–46.

Hing, Nerilee and Alex M. T. Russell (2017), "How Anticipated and Experienced Stigma Can Contribute to Self-Stigma: The Case of Problem Gambling," *Frontiers in Psychology*, 8, 1–11.

Link, Bruce G., Elmer L. Struening, Michael Rahav, Jo C. Phelan, and Larry Nuttbrock (1997), "On Stigma and Its Consequences: Evidence from a Longitudinal Study of Mean with Dual Diagnoses of Mental Illness and Substance Abuse," *Journal of Health and Social Behavior*, 38 (2), 177 – 190.

Major, Brenda and Laurie T. O'Brien (2005), "The Social Psychology of Stigma," *Annual Review of Psychology*, 56, 393–421.

Markowitz, Fred E. (1998), "The Effects of Stigma on the Psychological Well-Being and Life Satisfaction of Persons with Mental Illness," *Journal of Health and Social Behavior*, 39 (4), 335–347.

Peñaloza, Lisa and Michelle Barnhart (2011), "Living US capitalism: The Normalization of Credit/Debt," *Journal of Consumer Research*, 38 (4),743–762.

Quinn, Diane M. and Stephenie R. Chaudoir (2009), "Living With a Concealable Stigmatized Identity: The Impact of Anticipated Stigma, Centrality, Salience, and Cultural Stigma on Psychological Distress and Health," *Journal of Personality and Social Psychology*, 97 (4), 634–651.

Stuber, Jennifer, Sandro Galea, and Bruce G. Link (2009), "Stigma and Smoking: The Consequences of Our Good Intentions," *Social Service Review*, 83 (4), 585–609.

Thorne, Deborah and Leon Anderson (2006), "Managing the Stigma of Personal Bankruptcy", *Sociological Focus*, 39 (2), 77–97.

Wang, Ye and Erin Willis (2016), "Examining Theory-Based Behavior-Change Constructs, Social Interaction, and Sociability Features of the Weight Watchers' Online Community," *Health Education and Behavior*, 43 (6), 656–664.

Exploring the Payday Effect: Anxiety Before Payday Leads to Overspending

Laura Goodyear, University of Toronto, Canada
Chuck Howard, Texas A&M University, USA
Marcel Lukas, University of St. Andrews, Scotland
Avni Shah, University of Toronto, Canada

EXTENDED ABSTRACT

The standard theory in economics posits that an individual's consumption should not change in response to predictable income, like a salary paycheck (Carroll 1997; Deaton 1991; Hall 1978). However, researchers have continued to document a "payday effect" whereby they consistently find that individuals spend more immediately following receipt of predictable income (Olafsson and Pagel 2018; Parker 1999; Souleles 1999). While these studies provide evidence that there appears to be a consistent effect of income receipt on consumer spending, the findings regarding why this effect occurs are inconclusive. Some research suggests that this effect seems to be present for consumers who are financially illiquid (Kaplan and Violante

2014). However, others suggest that the payday effect occurs even for those with substantial liquid assets (Olafsson and Pagel 2018). A natural question emerges: Why are consumers deviating from standard economic theory (e.g. Hall 1978) and failing to smooth consumption on paydays?

To gain greater insight into the underlying mechanism of the payday effect, we used real income and spending data (N=67,360) provided by a popular financial application in the United Kingdom, Money Dashboard, to examine whether certain groups were more prone to this effect. The structure of the data allows us to observe the timing and amount of each user's paychecks and discretionary spending from January 2013 to December 2018 before individuals began using the budgeting application, as well as demographic information for each user. Our analysis follows the conventions set by Gelman et al. (2014) for investigating payday effects with big data. First, to measure the payday effect we perform panel regression analysis for which the econometric specification is:

$$Y_{ict} = \sum_{k=-7}^{7} \beta_{kc} I_i(Paid_{t-k}) + X'_{it} + \varepsilon_{it} \qquad \textbf{(Eq. 1)}$$

Where is the spending ratio of user i on day k in category c, *Paid* is a dummy equal to 1 if the user receives a pay cheque on day t, and is a vector of control variables. We compared the coefficients generated by Equation 1 using between-subject t-tests to determine if the size of the effect differs between groups (e.g., men and women). All consumers in our sample display significantly greater spending compared to their average spending across product types, however, we find that this effect is significantly larger amongst women (=0.15, =0.08; $p<$ .001), younger[1] consumers (=0.13, =0.08; $p<$ .001), and lower-income[2] consumers (=0.23, =0.05; $p<$ .001). This heterogeneity could be due to many potential sources. In particular, it could be argued that these groups experience greater financial constraint. However, past research has also indicated that anxiety is higher amongst these groups (Armstrong and Khawaja 2002; Misowsky and Ross 1999; Lindemann 1996). Therefore, could anxiety, above and beyond financial constraint, prior to payday lead individuals to be more prone to the payday effect?

In order to determine whether anxiety or financial constraint, as proposed by past research, could be driving the payday effect, we conducted three experiments. In Experiment 1 (N=246), to induce anxiety, we manipulated financial constraint, which is associated with experiencing anxiety (e.g. Hayhoe et al. 2012). This manipulation allowed us to determine if the payday effect is simply due to experiences of financial constraint or heightened anxious feelings. In a highly detailed hypothetical scenario, all participants read about events during a two-week period of their life where prior to their paycheck they experienced a sudden negative shock, a $50 parking ticket. Participants were randomly assigned to one of two experimental conditions that manipulated financial constraint. Participants in the constrained condition were told they had to cut back on their average daily spending prior to payday after a negative financial shock. Participants in the unconstrained condition were told they did not have to make any changes to their average daily spending prior to their payday after the negative financial shock. Following this, all participants were told they had received their paycheck. We tested payday spending by asking participants to order a meal, a drink and a main course at a restaurant, the day after receiving their paycheck. We found that though experiencing financial constraint increased anxiety ($M_{Constrained}$=4.61, $M_{Unconstrained}$=3.39; $p<$ .01), it did not produce significant differences in the total cost of participants meal choices ($p>$ .1). However, higher anxiety was significantly related to larger amounts spent at the restaurant ($\beta = 1.48, p=$ .02).

In Experiment 2 (N=701), we examined why anxiety might lead to increased spending. Past research has indicated that anxiety leads individuals to construe money differently, like overestimate the physical size of money (Zaleskiewicz et al. 2013). Similar to Experiment 1, we presented participants with a hypothetical scenario about a typical week in their life. To ensure that participants did not experience any undue financial constraint, all participants were told that they had $500 in their checking account a week prior to receiving their paycheck. To determine if anxiety leads to changes in the way individuals construe their income, consistent with past research, we asked participants to indicate their current level of anxiety and how much their paycheck feels like a "bonus" on a 7-point scale. To determine if individual's construe their income differently, we conducted a regression analysis controlling for participants average level of anxiety. We found that those with higher anxiety reported that their income felt more like a bonus ($\beta = 0.22, p<$ .001).

While the first two experiments provide initial support for our proposition that anxiety drives payday spending, in Experiment 3 (N=293), we test the full model. Specifically, we examined if construing income as a windfall explains the relationship between anxiety and increased spending on payday. Using the same manipulation as Experiment 1, in Experiment 3 we asked participants to indicate their preference for a cheap versus expensive restaurant following receipt of their income. Specifically, participants were asked to rate their preference between two restaurants; one where the average dinner was in the $10-30 price range versus one where the average was in the $25-45 range on a 7-point scale (Scale: 1=Definitely restaurant 1 to 7=Definitely restaurant 2). The restaurant choices were counterbalanced to ensure there were no order effects. We again find that experiencing financial constraint increased anxiety ($M_{Constrained}$=4.89,

---

[1] For age we use a median split to identify younger versus older consumers (Median age = 31)
[2] For income we use a median split to identify low income versus high income (Median income = £1,758)

$M_{\text{Unconstrained}}$=3.32; *p*< .01). However, experiencing financial constraint did not produce significant differences in restaurant preference (*p*> .1). Consistent with our anxiety account, we first find that experiencing higher anxiety is significantly associated with a preference for the more expensive restaurant (β = 0.21, *p*= .001) and construing income as a bonus mediated this effect (95% CI = [0.05, 0.17]). To examine the entire model, we conducted a path analysis. We found that the hypothesized model fit the data well (CFI=0.99; GIF=0.98; AGIF=0.94; RMSEA = 0.049; SRMR=.44). Specifically, we found that financial constraint lead to significantly higher levels of anxiety (*p*< .001), experiencing higher levels of anxiety was significantly related to construing income as a windfall (*p*< .001), and construing income as a windfall was significantly related to preferring the more expensive option (*p*< .05).

Collectively, our experiments shed light on the mechanism underlying previous findings regarding the payday effect. Mainly, we find that there is anxiety associated with financial constraint, which drives the payday effect for lower income individuals rather than financial constraint alone. Thus, if anxiety is driving the payday effect than we should expect to see a reduction in the payday spending for groups that typically experience greater anxiety when uncertainty is reduced.

To examine if a budgeting application could reduce an individual's uncertainty, we conducted a pilot study (*N*=99). Specifically, we wanted to understand what the purpose of a budgeting application is and why individuals used or would use a budgeting application. We asked participants to indicate their level of agreement with a number of statements regarding the purpose of a budgeting application (Scale: 1=Strongly disagree to 7=Strongly agree). We find that individuals believe that a budgeting application restores a sense of control (*M*=5.75), reduces uncertainty (*M*=5.54), and reduces anxiety (*M*=4.84). However, we also found that individuals did not believe that a budgeting application would make decisions for them (*M*=3.10). As such, using the same econometric specification in Equation 1 we examined the difference in payday spending prior to consumers using the Money Dashboard application and after they began using the application, conditional upon them logging into the application at least once. Consistent with our prediction, we find that those who are most likely to experience greater anxiety display the greatest proportional reduction in the payday effect after using the budgeting application.

In sum, these results demonstrate that experiencing anxiety prior to receiving a paycheck can lead individuals to increase the amount they are willing to spend. Further, we find that higher levels of anxiety lead individuals to think of their predictable income like a windfall, which facilitates spending. We also provide evidence that reducing uncertainty leads individuals, especially those who are most likely to experience anxiety, to reduce their payday spending consistent with our anxiety explanation. These results begin to provide some understanding for many individuals who are in a vicious cycle of living paycheck to paycheck, over and above just financial constraint alone. In addition, this work begins to provide some insight into practical interventions that can be used to curb overspending behaviors on payday.

REFERENCES

Archuleta, K. L., Dale, A., and Spann, S. M. (2013), College Students and Financial Distress: Exploring Debt, Financial Satisfaction, and Financial Anxiety. *Journal of Financial Counseling and Planning*, *24*(2), 50-62.

Armstrong, K. A., and Khawaja, N. G. (2002), Gender differences in anxiety: An investigation of the symptoms, cognitions, and sensitivity towards anxiety in a nonclinical population. Behavioural and Cognitive Psychotherapy, 30(2), 227-31.

Baker, P. M., and Hagedorn, R. B. (2008), Attitudes to money in a random sample of adults: Factor analysis of the MAS and MBBS scales, and correlations with demographic variables. *The Journal of Socio-Economics*, *37*(5), 1803-14.

Carroll, C. D. (1997), Buffer-stock saving and the life cycle/permanent income hypothesis, *The Quarterly Journal of Economics*, *112*(1), 1-55.

Deaton Angus, S. (1991), Saving and liquidity constraints. *Ecomometrica*, *59*(5), 221-48.

Drentea, P. (2000), Age, debt and anxiety. *Journal of health and Social Behavior*, *41*(4), 437.

Gasiorowska, A. (2014), The relationship between objective and subjective wealth is moderated by financial control and mediated by money anxiety, *Journal of Economic Psychology*, *43*, 64-74.

Gelman, M., Kariv, S., Shapiro, M. D., Silverman, D., and Tadelis, S. (2014). Harnessing naturally occurring data to measure the response of spending to income. *Science*, *345*(6193), 212-15.

Hall, R. E. (1978), Stochastic implications of the life cycle-permanent income hypothesis: theory and evidence, *Journal of political Economy*, *86*(6), 971-87.

Hayhoe, C. R., Cho, S. H., DeVaney, S. A., Worthy, S. L., Kim, J., and Gorham, E. (2012), How do distrust and anxiety affect saving behavior?. *Family and Consumer Sciences Research Journal*, *41*(1), 69-85.

Kaplan, G., and Violante, G. L. (2014). A model of the consumption response to fiscal stimulus payments. *Econometrica*, *82*(4), 1199-239.

Lindemann, C. G. (Ed.). (1996), *Handbook of the treatment of the anxiety disorders*. Jason Aronson.

Mirowsky, J., and Ross, C. E. (1999), Economic hardship across the life course. *American Sociological Review*, 548-569.

Olafsson, A., and Pagel, M. (2018), The liquid hand-to-mouth: Evidence from personal finance management software, *The Review of Financial Studies*, *31*(11), 4398-446.

Parker, J. A. (1999), The reaction of household consumption to predictable changes in social security taxes, *American Economic Review*, *89*(4), 959-73.

Souleles, N. S. (1999), The response of household consumption to income tax refunds, *American Economic Review*, *89*(4), 947-58.

Zaleskiewicz, T., Gasiorowska, A., Kesebir, P., Luszczynska, A., and Pyszczynski, T. (2013), Money and the fear of death: The symbolic power of money as an existential anxiety buffer. *Journal of Economic Psychology*, *36*, 55-67.

Measuring Eco-Consumption Tendency as a Conjoint-Based Latent Variable

Karen Gorissen, Vrije Universiteit Amsterdam, The Netherlands
Bert Weijters, Ghent University, Belgium
Hans Baumgartner, Pennsylvania State University, USA

EXTENDED ABSTRACT

Scientists agree that human activities are the primary driver of climate change, and shifting consumer choices toward more sustainable options can significantly reduce greenhouse gas emissions (Beckage et al., 2018). Against this backdrop, marketing researchers often want to measure eco-consumption tendencies (ECT), defined as consumers' inclination to select eco-friendly options from a choice set. Lange, Steinke, and Dewitte (2018) point out that most ECT studies rely exclusively on self-report measures of behavior or proposed psychological antecedents (e.g., intentions or attitudes).

However, it is well-established in the methodological literature that responses to self-report items contain substantial individual variation that is not content-related but stylistic in nature (Baumgartner & Steenkamp, 2001). For instance, some respondents tend to agree with items irrespective of what is being measured, while others do not. Furthermore, self-report scales are susceptible to social desirability, especially if the content relates to morally charged issues (Steenkamp, De Jong, & Baumgartner, 2010). Finally, an essential limitation of self-report scales is the limited variation in the presented stimuli. That is, traditional self-report scales typically ask consumers to rate how likely they are to prefer one specific attribute, making the task very transparent and different from real life decisions.

Conjoint analysis is a procedure that can help avoid some of these issues (Green & Srinivasan, 1990). In rating-based conjoint studies, consumers rate stimuli consisting of several experimentally manipulated attribute levels. By quantifying the relation between the attribute levels of the stimuli and the profile ratings for each respondent, a respondent-specific weight (or part-worth utility) can be computed that captures the relative contribution of each attribute level to overall ratings. Although conjoint analysis is an extensively validated method, it has mostly been used to address applied issues (Green & Srinivasan, 1990). In the current paper, we propose that conjoint designs that experimentally vary the eco-friendliness of products can be used to measure consumers' ECT, and we show how this can be integrated into a nomological network of antecedents, mediators, and outcomes using Structural Equation Modeling for Within-Subject Experiments (SEMWISE), a novel approach for analyzing conjoint data (Weijters & Baumgartner, 2019) that so far has not been applied in consumer research.

Study 1

When identifying drivers of organic purchasing behavior, one difficulty is that many times the organic attribute is confounded with other attributes like taste and price (Nadricka, Millet, & Verlegh, 2019; van Doorn & Verhoef, 2011). In the first study, we illustrate how conjoint analysis can disentangle preferences for different attributes (and their potential interactions) by orthogonally manipulating them in a simple within-subject experiment. We then correlate the conjoint-based latent ECT variable with traditional self-report measures of ECT and related constructs in order to cross-validate the results, using the SEMWISE procedure. For a brief introduction to SEMWISE; for details, refer to Weijters and Baumgartner (2019).

Method

Participants (N = 560 coffee drinkers; M_{age} = 37.4 , SD = 8.6; 48.9% women) imagined ordering coffee and rated the attractiveness of eight coffee profiles using a continuous scale from 0 to 5 stars. The coffee profiles correspond to a full-profile complete conjoint design created by experimentally manipulating the (binary) attributes organic label (organic vs. regular), taste (consumer ratings of 3/5 'average taste' vs 5/5 'excellent taste'), and price (high €2.40 vs. low €2.00). Green consumption values were measured with an adapted translation (Weijters & Baumgartner, 2019) of the GREEN scale (Haws et al., 2013) consisting of six items, three are reverse-worded (e.g., 'I would describe myself as environmentally responsible', 'I'm not particularly bothered by worries about our environment' [reversed]). Health consciousness was measured with six items, half were reverse-worded (Chen, 2009) (e.g., 'I consider myself very health conscious,' 'I have the impression that other people pay more attention to their health than I do' [reversed]).

Results and discussion

First, we specify an unconditional SEMWISE model without environmentalism and health consciousness, and conduct a series of model comparisons. Throughout, indicator intercepts are fixed to zero, while indicator residual variances are freely estimated. For each set of effects (intercept, main effects, two-way interactions, three-way interaction), we consider three possibilities: (a) a model with freely estimated means and variances for the weight factors, implying that the average effect (part-worth utility) across respondents is non-zero and that there are individual differences in the strength of the effect; (b) a model with freely estimated means but zero variances for the weight factors, implying that the average effect is non-zero but the effect is the same for all respondents; and (c) a model in which the means and variances of the weight factors are zero, implying that there are no (significant) effects of the manipulated factors.

Setting the variance of the three-way interaction weight factor to zero results in a just-identified model, which is used as the starting point for the model comparisons. We gradually impose additional restrictions on this model and evaluate them based on model fit indices (preferring lower BIC values, RMSEA < .08 [preferably < .05], SRMR < .08 [< .05], CFI > .90 [> .95], and TLI > .90 [> .95]). The model that includes a random intercept factor and random main effect weight factors, as well as fixed weight factors for the two-way interactions results as the preferred model, as it is the most parsimonious model that meets all fit index cutoff criteria and has the lowest BIC value (χ^2(64.3) = 11555.4, p < .001, RMSEA = .065, CFI = .982, TLI = .973, SRMR = .044).

The parameter estimates based on this model are reported in Table 1. The findings show that, on average, people like better taste and dislike higher prices, hence the positive weight factor mean for good taste and the negative weight factor mean for high price. The relatively small variance estimates for these weight factors suggest that these preferences are rather consistent across individuals. The results also indicate that, on average, people prefer regular over organic coffee (controlling for price and taste). This may be related to the fact that, in vice products, consumers often associate organic claims with lower quality (van Doorn and Verhoef 2011) and that an organic label tends to increase perceived taste and attractiveness for healthy food (Nadricka et al., 2019). The organic weight factor has a much larger variance than the weight factors for price and taste,

indicating substantial heterogeneity in the part-worth utilities of organic claims.

In addition to the main effects, there are three two-way interaction effects. First, the small negative weight factor mean for high price x good taste (Table 1) implies that consumers are slightly less demanding about taste for higher priced coffees (Plassmann, O'Doherty, Shiv, & Rangel, 2008) regardless of the review information. Second, consumers are less price sensitive for organic coffee (i.e., high price has a negative mean, but the interaction of organic x high price has a positive mean; Table 1). Finally, for organic coffee, good taste is slightly less important on average (i.e., good taste has a positive mean, but the interaction of organic x good taste has a negative weight factor mean; Table 1).

Next, we add the covariates environmentalism and health consciousness, each modeled as a latent factor with six indicators. In addition, since for both scales half of the items are reverse-worded, we model a method factor on which all items have unit loadings (Maydeu-Olivares & Coffman, 2006) and is uncorrelated with the substantive factors in the model (note that items were not reverse-coded for analysis). The intercept and main effect weight factors are modeled as dependent variables with environmentalism and health consciousness as antecedents (the two-way interaction weight factors have zero variance and cannot be modeled as dependent variables). The resulting model shows acceptable fit to the data (χ^2(155) = 310.768, p < .001, RMSEA = .042, CFI = .971, TLI = .964, SRMR = .039). As expected, the organic label is valued more positively by consumers who score higher on environmentalism (B = .300, 95% CI = [.208, .392]) and (to a lesser extent) by consumers who score higher on health consciousness (B =.133, 95% CI = [.035, .230]). People higher in environmentalism also show a more positive attitude toward all the coffees (B = .145, 95% CI = [.049, .242]), possibly due to overlap in consumer segments visiting coffee bars and engaging in green consumption (Gilg, Barr, & Ford, 2005). No other regression weights were significant.

In sum, we analyzed conjoint data for coffee in which taste, price and organic label were varied experimentally, and found strong main effects of these attributes on preferences. The attribute weights (part-worth utilities) also showed significant individual variation. This was particularly true for the weight factor of organic labeling, and the variation in part-worth utilities was associated with individual differences in self-reported environmental concern and (to a lesser extent) health concern. We analyzed the data using the recently proposed SEMWISE approach, which enables the estimation of part-worth utilities as latent weight factors that can be integrated into a structural network consisting of antecedents, mediators, and outcomes.

Study 2

Consumers often rely on eco-information schemes (e.g., eco-labels) to assess products' environmental sustainability. A recent type of eco-information schemes are eco-ratings (Finnerty, Herther, & Stanley, 2011). Eco-ratings quantify the environmental (un)sustainability of products in a choice set in a standardized way, using a predefined score range. Generally, eco-ratings tend to be positively framed and express the extent to which an option is more or less ecological (vs. more or less damaging to the environment). However, there is no inherent reason why eco-ratings need to be positively framed. Even more, negatively framed eco-ratings may offer some advantages in promoting eco-behavior and is in line with how environmental campaigns are usually designed (they often induce negative emotions such as guilt to elicit reparative action). In the second study, we demonstrate the strengths of the SEMWISE approach by

testing the hypothesis that eco-ratings have a stronger influence on buying intentions when they are negatively framed, and that self-conscious emotions (anticipated pride vs guilt) mediate this effect.

Method

We collected data among students at a large American University (N = 267, M_{age} = 19.5, SD_{age} = .68; 36.3% women). We used a 2 (eco-rating framing: negative vs. positive; between-subjects) by 3 (eco-rating level: low, medium, high; within-subject) by 3 (price: low, medium, high; within-subject) mixed experimental design. We included the price manipulation to avoid confounding with eco-rating and to conceal the research objective. Participants were presented with nine fictitious product descriptions of washing liquids. Pictures of the products and fragrance type were filler attributes, and randomly sampled from a set of nine unbranded washing liquid bottle pack shots and a set of nine fragrances. Respondents rated each stimulus on two seven-point bipolar rating scales assessing anticipated pride vs. guilt ("I would feel guilty vs. proud buying this product") and buying intention ("I would definitely not buy this product" to "I would buy this product"). Eco-rating framing was experimentally manipulated between subjects by altering the labels. In the negative framing condition, 1 = *'very damaging for the environment'* and 5 = *'not damaging for the environment'*; in the positive framing condition, 1 = *'not environmentally friendly'* and 5 = *'very environmentally friendly'*.

Results and discussion

Based on preliminary exploratory analyses, we specified a SEMWISE model in which we estimated (a) an intercept factor, (b) two weight factors linking price to pride (vs. guilt) and intention, and (c) two weight factors linking eco-ratings to pride (vs. guilt) and intention to buy. For example, the eco-rating pride/guilt (intention) weight factor indicates how much pride vs. guilt improved eco-ratings elicit (i.e. how much improved eco-ratings increase buying intentions). Both eco-rating and price have three levels in this design, and we coded them by setting the factor loadings to -1 (low), 0 (mid) and 1 (high) (there was no evidence of a significant deviation from linearity). We also added a residual correlation for the pride and intention indicators pertaining to the same stimulus. As in study 1, the interaction weight factors had non-zero means but no significant variance, so we included them as fixed effects. The manipulation of eco-rating framing was modeled as a dummy variable, with 0 = positive framing and 1 = negative framing. We specified a model in which negative framing had a direct effect on both the pride (vs. guilt) and intention weight factors, and pride was hypothesized to mediate the effect of framing on intentions. This model showed acceptable fit to the data (χ_{MLR}^2(53) = 275.268, p < .001, RMSEA = .054, CFI = .914, TLI = .904, SRMR = .080).

Negative framing has a positive direct effect on both eco-rating pride (**B = .434, 95% CI = [.198, .670]**), and intentions (**B = .316, 95% CI = [.083, .548]**), but framing has no effect for the price attribute (**B = .324, 95% CI = [-.317, .965]**). Since eco-rating pride positively influences intentions, the indirect effect of negative framing of eco-ratings on intentions (via pride due to improved eco-ratings) is also significant (Est. = .184, SE = .060, p = .002). The indirect effect for the price weight factors is not significant (p = .367). In short, negatively framed eco-ratings lead to a higher intention to choose more eco-friendly products, and this effect is partially mediated by anticipated feelings of pride due to the use of more eco-friendly products.

In this study, we illustrated how the combination of conjoint analysis and SEM can be used in novel experimental paradigms in which (a) the stimuli used for the conjoint task are subject to experimental manipulations (e.g., positively vs. negatively framed

eco-ratings), (b) different dependent variables are used as response variable (affective vs. intentional responsiveness to eco-ratings) and/or (c) one responsiveness measure (affective responsiveness to eco-ratings) mediates the effect of an experimental manipulation on a downstream responsiveness variable (intentional responsiveness to eco-ratings).

Conclusion

Consumer researchers are often interested in measuring consumers' responsiveness to certain attributes and typically use self-report multi-item scales to do so. We believe that the suggested approach offers an interesting complement or alternative to traditional self-report scales. Previous research has shown that conjoint tasks are typically more engaging, have higher external validity, and are less prone to social desirability (Tomassetti, Dalal, & Kaplan, 2016; Weijters & Baumgartner, 2019). These advantages seem especially relevant in the context of pro-environmental consumer behavior. Furthermore, the proposed SEMWISE method provides an analytical framework in which individually varying response functions to experimentally manipulated stimulus attributes (or part-worth utilities) are modeled as latent variables, meaning that they can be easily integrated into broader nomological networks of antecedents, mediators and consequences. Moreover, all the general advantages of SEM apply, including the availability of detailed model fit information and the possibility to model measurement error and method effects. We briefly illustrated the SEMWISE approach for measuring ECT in two studies. In study 1, we found that the conjoint-based latent ECT variable correlated strongly with a traditional self-report measure of ECT. In study 2, we showed that negatively framed eco-information boosts ECT using a conjoint-based latent ECT variable in combination with a between-subjects framing manipulation.

REFERENCES

Baumgartner, H., & Steenkamp, J.-B. E. M. (2001). Response Styles in Marketing Research: A Cross-National Investigation. *Journal of Marketing Research, 38*(May), 143-156.

Beckage, B., Gross, L. J., Lacasse, K., Carr, E., Metcalf, S. S., Winter, J. M., . . . Zia, A. (2018). Linking models of human behaviour and climate alters projected climate change. *Nature Climate Change*, 1.

Chen, M.-F. (2009). Attitude toward organic foods among Taiwanese as related to health consciousness, environmental attitudes, and the mediating effects of a healthy lifestyle. *British Food Journal, 111*(2-3), 165-178. doi:10.1108/00070700910931986

Finnerty, K., Herther, K., & Stanley, B. (2011). *One green score for one earth: How retailers, brands and shoppers can all win with a universal sustainability score*. Retrieved from http://www.brandchannel.com/images/papers/530_ryan_partnership_mambo_sprouts_wp_one_green_score_0911.pdf

Gilg, A., Barr, S., & Ford, N. (2005). Green consumption or sustainable lifestyles? Identifying the sustainable consumer. *Futures, 37*(6), 481-504.

Green, P. E., & Srinivasan, V. (1990). Conjoint analysis in marketing: new developments with implications for research and practice. *The Journal of Marketing*, 3-19.

Haws, K. L., Winterich, K. P., & Naylor, R. W. (2013). Seeing the world through GREEN-tinted glasses: Green consumption values and responses to environmentally friendly products. *Journal of Consumer Psychology*.

Lange, F., Steinke, A., & Dewitte, S. (2018). The Pro-Environmental Behavior Task: A laboratory measure of actual pro-environmental behavior. *Journal of Environmental Psychology, 56*, 46-54.

Maydeu-Olivares, A., & Coffman, D. L. (2006). Random intercept item factor analysis. *Psychological Methods, 11*(4), 344-362. doi:10.1037/1082-989X.11.4.344

Nadricka, K., Millet, K., & Verlegh, P. (2019). When organic products are tasty: Taste inferences from an organic = healthy association. *Unpublished manuscript*.

Plassmann, H., O'Doherty, J., Shiv, B., & Rangel, A. (2008). Marketing actions can modulate neural representations of experienced pleasantness. *Proceedings of the National Academy of Sciences, 105*(3), 1050-1054.

Steenkamp, J.-B. E. M., De Jong, M. G., & Baumgartner, H. (2010). Socially Desirable Response Tendencies in Survey Research. *Journal of Marketing Research, 47*(2), 199-214.

Tomassetti, A. J., Dalal, R. S., & Kaplan, S. A. (2016). Is Policy Capturing Really More Resistant Than Traditional Self-Report Techniques to Socially Desirable Responding? *Organizational Research Methods, 1*, 31. doi:10.1177/1094428115627497

van Doorn, J., & Verhoef, P. C. (2011). Willingness to pay for organic products: Differences between virtue and vice foods. *International Journal of Research in Marketing, 28*(3), 167-180. doi:10.1016/j.ijresmar.2011.02.005

Weijters, B., & Baumgartner, H. (2019). Analyzing policy capturing data using Structural Equation Modeling for Within-Subject Experiments (SEMWISE). *Organizational Research Methods, 22*(3), 623-648.

Freeing Oneself (Or Not) From Constraining Social Structures to Progress in Anti-Consumption: An Analysis Through Symbolic Interactionism

Valérie Guillard, University of Paris Dauphine-PSL, France

EXTENDED ABSTRACT

Daring to offer someone a second-hand gift, not buying anything during a day's shopping with friends, and so on. To what extent do individuals manage to assert themselves in relation to others when the practices at the heart of the interaction are based on anti-consumption (Cherrier, Black, and Lee 2011)? Individuals, even if activist, can be subject to the tension between constraining social structures and their own creativity (Cherrier, Szuba, and Özçağlar-Toulouse 2012; Cherrier and Gurrieri 2014). Some authors believe that breaking free is, if not impossible, at least difficult, since the determining factors are too strong, while others propose the paradigm of identity in its relational dimension in response to that of determinism (Mead 1963).

Much debated in the field of anti-consumption, the question of identity change has been addressed through the study of its various phases (Cherrier and Murray 2007). However, the way of dealing with adversity, the positions adopted, and the meaning of the relationship with others during interaction in these contexts have been little conceptualized. Yet these interactions contribute to the construction of identity.

The aim of this paper is not to understand the meaning of anti-consumption for individuals, but rather the meaning of interactions within their social sphere in a context of anti-consumption. More precisely, it is a question of uncovering the relational strategies that individuals mobilize to socially engage in their consumption reduction practices. For this purpose, the theoretical framework of symbolic interactionism is used (Mead 1963; Blumer 1969). This framework makes it possible to understand the extent to which individuals become actors by adjusting to norms, thus freeing up spaces for creativity. The individuals concerned interpret the reactions of others, make sense of them within the interaction and adjust to them by implementing relational strategies, which helps to build their identity.

To understand the meaning of interaction with others, a particular context was studied, that of commitment to the Rien de Neuf (Nothing New) challenge, launched in 2018 by the association Zero Waste France. This challenge, extended in 2019, aimed to encourage consumers to reduce their consumption of new objects. Twenty-four long interviews were conducted by telephone. They were asked several questions: the reasons for committing themselves to such a challenge, difficulties in sticking to it, and the progress made. A phenomenological analysis of the data was carried out (Pollio, Tracy, and Thompson 1997), which brought out the respondents' sense of relationship with others through describing their experience, in other words, through speaking about what took place. Communicating functions via two dimensions: doing, that is, the practices engaged in, and saying (or talking about them), which bring out four ways of being in relation to others.

Not doing and not saying: hiding and submitting to determining factors. One way of being towards one's entourage is to remain secret, defined in its interactive forms as the "limitation of reciprocal knowledge" (Simmel 1991, p.24) and more particularly in its passive form, as the unspoken. Fearing social judgment, consumed by the dread of not being understood and of causing offence, these consumers are unable to free themselves from social constraints. For example, they give new products to other people in general and second-hand items within their immediate circle.

Hiding can also be fuelled by social determinism. This is particularly the case for transclass individuals (Jaquet 2014), in other words, people who live in a social environment that is different from their original environment. These people imagine that those who have remained in that environment (socially constructed as "inferior") would interpret a gift of a second-hand item as contempt on the part of those who "have managed to get out of it".

Doing and not saying: camouflaging oneself in order to remain true to oneself. One of the ways to adopt a position in relation to others is to buy second-hand rather than new products without saying so, in order not to "betray" one's approach. Lying (an active form of secrecy, Simmel 1991) out of self-interest engenders a division of the self, a mode of defense that helps to protect one's self-image (Freud 1938). Lying is the manifestation of two opposing desires: self-presentation and privacy (Tisseron 2011). Such concealment, however, may be exposed, leading to mistrust or even aggressiveness on the part of one's circle, which in turn alters the relationship and can undermine identity.

Not doing, but saying: raising awareness and taking the risk of being oneself. Some people explain what they do in order to make other people think about their real needs, but without imposing their views. In return, their objective is to nourish their existential needs by gaining recognition. This relational strategy allows them to confront constraining social structures, which in turn sometimes generate ridicule, experienced as a form of rejection that may be embodied in the phrase "You are not what you want me to believe you are" (Laing 1961).

Doing and saying: asserting oneself in order remain who one is. Some individuals, often activists, refuse to buy new products for anyone and explain why. The source of their self-affirmation is their accumulated experience of different environmental practices (waste reduction, etc.). This approach allows them to confront constraining social structures by engaging in discourse as to their value, a real exercise in self-presentation (Goffman 1988).

The aim of the present study is to understand how individuals who choose anti-consumption relate to constraining social structures (Cherrier, Szuba, and Özçağlar-Toulouse 2012). Drawing on the theoretical framework of symbolic interactionism (Mead 1963; Blumer 1969), the findings reveal the meaning of the relationship with others within an anti-consumption perspective through four types of relationship: hiding (secrecy); camouflage (lying); awareness raising (need for recognition); assertiveness (self-affirmation). These findings provide a finer degree of granularity for understanding how identity is constructed through the meaning of the relationship with others (Cherrier and Murray 2007). Discourse analysis (lexical analysis) could help identify people's discursive identity (Zéhenne 2010) in order to understand how the legitimacy of individuals in anti-consumption is formed, in other words, what justifies their right to speak out.

REFERENCES

Albinsson, Pia A., and B. Yasanthi Perera (2009), "From trash to treasure and beyond: the meaning of voluntary disposition," *Journal of Consumer Behaviour: An International Research Review,* 8(6), 340-353.

Ballantine, Paul W., and Sam Creery (2010), "The consumption and disposition behaviour of voluntary simplifiers," *Journal of Consumer Behaviour: An International Research Review,* 9(1), 45-56.

Blumer, Herbert (1969), "Symbolic interactionism: Perspective and method. Berkeley," 233-255.

Brosius, Nina, Karen V. Fernandez, and Hélène Cherrier (2013), "Reacquiring consumer waste: Treasure in our trash?," *Journal of Public Policy & Marketing,* 32(2), 286-301.

Carey, Lindsey, Deirdre Shaw, and Edward Shiu (2008), "The impact of ethical concerns on family consumer decision-making," *International Journal of Consumer Studies*, 32(5), 553-560.

Chatzidakis, Andreas, and Michael SW Lee (2013), "Anti-consumption as the study of reasons against." *Journal of Macromarketing,* 33(3), 190-203.

Cherrier, Hélène (2009), "Anti-consumption discourses and consumer-resistant identities," *Journal of Business Research,* 62(2), 181-190.

Cherrier, Helene, Iain R. Black, and Mike Lee (2011), "Intentional non-consumption for sustainability," *European Journal of Marketing*, 35(2), 56-64.

Cherrier, Hélène, and Jeff B. Murray (2007), "Reflexive dispossession and the self: constructing a processual theory of identity," *Consumption Markets & Culture,* 10(1), 1-29.

Cherrier, Hélène, Mathilde Szuba, and Nil Özçağlar-Toulouse (2012), "Barriers to downward carbon emission: Exploring sustainable consumption in the face of the glass floor," *Journal of Marketing Management*, 28(3-4), 397-419.

Cherrier, Hélène, and Lauren Gurrieri (2014), "Framing social marketing as a system of interaction: A neo-institutional approach to alcohol abstinence," *Journal of Marketing Management*, 30(7-8), 607-633.

Craig-Lees, Margaret, and C. Hill (2006), "Anti-consumption: concept clarification and changing consumption behavior," In *Proceedings of the International Centre for Anti-Consumption Research (ICAR) Symposium*, 20-21.

Denegri-Knott, Janice, and Mike Molesworth (2009), "'I'll sell this and I'll buy them that': eBay and the management of possessions as stock," *Journal of Consumer Behaviour: An International Research Review,* 8(6), 305-315.

DePaulo, Bella M., Jennifer A. Epstein, and Melissa M. Wyer (1993), "Sex differences in lying: How women and men deal with the dilemma of deceit". In M. Lewis & C. Saarni (Eds.), *Lying and deception in everyday life*. Guilford Press, 126–147.

Dholakia, Utpal, Jihye Jung, and Nivriti Chowdhry (2018), "Should I buy this when I have so much?: Reflection on personal possessions as an anticonsumption strategy," *Journal of Public Policy & Marketing*, 37(2), 260-273.

Freud Sigmund, (1938), *Le clivage du moi dans le processus de défense,* Paris : Gallimard.

Goffman, Erving (1974), *Frame analysis: An essay on the organization of experience*. Harvard University Press.

Isenhour, Cindy (2010), "On conflicted Swedish consumers, the effort to stop shopping and neoliberal environmental governance," *Journal of Consumer Behaviour* 9(6), 454-469.

Jaquet, Chantal (2014), *Les transclasses, ou la non-reproduction*. France (Presses universitaires de).

Laing, Robert (1961), *Soi et les autres*, trad.*,* Paris, Gallimard.

Le Breton, David (2004), "L'interactionnisme symbolique", Puf, Paris, 249 p.

Lipiansky, Edmond-Marc (1993), "L'identité dans la communication," *Communication & Langages,* 97(1), 31-37.

Mead, George Herbert (1963), "L'esprit, le soi et la société," *Revue française de sociologie*, 4(2), 224-250.

Ozanne, Lucie K., and Paul W. Ballantine (2010), "Sharing as a form of anti-consumption? An examination of toy library users," *Journal of Consumer Behaviour*, 9(6), 485-498.

Pollio, Howard R., Tracy B. Henley, and Craig B. Thompson (1997), *The phenomenology of everyday life: Empirical investigations of human experience*, Cambridge University Press.

Rock, Paul (1979), "Participant observation," In *The Making of Symbolic Interactionism*, pp. 178-216. Palgrave Macmillan, London.

Simmel, Georg (1991), "The problem of style," *Theory, culture & society*, 8(3): 63-71.

Simmel, Georg, Sibylle Muller, and Julien Freund (1995), *Le conflit*. París: Circé, 1995.

Tisseron, Serge (2011), "Intimité et extimité," *Communications*, 1, 83-91.

Zéhenne, Camille (2010), "Identités sociales et discursives du sujet parlant," *Communication langages,* 4, 180-181.

Consumer Attributions of Profit- and Customer Need-Driven Firm Motives in Coproduction Contexts

Pascal Güntürkün, Vienna University of Economics and Business, Austria
Till Haumann, South Westphalia University of Applied Sciences, Germany
Laura-Marie Edinger-Schons, University of Mannheim Business School, Germany
Jan Wieseke, University of Bochum, Germany

EXTENDED ABSTRACT

In the last two decades, technological advancements have stimulated many firms to employ a coproduction concept, in which customers play a more active role in the creation of goods and services (Stadler and Bolton 2019; Vargo and Lusch 2016). Today, many firms engage their customers in the creation of the final offering using self-production kits (e.g., Ikea, Hello Fresh), self-service technologies (e.g., American Airlines, Walmart), or offer toolkits for product customization (e.g., Nike, Dell) (Atakan, Bagozzi, and Yoon 2014).

Academics and practitioners have often praised coproduction as a win-win concept that enables firms to 1) realize cost-efficiencies and 2) better satisfy customer needs at the same time (Prahalad and Ramaswamy 2000). However, recent studies and business cases reveal that coproduction does not always lead to favorable outcomes, thus indicating that the underlying mechanisms that explain when and why coproduction yields positive or negative outcomes for customer relationships are not fully understood yet (Dong and Sivakumar 2017).

The present research integrates theoretical notions of the multiple inference model (Reeder et al. 2004) and the negativity bias (Baumeister et al. 2001) to suggest that customer beliefs about a firm's coproduction motives (cost/profit and customer-need motive) offer a psychological mechanism that helps to explain when and why coproduction has positive/ negative short- and long-term consequences for customer relationships. Two qualitative studies provide initial support for the notion that these two motives are highly prevalent among customers in different countries and coproduction contexts. Using a longitudinal field study and a randomized experiment, we then examine the key notion that the negative effects of attributions of profit-driven firm motives are temporally more persistent than the positive effects of attributions of customer-need driven firm motives. We further investigate how customers infer these motives based on managerial decisions related to the extent of labor customers have to contribute in the process, the degree to which they can customize the outcome, and the extent to which they can realize savings through their active engagement.

Study 1 builds on a large-scale multi-wave longitudinal data set in which the subjects were customers of a multinational retailer that sells ready-to-assemble furniture. We employ a latent growth modeling approach to analyze longitudinal data at the individual customer level (Bollen and Curran 2006). The results of Study 1 show that customers can hold perceptions of both profit- and customer need-driven firm motives for offering coproduction simultaneously and that these motive attributions have substantial short- and long-term influences on relevant marketing outcomes. Specifically, the results confirm our predictions that the positive effects of attributions of customer need-driven motives on customers' satisfaction and willingness to pay decrease over time whereas customers' perceptions of profit-driven motives have detrimental effects on both outcomes, which are highly persistent over time.

The field study further shows how motive attributions vary with the nature of a firm's coproduction offer. Specifically, the results show that greater coproduction effort and time investments reduce attributions of customer-need driven motives but fuel attributions of profit-driven motives, while greater customization possibilities amplify attributions of customer-need driven motives.

Study 2 is a large experimental study in which we offer additional evidence for the causality of the proposed relationships and provide insights into the role of perceived monetary savings through engaging in coproduction processes. The study was administered online and builds on a 2 (degree of customization: low vs. high) × 2 (degree of effort: low vs. high) × 2 (degree of savings: low vs. high) between-subjects design. We kept the study context constant to offer a better comparison to the results of the field study.

Results of Study 2 replicate the results of the field study and thereby provide further support for the robustness of the proposed relationships. Due to the manipulation of the factors that characterize a firm's coproduction concept (coproduction effort, customization, and savings), the study offers further insights into the generalizability of the relationships.

This research makes three major contributions to marketing theory and practice. First, it extends the coproduction literature by providing first insights into the differential roles of customer attributions of mixed coproduction motives. We show that profit- and customer-need driven motive attributions serve as independent mechanisms that guide customers' impression of a firm's coproduction concept and exert differential influence on customers' satisfaction and willingness to pay. The study thereby answers calls for research on the psychological mechanisms that link coproduction with outcomes and helps to explain controversial findings regarding the success of a coproduction concept in research and practice (Dong and Sivakumar 2017). From a practical perspective, it significantly advances managers understanding of how decisions related to the configuration of a coproduction concept interact to affect customer attitudes and behaviors.

Second, the study advances both research on coproduction and motive attribution by offering first insights into longitudinal dynamics of the effects of mixed motive attributions on marketing outcomes. A novel and intriguing finding that adds to both literature streams is that the effects of self- and other-centered motive attributions follow different temporal patterns. Whereas the positive effects of customer-centered motive attributions decrease over time, the negative effects of self-centered motive attributions remain persistent over time. The shift from a static to a dynamic perspective thus offers a deeper understanding of the differential short- and long-term effects of managerial decisions related to coproduction concept on customer satisfaction and willingness to pay.

Third, we advance current coproduction literature by identifying three managerial decisions that are central to the configuration of a coproduction concept influence customer attributions of firm motives. Specifically, we show that customers draw inferences of coproduction motives based on the extent to which customers participate in coproduction (intensity), the degree to which they gain autonomy to influence the configuration and design of the outcome (customization), and the degree to which they can realize financial benefits for their engagement in coproduction (savings). We thereby contribute to a better understanding of the joint effects of customer participation in design and production stage (Atakan, Bagozzi, and Yoon 2014;

Buechel and Janisczewski 2014) on the development of favorable customer relationships over time.

REFERENCES

Atakan, Sinem, Richard P. Bagozzi, and Carolyn Yoon (2014), "Consumer Participation in the Design and Realization Stages of Production: How Self-Production Shapes Consumer Evaluations and Relationships to Products," *International Journal of Research in Marketing*, 31 (4), 395–408.

Baumeister, R. F., Bratslavsky, E., Finkenauer, C., & Vohs, K. D. (2001). Bad is stronger than good. *Review of General Psychology*, 5(4), 323-370.

Bollen Kenneth, A., & Curran Patrick, J. (2005). Latent Curve Models: A Structural Equation Approach. Hoboken, NJ: Wiley.

Buechel, E. and Chris Janiszewski (2014), "A Lot of Work or a Work of Art: How the Structure of a Customized Assembly Task Determines the Utility Derived from Assembly Effort," *Journal of Consumer Research*, 40 (5), 960-972.

Dong, Beibei and K. Sivakumar (2017), "Customer participation in services: domain, scope, and boundaries," *Journal of the Academy of Marketing Science*, Vol. 45, 944-965.

Prahalad, C. K. and Venkatram Ramaswamy (2000), "Co–opting customer competence," *Harvard Business Review*, 78 (1), 79–87.

Reeder, G.D., Vonk, R., Ronk, M.J., Ham, J. and Lawrence, M. (2004), "Dispositional attribution: multiple inferences about motive-related traits," *Journal of Personality and Social Psychology*, Vol. 86 (4), 530-544.

Stadler-Blank, Ashley and Lisa E. Bolton (2019), "Putting a Price on User Innovation: How Consumer Participation Can Decrease Perceived Price Fairness, *Journal of the Association for Consumer Research*, Volume 4 (3), 256-268.

Vargo, Stephen L. and Robert F. Lusch (2016), "Institutions and axioms: an extension and update of service-dominant logic," Journal of the Academy of Marketing Science, Vol 44, 5-23

Happy to Have and Happy to Do: The Role of Self-Expression (A)symmetry in Material and Experiential Purchases

Georgios Halkias, University of Vienna, Austria
Sofia Kousi, NOVA SBE, Portugal
Hans Baumgartner, Pennsylvania State University, USA

EXTENDED ABSTRACT

Empirical research on the relative contribution of material possessions to happiness suggests that material purchases are inferior to experiential purchases (Van Boven & Gilovich, 2003) and recommends prioritizing the latter to enhance consumer happiness – a notion dubbed the *experience recommendation* (Nicolao et al., 2009). However, recent evidence has cast doubt on the alleged happiness dominance of experiential purchases, suggesting that it is not the type of purchase *per se*, but the specific properties of a purchase that drive happiness (Guevarra & Howell, 2015; Caprariello & Reis, 2013).

In this context, we argue that the experience recommendation may be largely attributed to an asymmetry between experiential and material purchases that studies relying on past recollections have neglected to consider: individuals tend to intuitively recall more self-expressive experiential, as opposed to material, purchases. Given that the expression of our identity has long been associated with increased happiness (Kifer et al., 2013), such an asymmetry raises questions about whether experiential purchases naturally outperform material purchases in eliciting happiness. What if self-expression asymmetries across the two types of purchases were eliminated? Would equally self-expressive material purchases still have a happiness disadvantage compared to experiential purchases? The present paper tries to answer these questions empirically through three experiments. Our findings challenge the dichotomy between experiential and material purchases and suggest that people should not dismiss material purchases altogether. Instead, they should opt for purchases that are instrumental in expressing their true selves.

Hypothesis 1:   *Compared to material purchases, experiential purchases generate higher levels of self-expression which, in turn, is positively related to happiness.*

Hypothesis 2:   *Compared to self-expressive material purchases, self-expressive experiential purchases are more readily accessible in memory.*

Hypothesis 3:(a) *Compared to low self-expressive purchases, high self-expressive purchases lead to higher happiness irrespective of purchase type, and (b) purchase type (experiential vs. material) does not influence happiness when purchases are equally self-expressive.*

Study 1 replicated extant studies' procedures by testing whether asking participants to recall an experiential vs. material past purchase results in more self-expressive experiences than self-expressive material purchases, which in turn is positively related to perceived happiness (H_1). A total of 119 respondents (M_{age} = 38.16, 58% female) participated in a single-factor, between-subjects experiment in which participants were asked to report a past purchase (experiential vs. material) and to rate it on happiness and self-expression (Van Boven & Gilovich, 2003).

Consistent with the experience recommendation, experiential purchases generated greater happiness than material purchases ($M_{experiences}$ = 7.35 vs. $M_{objects}$ = 6.00, $F(1, 116)$ = 24.04, $p < .001$, d

= 0.86), controlling for the cost of the purchase. Also as predicted, participants reported more self-expressive experiential than material purchases ($M_{experiences}$ = 6.72 vs. $M_{objects}$ = 4.22, $t(117)$ = 6.87, $p < .001$, d = 1.26). A mediation model revealed a significant indirect effect of purchase type on happiness through self-expression (b = 0.84, 95% BCI [.482 – 1.245]). The total effect of purchase type on happiness ($\beta_{type \to happy}$ = 1.45, $p < .001$) becomes non-significant in the presence of self-expression, which seems to be a direct consequence of the manipulation.

Study 2 sought to provide additional evidence for the notion that self-expressive experiential purchases are naturally more accessible in memory than self-expressive material purchases (H_2). A 2 (experiential vs. material purchases) × 2 (control vs. forced high self-expression recall task) between-subjects design with 140 participants (M_{age} = 29.85, 41% female) was conducted. We forced memory to high self-expression and compared responses to unprompted recalls of past purchases similar to Study 1.

In line with Study 1, participants in the control condition reported more self-expressive experiential (vs. material) purchases ($t(68)$ = 5.99, $p < .001$, d = 1.31), which were not significantly different from those in the forced high self-expression conditions. Corroborating the idea that self-expressive experiential purchases are more accessible in memory, the results showed that ease of retrieval for experiential purchases did not vary between control and high self-expression recall condition. In contrast, it took more time ($t(68)$ = 2.64, $p < .01$, d = 0.63) and it was more difficult to report highly self-expressive, as opposed to any, material purchases ($t(68)$ = 2.38, $p < .01$, d = 0.57).

Study 3 manipulated rather than simply measured low and high self-expression, directly testing the causal link between self-expression and happiness, and examining the experience recommendation in the absence of self-expression asymmetries (H_3). A 2 (material vs. experiential purchases) × 2 (low vs. high self-expression) between-subjects design with 101 participants (M_{age} = 39.85, 40% female) was conducted.

An ANCOVA analysis revealed a significant main effect for self-expression ($F(1, 96)$ = 130.35, $p < .001$, = 0.576), and non-significant effects for purchase type and the interaction between the two factors (purchase type: $F(1, 96)$ = 1.58, $p = .212$; self-expression × purchase type: $F(1, 96)$ = 1.23, $p = .271$). Consistent with H_3, the findings indicate that highly self-expressive purchases generate greater happiness, regardless of the purchase type.

The present paper offers a more nuanced understanding of the consumption–happiness relationship. By disentangling the roles of purchasing type and self-expression, it reveals that material goods do not have an inherent disadvantage and can meaningfully contribute to well-being. Our findings challenge the dichotomous thinking of the experience recommendation, suggesting a causal relationship between self-expression and happiness, and showing that experiential purchases increase happiness only when they are more self-expressive than material purchases. The results indicate that a high level of self-expression afforded by a purchase promises *higher* happiness levels than simply distinguishing between material and experiential purchases. For consumers, this helps guide discretionary spending decisions to increase well-being: our findings suggest that people should not dismiss material purchases. Instead, they should be more

deliberate when making purchase decisions and opt for goods and services that are instrumental in expressing their self. For managers, it corrects the presumed happiness disadvantage of material goods inherent in the experience recommendation, and offers different options for marketing communication and new product design. Consumers and researchers alike should shift from prioritizing one purchase type over the other and focus instead on identifying the ingredients that can promote happiness from all purchases.

REFERENCES

Caprariello, P. A., & Reis, H. T. (2013). To do, to have, or to share? Valuing experiences over material possessions depends on the involvement of others. *Journal of Personality and Social Psychology*

Guevarra, D. A., & Howell, R. T. (2015). To have in order to do: Exploring the effects of consuming experiential products on well-being. *Journal of Consumer Psychology*, *25*, 28-41.

Kifer, Y., Heller, D., Perunovic, E., & Galinsky, A. D. (2013). The good life of the powerful: The experience of power and authenticity enhances subjective well-being. *Psychological Science, 24*, 280-288.

Nicolao, L., Irwin, J. R., & Goodman, J. K. (2009). Happiness for sale: Do experiential purchases make consumers happier than material purchases? *Journal of Consumer Research, 36,* 188-198.

Van Boven, L., & Gilovich, T. (2003). To do or to have? That is the question. *Journal of Personality and Social Psychology, 85,* 1193-1202.

Are You Paying Attention? Consumption-Related Antecedents and Consequences of the Spotlight Effect

Matthew J. Hall, Oregon State University, USA

EXTENDED ABSTRACT

The spotlight effect is a well-established bias in which consumers perceive that others pay more attention to them than is actually the case (Gilovich et al. 2000). While individual differences and artificial manipulations can enhance or attenuate the spotlight effect, research has yet to examined how this bias is influenced by day-to-day consumption behaviors. The spotlight effect occurs because consumers anchor on the attention they pay to their own behaviors and fail to adequately adjust away from this egocentric perspective when considering others' attention allocation. Thus, this bias should be enhanced when consumers encounter signals that increase egocentrism because such signals should lead to a decreased adjustment relative to one's egocentric perspective (Fenigstein and Abrams 1993). One such signal is feedback consumers receive after sharing content online (views, likes, etc.)—a signal that indicates others are paying attention to one's behaviors (Skågeby 2009). Therefore, I propose that the level of attention consumers receive online will influence their spotlight effect bias in subsequent offline settings.

Research has not explicitly considered the consumption consequences of the spotlight bias. However, because it stems from egocentrism and the awareness of the self in relation to others, theory suggests it may influence conspicuous consumption. While some research suggests an *enhanced* spotlight effect should increase conspicuous consumption (Xu et al. 2019), other findings suggest an *attenuated* spotlight bias might increase conspicuous consumption (Lee and Shrum 2012). I propose these differing responses may depend on consumers' regulatory focus (Higgins 1997). With conspicuous consumption, the desired end state is to enhance status by attracting attention and facilitating positive social impressions. Consumers with conspicuous motives should therefore be dissatisfied if others are not paying attention, suggesting an attenuated spotlight bias should increase conspicuous consumption, regardless of regulatory focus (compensatory consumption when feeling ignored; Lee and Shrum 2012). Alternatively, if others are already paying attention (enhanced spotlight bias), consumers are already partially in a desired end state. Thus, those with a promotion focus—who actively pursue ideal end states—should leveraging this perceived "spotlight" to demonstrate their taste and wealth through conspicuous consumption. Alternatively, prevention-focused consumers should be less likely to consume conspicuously when they are the focus of attention because conspicuous consumption sometimes leads to negative evaluations (Truong 2010; Wong 1997).

In study 1, undergraduate students (n=203) completed a 2-condition (received attention: high/low) lab study. Participants read about posting a restaurant experience on social media. Stimuli were presented as mock Instagram posts, which indicated that participants received either 150 (high attention) or 15 (low attention) views. After this attention manipulation, participants participated in a brief activity to measure the spotlight effect (from Pfattheicher and Keller 2015). Participants affixed a pink sticky-note to their shirt and left the lab to walk through a nearby atrium where other students often study. Upon returning to the lab, participants reported how many other students were in the atrium ($M=24.94$, SD=15.98; no difference between conditions) and how many of those students they thought noticed the sticky-note on their shirt. As expected, those who received more attention after sharing online reported an enhanced spotlight bias offline ($M_{High}=31.96\%$, SD=25.37%; $M_{Low}=16.44\%$, SD=16.50%; $F(1,201)=26.75$, $p<.001$).

Study 2 examines how received attention influences the spotlight bias relative to when no attention information is available. Undergraduates (n=229) were assigned to one of three conditions (received attention: high/low/control). After viewing the same attention manipulation from study 1—control condition participants saw the post with no attention information—participants completed a spotlight effect measure. They imagined spilling sauce on their shirt while eating in a restaurant, and that while walking to the bathroom in the restaurant, they passed 30 people—participants reported how many they thought would notice the stain. As expected, those receiving high attention ($M=9.05$, SD=3.42) reported that more people would notice the stain, relative to the low attention ($M=5.46$, SD=2.93; $F(1,226)=50.71$, $p<.001$) and control ($M=6.79$, SD=3.37; $F(1,226)=20.10$, $p<.001$) conditions. The low attention condition also reported a lower spotlight bias than the control condition ($F(1,226)=7.23$, $p=.008$).

In study 3, undergraduates (n=299) completed a 2(attention: high/low) x 2(regulatory focus: promotion/prevention) study. After completing a regulatory focus manipulation (writing task from Freitas and Higgins 2002), high and low received attention were manipulated as in study 1. Next, participants completed the same spotlight measure from study 2 and finished by making a hypothetical choice between two Nike t-shirts—a more conspicuous option (large logo) and a less conspicuous option (small logo; Lee and Shrum 2012). In the high attention condition, participants again reported an enhanced spotlight bias ($M_{High}=10.70$, SD=3.39; $M_{Low}=4.86$, SD=2.71; $F(1,297)=267.74$, $p<.001$). Further, a logistic regression revealed that regulatory focus moderated the effect of the spotlight bias on conspicuous choice ($B_{Interaction}=.111$, $\chi^2_{Wald}=11.84$, $p<.001$; no main effects). In the promotion condition, an enhanced spotlight effect bias led to increased conspicuous choice ($B=.086$, $\chi^2_{Wald}=4.04$, $p=.044$), while the opposite effect was observed in the prevention condition ($B=-.135$, $\chi^2_{Wald}=7.94$, $p=.005$). The full theoretical model was confirmed using Hayes' PROCESS macro model 14 ($CI_{95}=[.563, 2.131]$), as there was a positive indirect effect of received attention on conspicuous choice, through an increase in the spotlight effect, within the promotion condition ($CI_{95}=[.127, 1.378]$), and a negative indirect effect within the prevention condition ($CI_{95}=[-1.227, -.030]$). Notably, this was the only model that resulted in a significant index of moderated mediation (b-path moderation only).

By considering a context in which consumers have actual feedback regarding the attention others pay to them, I demonstrate that consumers use their discrete online interactions to influence the anchoring and adjusting process that results in the spotlight bias. Thus, consumers' spotlight biases are not static, especially in an environment in which social media provides consumers with constant feedback about the attention they receive. I also contribute to literature on conspicuous consumption by demonstrating that the effect of attention biases on conspicuous consumption is dependent on consumers' regulatory focus. To my knowledge, this research is the first to demonstrate the effect of regulatory focus on consumers' preferences for conspicuous products.

REFERENCES

Fenigstein, Allan and Dominic Abrams (1993), "Self-Attention and the Egocentric Assumption of Shared Perspectives," *Journal of Experimental Social Psychology*, 29(4), 287-303.

Freitas, Antonio L. and E. Tory Higgins (2002), "Enjoying Goal-Directed Action: The Role of Regulatory Fit," *Psychological Science,* 13(1), 1-6.

Gilovich, Thomas, Victoria Husted Medvec, and Kenneth Savitsky (2000), "The Spotlight Effect in Social Judgment: An Egocentric Bias in Estimates of the Salience of One's Own Actions and Appearance," *Journal of Personality and Social Psychology,* 78(2), 211-222.

Higgins, E. Tory (1997), "Beyond Pleasure and Pain," *American Psychologist,* 52(12), 1280-1300.

Lee, Jaehoon and L. J. Shrum (2012), "Conspicuous Consumption versus Charitable Behavior in Response to Social Exclusion: A Differential Needs Explanation," *Journal of Consumer Research,* 39(3), 530-544.

Pfattheicher, Stefan and Johannes Keller (2015), "The Watching Eyes Phenomenon: The Role of a Sense of Being Seen and Public Self-Awareness," *European Journal of Social Psychology,* 45(5), 560-566.

Skågeby, Jörgen (2009), "Exploring Qualitative Sharing Practices of Social Metadata: Expanding the Attention Economy," *The Information Society,* 25(1), 60-72.

Truong, Yann (2010), "Personal Aspirations and the Consumption of Luxury Goods," *International Journal of Market Research*, 52(5), 655-673.

Wong, Nancy YC (1997), "Suppose You Own the World and No One Knows? Conspicuous Consumption, Materialism and Self," *Advances in Consumer Research,* 24, 197-203

Xu, Lidan, Ravi Mehta, and Kelly B. Herd (2019), "Look at Me! Or Don't…: How Mere Social Presence Impacts Innovation Adoption," *Journal of the Association for Consumer Research*, 4(3), 269-279.

How Public Recognition Promotes Donations to Out-groups

Eunjoo Han, Penn State Behrend, USA
Saerom Lee, University of Guelph, Canada
Karen Page Winterich, Pennsylvania State University, USA

EXTENDED ABSTRACT

In 2018, American consumers donated more than $290 billion to charitable organizations (Giving USA 2019). However, most donations by individual donors have been made to support domestic causes, with only 3% of the funds donated to international causes (Giving USA 2006). Although this pattern of behavior is not surprising given prior research suggesting that consumers are generally far more willing to help victims belonging to their in-group compared to an out-group (Cuddy, Rock, and Norton 2007; James and Zagefka 2017; Levine, Prosser, Evans, and Reicher 2005), this is not ideal in that donations are increasingly needed for international causes. According to the United Nations, 168 million people in 53 countries will need emergency relief in 2020 and the relief efforts are expected

to cost $28.8 billion (OCHA 2019). Thus, it is critical to find ways to encourage consumers to engage in charitable giving toward victims beyond their in-group boundaries. To this end, we investigate how public recognition of charitable contributions can encourage consumers to donate more to out-group victims. Specifically, we propose that public recognition enhances charitable giving for out-groups due to the benefits of public out-group giving in elevating consumers' moral self-regard.

Prior work has explored the role of public recognition (e.g., displaying donors' names on an organization's website, printed medium, or a physical object, or donating in a public setting) in charitable contributions. One stream of research has highlighted the positive effect of public recognition on donations. Public recognition often increases donations in a wide range of contexts (e.g., Basil et al. 2009, Harbaugh 1998) by fulfilling consumers' desire to present a positive social image (Karlan and McConnell 2014) or conform to the expectations of others (Fisher and Ackerman 1998). Another stream of research, however, suggested public recognition does not always increase charitable giving. For example, public recognition decreases donations by consumers with an independent self-construal who are willing to make decisions based on their own freewill without being influenced by social pressure (Simpson et al. 2018). Public recognition can also dampen charitable giving if donors are suspected of being motivated by ulterior, self-presentational motives (Benabou and Tirole 2006). Extending the prior research, we suggest the effect of public recognition on charitable giving will depend on the group membership of victims: Whether donation recipients belong to the same group as potential donors (in-group victims) or not (out-group victims). More specifically, the current research suggests public recognition will primarily have a positive effect on donations toward out-group victims; however, it would not necessarily increase donations toward in-group victims (the latter is consistent with conflicting results on the role of public recognition in charitable giving).

Individuals tend to categorize themselves into social groups, positively differentiating their group from other groups (Abrams and Hogg 2010; Tajfel and Turner 1979). This accounts for why individuals prefer to help victims of their own group over those of other groups (Bear and Rand 2016; Mullen, Brown, and Smith 1992). Indeed, people find it more challenging to empathize with others' suffering when victims belong to out-groups (Batson and Ahmad 2009). According to Reed and Aquino (2003), out-group helping requires expanding circle of moral regard toward out-groups, and because of that, donating to out-group victims tends to be observed among individuals who consider being moral is important and essential to their self-identity. This finding, in turn, may suggest that out-group (vs. in-group) helping can be more diagnostic of the helper's altruistic characters since it is a behavior associated with high moral identity. Thus, helping victims of an out-group (vs. in-group), when publicly recognized, may engender more positive reactions from others. Prior work on self-identity has shown that if observers of a helping behavior are expected to perceive the helper altruistic, the expected positive social evaluations should elevate the helper's self-view on his altruistic identity, leading to a more prosocial follow-on behavior (e.g., Barnes, Mason, and Leary 1988; Luhtanen and Crocker 1992). Building on this research, we propose that donating to out-group victims is a form of behavior that will improve consumers' moral self-regard particularly when it is publicly recognizable.

Consumers will consider that donating to out-groups, when publicly recognized, will generate positive social evaluations on their moral identity and elevate their moral self-regard. As such, consumers will be more likely to donate to out-groups under public recognition, driven by elevated perceptions of moral self-regard (e.g., Zlatev et al. 2020).

Taken together, we suggest that public recognition will promote donations to out-groups by improving their moral self-regard (not simply by raising self-presentation motives as typically demonstrated in the literature). In contrast, we do not expect that public recognition will promote donations toward in-group victims, because in-group helping is typically regarded as a social default (Insko et al. 2001) and taken more for granted as a normatively expected behavior (DiDonato, Ullrich, and Krueger 2011; Sierksma and Thijs 2017; Van Bavel, Packer, and Cunningham 2008).

Study 1

Study 1 aims to provide an initial test of our basic prediction. We examine participants' choice of a charity between charities supporting in-group versus out-group victims as a function of public recognition.

Method and Procedure

The study was a two-group (Public recognition: Present vs. Absent) between-subjects design. Sixty-seven undergraduate students (63.2% females) participated in this study in exchange for course credit. Most of the participants (78%) were U.S. nationals.

Participants first read about how global food banking systems work and how two specific foodbanks – Feeding America (supporting in-group victims in the U.S.) and Somali Foodbank (supporting out-group victims in Somalia, Africa) – work to end hunger crises.

After that, participants were asked to choose a foodbank they would like to donate between the two organizations. To minimize any differences in the perceived impact of helping, we informed that every dollar (USD) would help foodbanks distribute 5 meals in both countries. In the public recognition condition, participants were instructed that donors' names would be posted on the official Facebook pages of the university and the chosen foodbank. In the control condition, participants did not receive any information on public exposure.

Results and Discussion

A logistic regression analysis was conducted to examine the effect of public recognition (recognition = 1, control = -1) on participants' choice of charity (Feeding America = 1, Somali Foodbank = 2). Public recognition was found to increase willingness to help an out-group (β = .59, *SE* = .26, χ^2 = 4.96, *p* = .03): Somali foodbank was chosen by 27.6% of the participants in the control condition, but its choice share increased to 55.3% in the public recognition condition. As expected, this finding suggests that individuals are more likely to help an out-group when their contribution is publicly recognizable (vs. not).

Study 2

Study 2 aims to demonstrate the robustness of the effect of public recognition on out-group versus in-group helping using an actual donation measure in a real context of disaster relief. To this end, the study was conducted a few weeks after a large earthquake struck Indonesia (September 28, 2018) and Hurricane Michael hit the East coast of the U.S. (October 10, 2018).

Method and Procedure

The study was a 2 (Victim: In-group vs. out-group) X 2 (Public recognition: Present vs. Absent) between-subjects design. Three hundred and fifteen U.S. citizens recruited from Prolific (43.5% females) participated in this study in return for monetary compensation.

Participants were first reminded of a recent natural disaster and read further information about victims affected by the natural disaster in Indonesia (Sulawesi earthquake and tsunami) or in the U.S. (Hurricane Michael) depending on the victim condition.

Participants were also told that they would be able to help affected families in America or Indonesia by donating to the Save the Children's emergency response team.

Following that, all participants were instructed that they would be entered into a random draw to receive a bonus payment of $20 and that they can choose to donate any portion of the bonus to Save the Children. When public recognition was present, participants were told that donors' names would be listed in the official website of Save the Children.

When public recognition was absent, participants learned that their decision would be confidential. Participants indicated how much of $20 bonus they would donate to Save the Children.

Results and Discussion

An ANOVA with victim and recognition as independent variables and participants' log-transformed donation amount as the dependent variable revealed a significant two-way interaction on the amount of donation ($F(1, 311)$ = 7.05, *p* < .01). Public recognition (vs. no recognition) increased donations to out-group victims ($F(1, 311)$ = 3.61, *p* = .058). In contrast, public recognition slightly decreased donations to in-group victims ($F(1, 311)$ = 3.44, *p* = .065). Looking at another direction, the amount of donation was significantly higher for out-group (vs. in-group) victims when public recognition was present ($F(1, 311)$ = 4.69, *p* = .03). When public recognition was absent, however, donations to out-group versus in-group victims did not differ ($F(1, 311)$ = 2.52, *p* = .11). These results again provide support for our basic theorizing that public recognition promotes donations to out-group (vs. in-group) victims. Importantly, these effects were demonstrated with actual donations.

Study 3

The purpose of study 3 is to offer evidence for the mediating role of moral self-regard. Recall we argued that public recognition would lead individuals to anticipate elevated moral self-regard from donating, particularly when donation recipients are out-group (vs. in-group) victims. Thus, we measured participants' moral self-regard (i.e., how moral they would feel; Monin and Jordan 2009) and tested its mediating role in the proposed relationship. We also explore alternative accounts including personal happiness (e.g., Duclos and Barasch 2014), impression management motives, and the perceived impact of helping.

Method and Procedure

The study was a 2 (Victim: In-group vs. out-group) X 2 (Public recognition: Present vs. Absent) between-subjects design. One hundred and eighty-four U.S. citizens recruited from Amazon Mturk (46.20% females) participated in this study in return for monetary compensation.

Participants were first exposed to a hunger crisis appeal by Save the Children either in the U.S. or South Sudan depending on the victim condition. Participants then learned they had an opportunity to support the organization's food security programs and indicated how willing they were to donate to the organization (*a* = .95). In the public recognition condition, participants were informed that their contribution would be publicly recognized via the Facebook page of Save the Children. When public recognition was absent, participants were told that their contribution would be confidential.

Next, participants reported (1) how much donating would lead them to feel like a moral person (*a* = .90), (2) how much donating would make them happy (*a* = .90), (3) their desire to make a positive impression toward others (*a* = .94), and (4) the perceived impact of helping (*a* = .90).

Results and Discussion

Donation intention. An ANOVA with victim and recognition as independent variables and charitable intention as the dependent variable revealed a significant interaction on charitable intent ($F(1, 180)$ = 6.51, *p* = .01). Public recognition (vs. no recognition) increased participants' willingness to donate to the charity when it addressed the crisis in South Sudan (i.e., out-group victims) ($F(1, 180)$ = 4.03, *p* = .046). However, there was no difference in charitable intent between the two recognition conditions when the cause involved in-group victims ($F(1, 180)$ =2.53, *p* = .11). Looking from a different perspective, when the contribution was publicly recognizable, participants exhibited greater willingness to donate to victims in South Sudan (vs. the U.S.) ($F(1, 180)$ = 4.91, *p* = .03). When public recognition was absent, charitable intent did not differ between the victim conditions ($F(1, 180)$ = 1.91, *p* = .17).

Mediation analyses. A bootstrapping analysis for moderated mediation (Hayes 2013; Process Model 8; N of iterations = 5,000) revealed a significant index of moderated mediation (-.37, 95% CI = -.66 to -.07). Specifically, the indirect effect of public recognition on charitable intent via moral self-regard was significant when the cause was involved out-group victims (.30, 95% CI = .09 to .52). In contrast, the indirect effect was NS for in-group victims (-.07, 95% CI = -.28 to .14). These findings support our prediction that public recognition promotes charitable giving for out-group victims by elevating moral self-regard. We also explored the mediating roles of personal happiness, impression management motives, and the perceived impact of helping. When the four mediators were entered the model simultaneously, the indirect effect via moral self-regard

remained significant (-.27, 95% CI = -.50 to -.06). None of the other accounts mediated the observed findings.

These findings provide support for the role of moral self-regard as an underlying mechanism of the effects of public recognition on charitable giving to out-groups versus in- groups. Public recognition of charitable contributions enhanced consumers' perceptions of their moral self, which, in turn, increased intentions to donate to out-groups.

Conclusion

Across three studies, we demonstrate that public recognition of charitable contributions can be an effective tool to promote out-group helping but is not effective in promoting in-group helping. We further show that public recognition facilitates out-group helping by elevating a donor's moral self-regard.

This research contributes to the literature on charitable giving in two important ways. First, we add to the literature on intergroup helping by delineating conditions under which charitable giving can be increased depending on recipients' group membership. Second, we enhance the understanding of factors increasing effectiveness of public recognition as a tool to promote charitable giving. Our work suggests public recognition improves the effectiveness of donation appeals when out-group victims are involved. Further, our theorizing may be extended

to suggest public recognition may promote other forms of pro-social behavior which are not normatively taken for granted. Future studies can investigate this possibility.

Importantly, our results deliver substantial practical implications to charitable marketing: Publicly recognizing donors' charitable contributions can encourage donations for foreign aids supporting victims who belong to potential donors' out-groups. If funds are raised for domestic causes supporting victims who belong to potential donors' in-group, public recognition will not have much benefits in promoting charitable giving. In such a case, to best utilize public recognition as a promotion tool, organizations need to try to make target victims perceived as more socially distant from potential donors.

REFERENCES

Abrams, Dominic and Michael A. Hogg (2010), "Social identity and self-categorization," in *Handbook of prejudice, stereotyping, and discrimination*, ed. J. F. Dovidio, M. Hewstone, P. Glick, & V. M. Esses, London: Sage, 179–94.

Barnes, Byron D., Eileen Mason, Mark R. Leary, Jeff Laurent, Carole Griebel, and Allen Bergman (1988), "Reactions to Social vs. Self-Evaluation: Moderating Effects of Personal and Social Identity Orientations," *Journal of Research in Personality*, 22 (4), 513–24.

Basil, Debra Z., Mary S. Runte, M. Easwaramoorthy, and Cathy Barr (2009), "Company Support for Employee Volunteering: A National Survey of Companies in Canada," *Journal of Business Ethics*, 85 (2), 387–98.

Batson, C. Daniel and Nadia Y. Ahmad (2009), "Using Empathy to Improve Intergroup Attitudes and Relations," *Social Issues and Policy Review*, 3 (1), 141–77.

Bear, Adam and David G. Rand (2016), "Intuition, deliberation, and the evolution of cooperation," *Proceedings of the National Academy of Sciences*, 113 (4), 936–41.

Bénabou, Roland and Jean Tirole (2006), "Incentives and Prosocial Behavior," *American Economic Review*, 96 (5), 1652-78.

Cuddy, Amy J. C., Mindi S. Rock, and Michael I. Norton (2007), "Aid in the Aftermath of Hurricane Katrina: Inferences of Secondary Emotions and Intergroup Helping," *Group Processes and Intergroup Relations*, 10 (1), 107–18.

DiDonato, Theresa E., Johannes Ullrich, and Joachim I. Krueger (2010), "Social perception as induction and inference: An integrative model of intergroup differentiation, ingroup favoritism, and differential accuracy," *Journal of Personality and Social Psychology*, 100 (1), 66–83.

Giving USA Foundation (2006), Giving USA 2006, Glenview, IL: Giving USA Foundation.

Giving USA Foundation (2019), "Americans gave $427.71 billion to charity in 2018 amid complex year for charitable giving," https://givingusa.org/giving-usa-2019- americans-gave-427-71-billion-to-charity-in-2018-amid-complex-year-for-charitable-giving/

Harbaugh, William T. (1998), "The Prestige Motive for Making Charitable Transfers," *American Economic Review*, 88 (2), 277–82.

Hayes, Andrew F. (2013), An Introduction to Mediation, Moderation, and Conditional Process Analysis, New York, NY: Guilford Press.

Insko, Chester A., John Schopler, Lowell Gaertner, Tim Wildschut, Robert Kozar, Brad Pinter, Eli J. Finkel, Donna M. Brazil, Candy L. Cecil, Matthew R. Montoya (2001), "Interindividual–intergroup Discontinuity Reduction through The Anticipation of Future Interaction," *Journal of Personality and Social Psychology*, 80 (1), 95–111.

James, Trevor K. and Hanna Zagefka (2017), "The Importance of National Identities and Intergroup Relations in Disaster Aid," in Intergroup Helping, ed. Esther van Leeuwen and Hanna Zagefka, Switzerland: Springer International Publishing AG, 269–85.

Karlan, Dean and Margaret A. McConnell (2014), "Hey Look at Me: The Effect of Giving Circles on Giving," *Journal of Economic Behavior & Organization*, 106 (C), 402–12.

Levine, Mark, Amy Prosser, David Evans, and Stephen Reicher (2005), "Identity and Emergency Intervention: How Social Group Membership and Inclusiveness of Group Boundaries Shape Helping Behavior," *Personality and Social Psychology Bulletin*, 31 (4), 443–53.

Luhtanen, Riia and Jennifer Crocker (1992), "A Collective Self-Esteem Scale: Self-Evaluation of One's Social Identity," *Personality and Social Psychology Bulletin*, 18 (3), 302– 18.

Monin, Benoît and Alexander H. Jordan (2009), "The dynamic moral self: A social psychological perspective," Personality, identity, and character: Explorations in moral psychology, ed. Darcia Narvaez and Daniel K. Lapsley, New York, NY: Cambridge University Press, 341–54.

Mullen, Brian, Rupert Brown, and Colleen Smith (1992), "Ingroup Bias as A Function of Salience, Relevance, and Status: An integration," *European Journal of Social Psychology*, 22 (2), 103–22.

OCHA (2019), "Global Humanitarian Overview 2020," https://reliefweb.int/report/world/global-humanitarian-overview-2020-enarfrzh

Reed, Americus, II and Karl Aquino (2003), "Moral Identity and the Expanding Circle of Moral Regard toward Out-Groups," *Journal of Personality and Social Psychology*, 84 (June), 1270–86.

Sierksma, Jellie, Jochem Thijs, MaykelVerkuyten (2014), "Children's Intergroup Helping: The Role of Empathy and Peer Group Norms," *Journal of Experimental Child Psychology*, 126 (October), 369–83.

Simpson, Bonnie, Katherine White, and Juliano Laran (2018), "When Public Recognition for Charitable Giving Backfires: The Role of Independent Self-Construal," *Journal of Consumer Research*, 44 (6), 1257–73.

Tajfel, Henri and John C. Turner (1979), "An integrative theory of intergroup conflict," in The social psychology of intergroup relations, ed. W. G. Austin and S. Worchel, Monterey, CA: Brooks/Cole, 33–48.

Van Bavel, Jay J., Dominic J. Packer, and William A. Cunningham (2008), "The Neural Substrates of In-Group Bias: A Functional Magnetic Resonance Imaging Investigation," *Psychological Science*, 19 (11), 1131–39.

Zlatev, Julian J., Daniella M. Kupor, Kristin Laurin, and Dale T. Miler (2020), "Being "Good" or "Good Enough": Prosocial Risk and the Structure of Moral Self-Regard," *Journal of Personality and Social Psychology*, 118 (2), 242–53.

Political Ideology Driven Differences in Consumers' Switching Behavior for Differentially Involving Products

Hyerin Han, University of Minnesota, USA
Hyun Euh, University of Minnesota, USA
Hyesung Yoo, Washington University in St. Louis, USA
Akshay R. Rao, University of Minnesota, USA

EXTENDED ABSTRACT

Consumer switching indicates a consumer's voluntary movement from a current option to another option (Su et al. 2017). The present study adds to extant research which has identified psychological factors that lead consumers to deviate from buying the same product or brand repeatedly by identifying the role that political ideology might have on consumers' switching behavior. We predict that conservatives, due to their tendency to maximize, search for information about and switch products or brands more so than liberals do. However, this result is reversed for product classes which carry a high risk to consumers if they fail due to their high self-relevance.

Individuals with a high maximizing tendency seek out information about available options and compare them extensively with the goal of making the best choice (Schwartz et al. 2002). Consumers with a high maximizing tendency are less likely to settle for the current option and more likely to search every time they buy something even if a similar search process has been undertaken in the past, thus increasing the chance of switching (Carrillat, Ladik, and Legoux 2011).

We expect that political conservatism ought to be associated with higher levels of the tendency to maximize based on extant findings regarding the association between political conservatism and a Social Dominance Orientation (SDO). Conservatives tend to display a higher SDO defined as a motivational tendency that assures the high status of the in-group (Pratto 1994). This tendency to seek dominance and be the best in a hierarchy ought to result in high SDO individuals pursuing a goal of selecting the best option. Thus, we predict that as political conservatism increases, the tendency to maximize increases too due to high SDO which are traits associated with political conservatism. This tendency ought to yield higher switching following the search for the best option.

This effect should be observed, unless the adverse consequences associated with performance failure of the option to which they switch, are relatively high. In many cases, products which are highly relevant to the self (i.e., high involvement products), by being central to the person's identity or by providing solutions or benefits that are personally important, are more likely to carry a high risk to consumers if they fail compared to products that are low in self-relevance (i.e., low involvement products). When exposed to a high risk, people experience a diminished motivation to search for information and a lack of certainty. As a result, they are likely to stay with the status quo because they don't need to engage in information search if they stay with a current option, and also a known option offers a high sense of certainty (Thórisdóttir and Jost 2011). For the same reason, consumers are likely to not switch from an incumbent option for high involvement products. We predict that this inertia to cling to an incumbent option for high involvement products will be stronger among conservative consumers due to conservatives' higher threat sensitivity compared with liberals (Jost et al. 2017).

Hypothesis 1: *Conservatives will display greater switching behavior than liberals, but this effect will be reversed for high involvement products.*

Hypothesis 2: *Differences in switching behavior between conservatives and liberals will be mediated by their tendency to maximize, which will be reflected in their search behavior.*

We first examined the association between political conservatism and maximizing tendency through a pilot study. Two components of maximization – the goal of choosing the best option and the strategy of increased search among alternatives – were measured separately. The results of a regression on political conservatism showed that participants with right-wing (vs. left-wing) ideology reported higher scores on both components of maximization.

The goal of Study 1 was to test H1 by using a longitudinal panel data of U.S. households that provided their grocery shopping information. Five high involvement products (beer, coffee, cold medicine, female sanitary protection, and male contraceptive products) and five low involvement products (household cleaners, shampoo, air freshener, laundry detergent, and soap) were selected through a pretest. Switching rate was measured by the number of times a household switched from one brand to another as a percentage of its total number of purchases in a given product class. Each county's average Republican vote share for the 2012 and 2016 US Presidential elections was used as a county-level measure of political conservatism. We regressed the switching rates for high and low involvement products on county-level conservatism and control variables (e.g., household-specific demographics such as age, gender, race, income level). The results revealed that households in conservative counties were more (less) likely to switch brands for low (high) involvement products compared to those in liberal counties (Low: $\beta = 2.90$, $p < .001$; High: $\beta = -1.71$, $p < .001$).

In Study 2, we tested H2 by examining the mediational role of alternative search and the moderating role of product involvement on switching behavior. Participants read a passage ostensibly written to help them choose headphones. In the high involvement condition, headphones were depicted as highly self-relevant (e.g., a noise-canceling function helps you prevent hearing loss and enjoy music better), whereas the same features were described in a neutral way in the low involvement condition (e.g., noise-cancelling functions require a power source). After that, participants were asked to choose among five headphones. They could access the information of each headphone by clicking on its picture. After making their choice, they read that they had been generally satisfied with the headphone, but one day they had lost it and needed to buy a new one. They could select a headphone among five new headphones (coded as switching) or they could choose the headphone that they had originally selected (coded as non-switching). Alternative search was measured by the number of different headphones the participants examined before they made their second purchase decision. Supporting H2, the results of a moderated mediation analysis revealed the significant indirect effect of the interaction between political conservatism and product involvement on switching decision through alternative search (b = .23, SE = .10, 95% CI = [.05 to .46]).

REFERENCES

Carrillat, François A., Daniel M. Ladik, and Renaud Legoux (2011), "When the Decision Ball Keeps Rolling: An Investigation of the Sisyphus Effect among Maximizing Consumers," *Marketing Letters*, 22(3), 283-96.

Jost, John T. (2017), "The Marketplace of Ideology: 'Elective Affinities' in Political Psychology and Their Implications for Consumer Behavior," *Journal of Consumer Psychology*, 27(4), 502-20.

Pratto, Felicia, Jim Sidanius, Lisa M. Stallworth, and Bertram F. Malle (1994), "Social Dominance Orientation: A Personality Variable Predicting Social and Political Attitudes," *Journal of Personality and Social Psychology*, 67(4), 741-63.

Schwartz, Barry, Andrew Ward, Sonja Lyubomirsky, John Monterosso, Katherine White, and Darrin R. Lehman (2002), "Maximizing versus Satisficing: Happiness Is a Matter of Choice," *Journal of Personality and Social Psychology*, 83(5), 1178-97.

Su, Lei, Yuwei Jiang, Zhansheng Chen, and C. Nathan Dewall (2017), "Social Exclusion and Consumer Switching Behavior: A Control Restoration Mechanism," *Journal of Consumer Research*, 44(1), 99-117.

Thórisdóttir, Hulda and John T. Jost (2011), "Closed-Mindedness Mediates the Effect of Threat on Political Conservatism," *Political Psychology*, 32 (5), 785-811.

Can Money Buy International Migrants Happiness? It Depends on How You Spend It

Haiming Hang, University of Bath, UK
Jing Yang Zhong, Birmingham City University, UK

EXTENDED ABSTRACT

Subjective well-being (SWB) reflects people's own evaluations of and feelings toward the quality of their lives (Diener 1984). High levels of SWB can confer a variety of benefits, such as longevity (Chida and Steptoe 2008) and better health (Lamers et al. 2012). However, whether moving to another country can make international migrants happier remains unclear. A lack of a sense of belonging in host country has become the most common challenge facing international migrants (Hendriks 2015). This has raised wide concerns about their SWB. However, international migrants' material welfare still dominates current focus among policymakers. This is surprising because Diener and his colleagues have repeatedly argued that happiness is not determined by money but by fulfillment (or lack thereof) of basic psychological needs (Diener, Oishi, and Tay 2018).

In this paper, we first argue that international migrants prefer spending money on material purchases (acquiring a tangible object to keep in possession ,Van Boven and Gilovich 2003) to cope with their lack of a sense of belonging in host country. This, in turn, has a negative impact on their SWB. Building on the literature regarding whether money can buy happiness (Aknin, Wiwad, and Hanniball 2018), we suggest that both experiential purchases (acquiring a life experience to live through) (Van Boven and Gilovich 2003) and prosocial purchases (spending money on others rather than oneself) (Dunn, Aknin, and Norton 2008) can enhance international migrants' SWB, with prosocial purchases more effective than experiential purchases. We further argue that this is mainly because while both experiential purchases and prosocial purchases can satisfy relatedness need, the satisfaction from beneficence associated with prosocial purchases can independently contribute to SWB (Martela and Ryan 2016).

Study 1 (n = 151,602) used 10-year data from the BHPS to compare the consumption patterns and SWB levels of international migrants and locals in the U.K. The BHPS collected the panel's actual spending on material purchases such as personal properties. Experiential consumption was collected via the panel's monthly expenditures on leisure activities, entertainment and hobbies via an ordinal scale. Our model suggests the coefficients of migrant status was positive and statistically significant ($b = .17, p < .01$), suggesting the locals were happier than international migrants. Our results further suggest that compared to locals, international migrants spend more on materials but less on experiential purchases. The coefficient of material purchases was negative and statistically significant on SWB ($b = –.02, p < .05$) while experiential purchases were positive and statistically significant ($b = .03, p < .001$). That is to say, material purchases had a negative impact on SWB, experiential purchases had a positive impact. This may contribute to the lower SWB of the international migrants. A parallel mediation analysis (PROCESS Model 4) support this, with the indirect effects on material purchases ($b = –.0285, 95\% \, CI = –.0361, –.0211$) and experiential purchases ($b = .0245, 95\% \, CI = .0176, .0315$) both significant.

Study 2 (n = 400) was a one-factor (sense of belonging: low vs. high) between-subject design. Participants were randomly asked to recall a memorable event after moving to the USA that made them feel they belong/did not belong to the country. For each migrant, we measured their basic psychological needs as in Chen et al. (2015) and their preferences for experiential purchases as in Kumar and Gilovich (2016). We also measured participants' preferences between material and prosocial purchases. Results suggest low sense of belonging were less likely to prefer prosocial purchases ($M_{low} = –.16, M_{high} = 1.71, F (1, 280) = 35.17, p < .001$), and less likely to prefer experiential purchases ($M_{low} = .22, M_{high} = 1.58, F (1, 280) = 16.56, p < .001$). They also had lower life satisfaction ($M_{low} = 6.45, M_{high} = 7.29, F (1, 280) = 11.60, p < .01$).

Study 3 (n = 598) was a 2 (sense of belonging: high vs. low) × 3 (purchase type: material vs. experiential vs. prosocial) between-subject design. Purchase type was manipulated in the same way as in Van Boven and Gilovich (2003). In order to gather participants' beneficence satisfaction, we used the four-item scale from Martela and Ryan (2016). Results suggest for participants in the low sense of belonging condition, their SWB differed across purchase type: $F (2, 293) = 14.28, p < .001$, with prosocial purchase leading to highest SWB. However, purchase type did not influence participants' SWB in the high sense of belonging condition. Following Martela and Ryan (2016), we used a hierarchical regression analysis to test the independent contribution of beneficence satisfaction to SWB. We found when beneficence was incorporated in the model, R-squared change was statistically significant: $F (1, 593) = 44.34, p < .001$. Thus, the impact of beneficence satisfaction on SWB is different from the impact of psychological need satisfaction.

Study 4 (n = 306) was a one-factor (purchase type: experiential vs. prosocial with high beneficence satisfaction vs. prosocial with low beneficence satisfaction) between-subject design. Results indicated that SWB differed across conditions ($F (2, 299) = 3.29, p < .05$), with prosocial purchases with high beneficence satisfaction leading to highest SWB while the other two conditions did not differ. The same pattern was evident for participants' relatedness need satisfaction ($F (1, 299) = 4.05, p < .05$). Thus, prosocial purchases with high beneficence satisfaction can more effectively satisfy relatedness need than experiential purchases.

Together, our studies demonstrate that coping with psychological threats such as the lack of a sense of belonging in host country makes international migrants spend money suboptimally. Study 1 shows that compared to locals, international migrants spend more on material purchases but less on experiential purchases, which in turn leads to their lower SWB. More importantly, our Studies 2, 3 and 4 suggest that prosocial purchases are more effective than experiential purchases in increasing international migrants' SWB. The results of Studies 3 and 4 suggest that this is because prosocial purchases can lead to both relatedness needs satisfaction and beneficence satisfaction, with each of them independently contributing to international migrant workers' SWB.

REFERENCES

Aknin, Lara B., Dylan Wiwad, and Katherine B. Hanniball (2018), "Buying Well-Being: Spending Behavior and Happiness," *Social and Personality Psychology Compass*, 12(5), e12386.

Carter, Travis J., and Thomas Gilovich (2010), "The Relative Relativity of Material and Experiential Purchases," *Journal of Personality and Social Psychology*, 98(1), 146–59.

Chen, Beiwen, Jasper Van Assche, Maarten Vansteenkiste, Bart Soenens, and Wim Beyers (2015), "Does Psychological Need Satisfaction Matter When Environmental or Financial Safety Are At Risk?" *Journal of Happiness Studies*, 16(3), 745–66.

Chida, Yoichi, and Andrew Steptoe (2008), "Positive Psychological Well-Being and Mortality: A Quantitative Review of Prospective Observational Studies," *Psychosomatic Medicine*, 70, 741–56.

Diener, Ed (1984), "Subjective Well-Being," *Psychological Bulletin*, 95, 542–75.

_____, Shigehiro Oishi, and Louis Tay (2018), "Advances in Subjective Well-Being Research," *Nature Human Behaviour*, 2, 253–60.

Dunn, Elizabeth W., Lara B. Aknin, and Michael I. Norton (2008), "Spending Money on Others Promotes Happiness," *Science*, 319(5870), 1687–88.

Gilovich, Thomas, Amit Kumar, and Lily Jampol (2015), "A Wonderful Life: Experiential Consumption and the Pursuit of Happiness," *Journal of Consumer Psychology*, 25(1), 152–65.

Goldberg, David P. (1972). The detection of psychiatric illness by questionnaire. Oxford: Oxford University Press.

Hendriks, Martijn (2015), "The Happiness of International Migrants: A Review of Research Findings," *Migration Studies*, 3(3), 343–69.

International Organization of Migration (2018), "World Migration Report 2018," accessed via https://www.iom.int/wmr/world-migration-report-2018

Kumar, Amit, and Thomas Gilovich (2015), "Some "Thing" to Talk About? Differential Story Utility from Experiential and Material Purchases," *Personality and Social Psychology Bulletin*, 41(10), 1320–31.

Lamers, Sanne M. A., Linda Bolier, Gerben J. Westerhof, Filip Smit, and Ernst T. Bohlmeijer (2012), "The Impact of Emotional Well-Being on Long-Term Recovery and Survival in Physical Illness: A Meta-Analysis," *Journal of Behavioral Medicine*, 35(5), 538–47.

Luedicke, Marius K. (2011), "Consumer Acculturation Theory: (Crossing) Conceptual Boundaries," *Consumption Markets and Culture*, 14(3), 223–44.

Martela, Frank, and Richard M. Ryan (2016), "Prosocial Behavior Increases Wellbeing and Vitality Even without Contact with the Beneficiary: Causal and Behavioral Evidence," Motivation and Emotion, 40, 351–57.

Richins, Marsha L. (2004), "The Material Values Scale: Measurement Properties and Development of a Short Form," *Journal of Consumer Research*, 31(1), 209–19.

Van Boven, Leaf, and Thomas Gilovich (2003), "To Do or to Have? That Is the Question," *Journal of Personality and Social Psychology*, 85(6), 1193–1202.

The Social Power of Narcissists in Mass Customization

Johanna Hasenmaile-Aspin, University of St. Gallen, Switzerland
Emanuel de Bellis, University of St. Gallen, Switzerland
Andreas Herrmann, University of St. Gallen, Switzerland

EXTENDED ABSTRACT

Consumers are increasingly flooded with information, not only from firms but also from peers. Providing information online through electronic word of mouth (eWOM) enables consumers to communicate about products, services, and brands (Rosario et al. 2016). Whereas much is known about the consequences of eWOM and its underlying processes (Berger 2014; Chevalier and Mayzlin 2006; Hennig-Thurau et al. 2004), less attention has been paid to which communication by which consumers has which influence. Exploring this issue, we propose that narcissism is key to understanding the effectiveness of eWOM.

We conceptualize narcissism as unjustified conceit, which implies excessive motivation to self-enhance (Lee et al. 2013). Narcissists are highly self-centered, persistently seek attention, and often consider themselves the epicenter of their social world (Sedikides et al. 2002). Their social interactions are shaped by the need to boast about their achievements (Sedikides et al. 2007). Narcissists communicate to convey "heroic I" messages; this self-centered "configuration of selfhood" means that narcissists strive to be the heroes of their own stories (Goodman, Dueck, and Langdal 2010, 667). The prevailing opinion is that narcissistic communication is I-centered as narcissists tend to use more first-person singular ("I" and "me") than plural ("we" and "us") pronouns compared to non-narcissists (Chatterjee and Hambrick 2007; Raskin and Shaw 1988). However, this relationship has been examined with contradictory results. Some studies have not found a significant correlation between I-centered communication and narcissism (Carey et al. 2015; DeWall et al. 2011; Fast and Funder 2010). It remains unclear how narcissists communicate—especially in specific settings such as mass customization (MC) systems.

Our research integrates insights from eWOM and narcissistic communication into the MC domain. Integrating social elements into MC systems is attracting increasing attention across industries as consumers can share and discuss their customized products (e.g., cars or sneakers) directly with their peers via social product configurators. Thus far, little is known about the consequences of integrating elements of social interaction into MC systems. The few existing systematic studies have examined how feedback impacts the uniqueness of product designs, the role of social distance in product modifications, and satisfaction with self-designed products (D'Angelo, Diehl, and Cavanaugh 2019; Hildebrand et al. 2013; Schlager et al. 2018). However, none has investigated whether and how communication styles in consumer feedback messages affect peers when customizing products.

We propose that narcissistic consumers employ self-promoting interaction patterns in social product configurators. When narcissistic consumers share their customized products, their underlying motivation is to highlight their greatness (Goodman et al. 2010). They are hence likely to use more first-person singular pronouns compared to non-narcissists.

Hypothesis 1: *The greater consumers' narcissistic tendencies, the more they use I-centered (vs. product-centered) communication in social product configurators.*

How does such narcissistic (i.e., I-centered) communication, beside a shared configuration, affect others? We expect this type of message to tell peers that the product designer identifies with the customized product. Its use of "I" makes such communication seem more authentic and competent, and thus more influential (Brunell et al. 2008). Therefore, when consumers can repeat their configuration, we suspect that they are influenced by a narcissist's sample configuration, resulting in an adjustment of their original configuration.

Hypothesis 2: *Consumers adjust their own customized product to their peers' sample configuration if its presentation is I-centered (vs. product-centered).*

Peer input on evaluating preliminary design solutions can have positive effects (Franke, Keinz, and Schreier 2008). However, social comparisons and deviating from initial preferences can devalue self-designed products (Hildebrand et al. 2013). Thus, while consumers likely adjust their customized product more to a narcissist's sample configuration, we expect them to be less satisfied with their own customized product because they perceive narcissists' configurations as more competently customized.

Hypothesis 3: *Consumers perceive their own customized products less favorably after seeing an I-centered (vs. product-centered) sample configuration.*

Our pilot study (field study; N=64) explored how social networks impact a recent car purchase and how consumer communication depends on narcissistic tendencies. We found that narcissists more frequently use social networks and that narcissistic tendencies predict the use of first-person singular pronouns. Therefore, narcissists can be described as opinion leaders heavily using first-person singular pronouns when communicating via social networks.

Study 1 (online study, N=146) examined how narcissists' messages impact peer product customization. We employed a 2 (perspective: I-centered vs. product-centered) × 2 (appraisal: appraising vs. non-appraising) between-subjects design. Having measured narcissistic tendencies, participants configured a car with a mock-up configurator. Next, they were randomly assigned to a sample configuration along with an experimentally manipulated message. We created four sample configurations (to be used with one of four messages) that varied in terms of perspective (I-centered vs. product-centered), appraisal, and whether attribute options were made explicit. Finally, participants configured their car a second time. Using the adjustment index, we computed the difference between customizations 1 and 2. Overall, consumers receiving an I-centered (vs. product-centered) message were significantly more likely to adjust their customized product to a sample configuration.

Study 2 (lab study, N=169) explored whether consumers were satisfied with their customized product after receiving a narcissistic sample configuration. Participants configured a car and evaluated their customized product. Next, they were randomly assigned to one of four experimentally manipulated messages and shown one of four fully configured cars supposedly posted on a social network. Finally, they reevaluated their customized product by responding to diverse variables. Overall, consumers consistently evaluated their customized product more negatively (e.g., decreased choice satisfaction,

pride of authorship, fit of configured features) after seeing a narcissistically communicated sample configuration while expressing a greater desire to reconfigure their customized product.

Our research highlights the social power of narcissists in MC systems. Narcissistic communication seems critical to understanding the effectiveness of eWOM and to determining what cuts through the noise and influences consumers in social product configurators. We contribute to three literature streams—eWOM, narcissism, and MC—by demonstrating that narcissistic (vs. non-narcissistic) communication in social product configurators is more influential while decreasing consumers' satisfaction with their customized products.

REFERENCES

Berger, Jonah (2014), "Word of mouth and interpersonal communication: A review and directions for future research," *Journal of Consumer Psychology,* 24 (4), 586–607.

Brunell, Amy B., William A. Gentry, W. Keith Campbell, Brian J. Hoffman, Karl W. Kuhnert, and Kenneth G. DeMarree (2008), "Leader emergence: The case of the narcissistic leader," *Personality and Social Psychology Bulletin,* 34 (12), 1663–76.

Carey, Angela L., Melanie S. Brucks, Albrecht C. P Küfner, Nicholas S. Holtzman, Fenne große Deters, Mitja D. Back, … Matthias R. Mehl (2015), "Narcissism and the use of personal pronouns revisited," *Journal of Personality and Social Psychology,* 109 (3), e1–e15.

Chatterjee, Arijit and Donald C. Hambrick (2007), "It's all about me: Narcissistic chief executive officers and their effects on company strategy and performance," *Administrative Science Quarterly,* 52 (3)*,* 351–86.

Chevalier, Judith and Dina Mayzlin (2006), "The effect of word of mouth on sales: Online book reviews," *Journal of Marketing Research,* 43 (3)*,* 345–54.

D'Angelo, Jennifer K., Kristin Diehl, and Lisa A. Cavanaugh (2019), "Lead by Example? Custom-Made Examples Created by Close Others Lead Consumers to Make Dissimilar Choices," *Journal of Consumer Research*, 46 (4), 750–73.

DeWall, C. Nathan, Laura. E. Buffardi, Ian Bonser, and W. Keith Campbell (2011), "Narcissism and implicit attention seeking: Evidence from linguistic analyses of social networking and online presentation," *Personality and Individual Differences,* 51 (1), 57–62.

Fast, Lisa A. and David C. Funder (2010), "Gender Differences in the Correlates of Self-Referent Word Use: Authority, Entitlement, and Depressive Symptoms," *Journal of Personality*, 78 (1), 313–38.

Franke, Nikolaus, Peter Keinz, and Martin Schreier (2008), "Complementing mass customization toolkits with user communities: How peer input improves customer self-design," *Journal of Product Innovation Management,* 25 (6), 546–59.

Goodman, David M., Alvin Dueck, and Julia P. Langdal (2010), "The 'heroic I': A levinasian critique of western narcissism," *Theory and Psychology,* 20 (5), 667–85.

Hennig-Thurau, Thorsten, Kevin P. Gwinner, Gianfranco Walsh, and Dwayne D. Gremler (2004), "Electronic word-of-mouth via consumer-opinion platforms: What motivates consumers to articulate themselves on the Internet?" *Journal of Interactive Marketing,* 18 (1), 38–52.

Hildebrand, Christian, Gerald Häubl, Andreas Herrmann, and Jan R. Landwehr (2013), "When social media can be bad for you: Community feedback stifles consumer creativity and reduces satisfaction with self-designed products," *Information Systems Research,* 24 (1), 14–29.

Lee, Seung Yun, Aiden P. Gregg, and Seong Hoon Park (2013), "The person in the purchase: Narcissistic consumers prefer products that positively distinguish them," *Journal of Personality and Social Psychology,* 105 (2)*,* 335–52.

Raskin, Robert and Robert Shaw (1988), "Narcissism and the use of personal pronouns," *Journal of Personality,* (2)*,* 393–404.

Rosario, Ana Babic, Francesca Sotgiu, Kristine De Valck, and Tammo H. A. Bijmolt (2016), "The effect of electronic word of mouth on sales: A meta-analytic review of platform, product, and metric factors," *Journal of Marketing Research,* 53 (3), 297–318.

Sedikides, Constantine, W. Keith Campbell, Glenn D. Reeder, Andrew J. Elliot, and Aiden P. Gregg (2002), "Do others bring out the worst in narcissists? The "others exist for me" illusion," In Y. Kashima, M. Foddy, and M. J. Platow (Eds.), *Self and Identity: Personal, Social, and Symbolic* (pp. 103–124). Mahwah, NJ: Lawrence Erlbaum Associates Publishers.

Sedikides, Constantine, Aiden P. Gregg, Sylwia Cisek, and Claire M. Hart (2007), "The I that buys: Narcissists as consumers," *Journal of Consumer Psychology,* 17 (4), 254–57.

Schlager, Tobias, Christian Hildebrand, Gerald Häubl, Nikolaus Franke, and Andreas Herrmann (2018), "Social product-customization systems: Peer input, conformity, and consumers' evaluation of customized products," *Journal of Management Information Systems*, 35 (1), 319–49.

When Brands Speak: The Effects of Personified Content on Word of Mouth

Daniel He, National University of Singapore, Singapore
Jin Miao, Columbia University, USA

EXTENDED ABSTRACT

Pepsi thought it had all the right ingredients: a winsome celebrity, stirring music and imageries, and a timely commentary on social activism. However, when the Kendall Jenner "Live for Now" ad debuted in 2017, outrage over the perception that Pepsi was trivializing social justice spread so quickly on social media that the beverage brand immediately issued an apology and removed the advertisement just a day after its release (Victor 2017). Pepsi is not alone in releasing well-intended marketing campaigns that unwittingly elicited consumer backlash.

Numerous brands both before and after the Live for Now misstep have experienced the same fundamental challenge facing all digital marketers: losing control of word of mouth on social media.

Although social media has given brands the ability to reach more consumers with greater precision at a lower cost (Berger and Milkman 2011; Berger and Schwartz 2011; Moe and Schwedel 2012; Lamberton and Stephen 2016), the benefits come at the expense of forgoing control over what consumers say about the brand. In the past, brands have relied on a combination of social influence and review management to better manage word of mouth. For example, recognizing the benefit of information cascade (Muchnik, Aral, and Taylor 2013), hotels manage their online reputation by actively responding to customer reviews on travel forums (Proserpio and Zervas, 2017). Other businesses rely on more insidious methods by manipulating online reviews (Mayzlin, Dover, and Chevalier 2014) or by soliciting fake positive reviews with monetary incentives (Luka and Zervas 2016).

However, existing methods of word of mouth management are reactive in nature and focus on improving product reviews instead of improving word of mouth of the brand. In this research, we document a proactive approach that can inoculate the brand itself from negative word of mouth. We find that brands can improve word of mouth by incorporating distinctly human characteristics into their online content, which we call personified content, to help anthropomorphize the brand. Unlike the more formal messages that firms typically send, personified content expresses distinctly human attributes, including the ability to think and feel, the capacity for creativity, and the presence of a personality. Using 5 years of Twitter data from National Basketball Association (NBA) teams, we find that we find that personified brands not only have more positive word of mouth compared to non-personified brands, but that when the need to defend the brand arises (*i.e.,* losing games), the benefit of personified brands on word of mouth is further increased.

Literature Review

Before social media, brands lacked the means to speak directly to consumers; instead, they relied on intermediaries like spokespersons, mascots, or their executives to communicate on behalf of the brand. For example, although the brand Disney could not literally speak on TV or the radio, Mickey could lend his voice to speak on behalf of the brand.

On social media, brands can not only transmit information to their followers, but they can also express their voice and personality based on how they communicate. Brands like Wendy's Burgers have taken advantage of this opportunity to cultivate a vibrant and sassy personality by tweeting jokes, picking fights with rival brands, and referencing cultural trends (Jargon 2017).

Instead of merely using social media as an additional channel to answer questions, promote products, and collect feedback, brands like Wendy's now transmit content that incorporate distinctly human characteristics to anthropomorphize the brand, a phenomenon we call personified content.

The extensive literature on anthropomorphism show that ascribing humanlike qualities to products can improve perception of those goods (Aggarwal and McGill 2007; Aggarwal and McGill 2011; Kim, Chen, and Zhang 2016). This occurs in part because greater relatability can cultivate stronger relationships with the products. For example, Epley et al. (2007) document a relationship between the tendency to anthropomorphize and the desire for relationship by showing that individuals with a higher need to belong are more likely to anthropomorphize objects and nonhuman agents. Similarly, people who are chronically lonely or primed to feel lonely anthropomorphize to a greater extent than those who are not (Epley et al. 2008), and satisfying people's need to belong by reminding them of their social connections attenuates the tendency to anthropomorphize (Bartz, Tchalova, and Fenerci 2016).

Whereas past work have manipulated anthropomorphism by assigning humanlike features, such as adding a face, a smile, a gender, or a name to a product (Epley, Waytz, and Cacioppo 2007; Zhou, Kim, and Wang 2018), we examine incorporating distinctively humanlike traits through language expressed through digital content. Specifically, we focus on humanlike qualities, including thinking, feeling (Epley et al. 2008), and personality (Aaker 1997), as determinants of personified content and investigate how word of mouth is influenced by brands that frequently shares personified content.

We predict and find that the brands that use personified content not only has more positive word of mouth compared to non-personified brands, but that these benefits further increase at times when a brand relationship is tested. Specifically, when the brand is attacked due to poor performance, personified brands experience even more positive word of mouth compared to non-personified brands.

Archival Study

Because personified content is a recent phenomenon, it is important to study how real brands are actually personifying their digital content. Thus, we collected 5 years of twitter data of every team in the National Basketball Association (NBA), which includes every tweet that each of the 30 teams had shared (*i.e.,* parent tweet) as well as every user tweet that were posted in response to the teams' tweet (*i.e.,* child tweet).

We chose to examine NBA tweets for three key reasons. First, NBA teams are some of the most well-known and beloved brands in the world, which made them suitable to study how word of mouth differs between personified and non-personified brands. Second, compared to brands in other industries, numerous NBA teams have begun to personify their content within the 5 year period of collected data, which shed light on how the transition from non-personified to personified content affects word of mouth. Lastly, given that the 30 teams in the NBA are in the same industry and share the same seasonal schedule, idiosyncratic differences between the brands are minimized to make for more meaningful comparisons.

What is Personified Content?

Using posts on Twitter and ratings provided by human raters, we first analyzed how personified tweets differ from non-personified tweets across distinctively humanlike dimensions. We recruited 15 research assistants who collectively coded over 27,000 unique parent tweets that were randomly selected from the complete data set of Twitter posts from every team in the National Basketball Association. Each tweet was rated by different combinations of 3 human coders along 10 dimensions, including personification and 9 other measures that were predicted to be determinants of personification. Specifically, five of these other categories measured humanlike characteristics, including expressing emotion, humor, cognition, creativity, and popular culture awareness. Four of the other measures were adapted from the dimensions of brand personality (Aaker 1997), including sincerity, maturity, sassiness, and social. We find that other than maturity, personification significantly correlates with all measures ($p < 0.01$).

How do Personified Content Affect Word of Mouth?

We build regression models to test the hypothesis that personified brands will not only have better word of mouth than non-personified brands, but that this difference will also increase when the brand is under attack (i.e., negative shocks). Using the personification scores rated by the human coders, we classified the 30 NBA teams into three categories – *High Personified Teams, Medium Personified Teams, Low Personified Teams* – ($M_{High} = 2.02$, $M_{Medium} = 1.79$, $M_{Low} = 1.62$, $F(2, 94197) = 856.5$, $p < 0.001$). We collected all 1.4 million replies in response to all the NBA tweets during the period of October 2014 to April 2019 and measured the corresponding word of mouth using two separate text analysis software: LIWC and the Stanford Natural Language Processing (NLP) parser. A composite and standardized measure of reply sentiment was constructed with the optimal weights determined by Principal Component Analysis.

As evidenced in figure 1, on average word of mouth is positive at the beginning of the season and becomes negative by week 4. Regression analysis shows that tweets from highly personified teams generated significantly more positive word of mouth than those from lowly personified teams. All else being equal, with one point higher in personification score, word of mouth valence would increase by 0.047 points, which translated to 0.04 standard deviation.

In the context of NBA teams, the brand is often attacked when they perform poorly.

Thus, we operationalized attacks on the brand as losses in games. The results reveal that although on average, all brands experience more negative word of mouth following a loss, this effect was attenuated for highly personified teams. More specifically, following a loss, the impact of negative word of mouth was reduced by as much as 69.2% for highly personified teams compared non-personified teams.

Interestingly, the relationship between personification and word of mouth only held during the regular season. During the playoffs, both the main effect of personification and the interaction between personification and losses were no longer significant. One probable mechanism is that consumers were more results-oriented during the playoffs, in which each loss could be season ending. Thus, the playoffs may represent a boundary condition for the effect of personification on word of mouth.

Fixed Effects Model

A potential weakness in the previous analysis is that highly personified teams and lowly personified teams are not comparable due to differences other than the level of personification in their digital content. To control for differences that might arise from differences in performance, reputation, or market size across teams, we built fixed effect regression models to tease out idiosyncratic differences between each team. Specifically, to take advantage of the time series aspect of the data, we first constructed more precise classification of personified teams by identifying the year in which a team adopted personified content. For example, a team that was highly personified in the 2018 season could have been lowly personified three years prior. Thus, we classified each season for each team into one of three more refined categories – *High Personification Team-Year, Medium Personification Team-Year, Low Personification Team-Year*. The results show that tweet-level personification score are significantly different across the three groups ($M_{High} = 1.85$, $M_{Medium} = 1.70$, $M_{Low} = 1.53$, $F(2, 94197) = 965.9$, $p < 0.001$).

The fixed effect regression replicates our main finding, showing that personification reduced negative word of mouth. All else being equal, with one point higher in personification score, word of mouth valence would increase by 0.069 points, which translated to 0.058 standard deviation. Similar to our previous analysis, the effect size of personification on word of mouth valence is much smaller during playoffs and more than double during off-seasons. Moreover, the effect of losing one game on word of mouth valence is quite consistent before and after controlling team-related factors. All else being equal, word of mouth valence after a loss was 0.176 points lower than that after a win, which translated to 0.144 standard deviation. We found supporting evidence for that attacks on the brand, represented by losses, have less of an effect on the word of mouth of personified brands than non-personified brands. More specifically, when brands were under attack, highly personified content, compared with highly non-personified content, reduced the impact of loss on word of mouth valence by as much as 49.3%.

In addition, we found a small but significant effect of expectation on word of mouth.

Compared to a normal loss, losing a game in which a team is favored to win should arouse more intense negative word of mouth. To test the impact of expectation, we collected Las Vegas betting lines for each of the games that was played during the period of our word of mouth data. Whereas a positive betting line represents an underdog status, a negative betting line means that a team that is favored in a match. The results show that on average, consumers express more positive word of mouth for underdog teams that lose than for favored teams that lose. Moreover, this effect was accentuated for personified teams, in which highly personified underdog teams experienced more favorable word of mouth compared to lowly personified underdog teams.

Discussion

One of the greatest challenges digital marketers face is the loss of control on social media. Although social media has enabled firms to reach more consumers at lower costs, marketers cannot control what consumers say to one another. In this research, we propose and find that word of mouth can be improved by personifying a brand's social media content.

Compared to the lowly personified NBA teams, highly personified teams not only have more positive word of mouth throughout the season, but this difference is further strengthened following losses. This suggest that personified content can be used as a proactive measure to inoculate brands against future attacks that normally arouse intense negative word of mouth.

REFERENCES

Aaker, Jennifer L. (1997), "Dimensions of Brand Personality," *Journal of Marketing Research*, 34(3), 347-356.

Aggarwal, Pankaj and Ann L. McGill (2007), "Is This Car Smiling at Me? Schema Congruity as a Basis for Evaluating Anthropomorphized Products," *Journal of Consumer Research*, 34, 468-79. (2012), "When Brands Seem Human, Do Humans Act Like Brands? Automatic Behavioral Priming Effects of Brand Anthropomorphism," *Journal of Consumer Research*, 39, 307- 23.

Bartz, Jennifer A., Kristina Tchalova, and Can Fenerci (2016), "Reminders of Social Connection Can Attenuate Anthropomorphism: A Replication and Extension of Epley, Akalis, Waytz, and Cacioppo (2008)," *Psychological Science,* 27(12), 1644-1650.

Berger, Jonah and Katherine L. Milkman (2011), "What Makes Online Content Viral?" *Journal of Marketing Research*, 49(2), 192-205.

Epley, Nicholas, Scott Akalis, Adam Waytz, and John T. Cacioppo (2008), "Creating Social Connection through Inferential Reproduction: Loneliness and Perceived Agency in Gadgets, Gods, and Greyhounds," *Psychological Science,* 19(2), 114-120.

Epley, Nicholas, Adam Waytz, and John T. Cacioppo (2007), "On Seeing Human: A Three-Factor Theory of Anthropomorphism," *Psychological Review*, 114(4), 864-886.

Jargon, Julie (2017), "You Want Snark with Those Fries? No One Is Safe from Wendys' Tweets," *Wall Street Journal*, https://www.wsj.com/articles/you-want-snark-with-those-fries-no- one-is-safe-from-wendys-tweets-1500995026.

Luca, Michael and Georgios Zervas (2016), "Fake It Till You Make It: Reputation, Competition, and Yelp Review Fraud," *Management Science,* 62(12), 3412-3427.

Mayzlin, Dina, Yaniv Dover, and Judith Chevalier (2014), "Promotional Reviews: An Empirical Investigation of Online Review Manipulation," *American Economic Review*, 104(8), 2421- 2455.

Kim, Sara, Rocky Peng Chen, and Ke Zhang (2016), "Anthropomorphized Helpers Undermine Autonomy and Enjoyment in Computer Games," *Journal of Consumer Research*, 43, 282- 302.

Lamberton, Cait, and Andrew T. Stephen (2016), "A Thematic Exploration of Digital, Social Media, and Mobile Marketing: Research Evolution from 2000 to 2015 and An Agenda for Future Inquiry," *Journal of Marketing* 80(6), 146-172.

Moe, Wendy W. and David A. Schweidel (2012), "Online Product Opinions: Incidence, Evaluation, and Evolution," *Marketing Science* 31(3), 372-386.

Pennebaker, James W., Ryan L. Boyd, Kayla Jordan, and Kate Blackburn (2015), *The Development and Psychometric Properties of LIWC2015*.

Proserpio, Davide and Georgios Zervas (2017), "Online Reputation Management: Estimating the Impact of Management Responses on Consumer Reviews," *Marketing Science*, 36(5), 645- 665.

Victor, Daniel (2017), "Pepsi Pulls Ad Accused of Trivializing Black Lives Matter," *New York Times*, https://www.nytimes.com/2017/04/05/business/kendall-jenner-pepsi-ad.html

Zhou, Xinyue, Sara Kim, and Lili Wang (2018), Money Helps When Money Feels: Money Anthropomorphism Increases Charitable Giving, *Journal of Consumer Research*, 45, 953-972.

Travelling Thoughts: The Downstream Effect of Prospective Experiential Materials on the Purchase Intentions of Experiences

Kimberley van der Heijden, Maastricht University, The Netherlands
Caroline Goukens, Maastricht University, The Netherlands
Anouk Festjens, Maastricht University, The Netherlands
David Gal, University of Illinois at Chicago (UIC), USA

EXTENDED ABSTRACT

Consumers typically consider dozens of prospective experiential materials (e.g., pictures of a vacation resort) prior to purchasing experiences (e.g., a vacation) — allowing their mind to latch on to good times ahead. For experiences in particular, this pre-factual savoring can stretch the enjoyment and pleasure derived from them beyond the actual experiential event (Kumar, Killingsworth and Gilovich 2014). Even more, the joy sparkling from anticipating an experience can subsequently even enhance the *actual* experience (Chun, Diehl and MacInnes 2017).

Thus, existing research advises practitioners to turn to tactics inducing savoring, and thus to increase the amount of prospective experiential materials that consumers are exposed to. Nevertheless, we add caution to this recommendation. Most of the experiential materials that are being offered (brochures, trailers, etc.) are meant to cater consumers early in their decision process. While it might be the case that pre-factual imagination enhances the actual experience, we propose that it might equally well be the case that it prompts consumers to decide to forego the experience, as he or she pre-factually already lived the experience, and thus feels satiated on his or her need to engage in the actual experience.

Prior research—mainly in the food domain—lends supports to the possibly satiating qualities of stimulus exposure: With extensive exposure to a stimulus, a decrease in motivational and hedonic response can be observed (e.g., Groves and Thompson 1970; McSweeney and Swindell 1999). In line with this thought, both behavioral (Morewedge, Huh and Vosgerau 2010, Larson, Redden and Elder 2013, Kappes and Morewedge 2016) and brain imaging research (e.g. Jeannerod 1994, 2001) suggest that mental simulations (e.g., elicited by exposure to certain stimuli) elicit similar—satiating—responses as actual experiences, and thus potentially reduce the desire for experiences.

At first sight, our hypothesis seems to contradict prior research stressing the positive consequences of savoring prospective information on subsequent purchase intentions (e.g. Petrova and Cialdini 2005). However, a methodological characteristic of all existing studies is that the amount of experiential information presented was highly limited. As such, prior research corroborates findings in consumption research showing the sensitizing effects of imagery (e.g. Dadds et al.,1997) and is highly analogous to the "whet-the-appetite" effect of initial stimulus exposure (e.g. McSweeney and Swindell 1999). Real-world situations, on the contrary, often provide a wealth of experiential information, sometimes even an overwhelming amount.

Five studies test our hypotheses. First, we propose that exposure to an extensive (vs. limited) set of experiential materials will make consumers less willing to further engage in the experience (studies 1 N=152 MTurk and studies 2 – 4). In this study, participants were asked to imagine that they were planning a vacation at the Maldives and were considering booking a particular resort. They were then given a brief written description of the resort and a series of pictures (limited condition: 4 pictures of different scenes of the resort; extensive condition: 12 pictures zooming in on the scenes depicted in the limited condition). After inspecting the pictures, participants were asked to indicate their inclination to book a room at that particular resort and filled out the dispositional imagery vividness scale (Marks 1972), the latter of which was used in the analyses as a covariate. In our second study, we additionally manipulated the consumption goal in a 2(set size: limited vs. extensive set) x 2(hedonic vs. utilitarian) between-subjects design (study 2 N=205 MTurk). We propose that our effect only holds in the context of experiential purchases (i.e. booking a vacation) and not for utilitarian purchases (i.e., buying an accommodation as an investment), where the experiential materials are rather inspected to obtain practical benefits (Pham 1998). Furthermore, in two subsequent studies we tested whether feelings of satiation mediate our effect (cf. methods by Haws, McFerran and Redden 2017; Redden and Haws 2013) (study 3 N=110 students, study 4 N=209 online pool). In study 4 we also test whether salience of repetitiveness in particular is driving our effect. In a single factor between subjects design we exposed participants to either a limited set of experiential materials, an extensive set with similar experiential materials (like previous studies, zooming in on scenes depicted in the limited set) or an extensive set with dissimilar experiential materials (i.e. showing different pictures of the different scenes). Additionally, we measured attractiveness of the pictures. Finally, in our last study we exposed participants to multiple resorts (i.e., providing a more realistic scenario) and employed a 2(set size: limited vs. extensive set) x 2(replication set: resort A depicted through extensive set (B through limited set) vs. resort A depicted through limited set (B through extensive set)) mixed-design.

Across five studies, we demonstrate that exposure to an extensive (vs. limited) set of experiential materials will satiate consumers from the experience as they enable consumers to live the experiential event to such an extent that they are less willing to further engage in the experience (studies 1-4). We only find this effect in the context of experiential and not for utilitarian purchases (study 2). Furthermore, we provide explicit process evidence by showing a mediation effect of satiation (study 3 and 4). Moreover, we demonstrate that particular salience of the repetitiveness of the experiential materials is most detrimental to consumers' willingness to engage further in the experience. We also demonstrate that our findings are not due to a difference in attractiveness between the conditions. Finally, when given the choice between two similar travel options, consumers also prefer to further engage in the option that was presented with a limited (vs. extensive) set of pictures (study 5).

This paper thus challenges conventional wisdom that more is always better. Overall, existing research thus advises practitioners to turn to tactics inducing imagination (e.g., Chun et al. 2017), and thus to increase the amount of prospective experiential materials that consumers are exposed to. We add cautious to this recommendation as it might equally well be that it prompts consumers to forego the experience as it might also already satiate consumers from the experience. Furthermore, we contribute to the literature on the satiating effects of simulated consumption (Morewedge et al. 2010; Larsson et al. 2014) by testing satiation in the domain of experiences (which are purely psychological (Nicolao, Irwin and Goodman 2009; Redden 2015)), and thus demonstrate that—in our case—satiation is merely a psychological effect.

REFERENCES

Chun, H. HaeEun, Kristin Diehl and Deborah J. MacInnis, (2017), 'Savoring an upcoming experience affects ongoing and remembered consumption enjoyment, *Journal of Marketing*, 81(3), 96–110.

Dadds, Mark R, Dana Howard Bovbjerg, William H. Redd and Tim, R. H. Cutmore (1997), "Imagery in human classical conditioning," *Psychological Bulleting*, 122, 89 – 103.

Epstein, Leonard H., Jennifer L. Temple, James N. Roemmich, and Mark E. Bouton (2009), "Habituation as a Determinant of Human Food Intake," Psychological Review, 116 (2), 384–407.

Groves, Philip M. and Richard F. Thompson (1970), "Habituation: A Dual-Process Theory," Psychological Review, 77 (5), 419–50

Jeannerod, Marc (1994), "The representing brain: Neural correlates of motor intention and Imagery," *Behavioral and Brain Sciences*, 17, 2, 187–245.

Jeannerod, Marc (2001), "Neural Simulation of Action: A Unifying Mechanism for Motor Cognition," Neuroimage, 14 (1), S103–S109.

Kappes, Heather B. and Carey K. Morewedge (2016), "Mental simulation as a substitute for experience," *Social and Personality Psychology Compass*, 10(7), 405-420.

Kumar, Amit., Matthew A. Killingsworth and Thomas Gilovich (2014), "Waiting for Merlot: Anticipatory Consumption of Experiential and Material Purchases," *Psychological Science*, 25 (10), 1924-31.

Larson, Jeffrey S., Joseph P. Redden and Ryan S. Elder (2014), "Satiation from sensory simulation: Evaluating foods decreases enjoyment of similar foods," *Journal of Consumer psychology*, 24, 2, 188-94.

Marks, David F. (1972), "Individual Differences in the Vividness of Visual Imagery and Their Effect on Function," in *The Function and Nature of Imagery*, ed. Peter W. Sheehan, New York: Academic Press, 83–107.

McSweeney, Frances K. and Samantha Swindell (1999), "General Process Theories of Motivation Revisited: The Role of Habituation," *Psychological Bulletin*, 125 (July), 437–57.

Morewedge, Carey K., Young Eun Huh and Joachim Vosgerau (2010), "Thought for food: Imagined consumption reduces actual consumption," *Science*, 330, 1530-1533.

Nicolao, Leonardo, Julie Irwin, and Joseph Goodman (2009), "Happiness for Sale: Do Experiential Purchases Make Consumers Happier than Material Purchases?" *Journal of Consumer Research*, 36 (August), 188–98.

Petrova, Petia K. and Robert B. Cialdini (2005), "Fluency of Consumption Imagery and the Backfire Effects of Imagery Appeals," *Journal of Consumer Research*, 32 (3), 442–52.

Pham, Michel Tuan (1998), "Representativeness, Relevance, and the Use of Feelings in Decision Making," *Journal of Consumer Research*, 25 (September), 144–159.

Redden, Joseph P. and Kelly Haws (2013), "Healthy Satiation: The Role of Decreasing Desire in Effective Self-Control," *Journal of Consumer Research*, 39 (5), 1100–14.

Redden, Joseph P. (2015), "Desire over time: The multi-faceted nature of satiation," In W. Hofmann & L. Nordgren (Eds.), The psychology of desire. New York, NY: Guilford Press.

A Token As A Ticket To Smarter Financial Decision-Making

Kimberley van der Heijden, Maastricht University, The Netherlands
Anouk Festjens, Maastricht University, The Netherlands
Caroline Goukens, Maastricht University, The Netherlands
Tom Meyvis, NYU Stern, USA

EXTENDED ABSTRACT

Current theories largely suggest that financial constraint leads to short-sighted decision-making: constrained individuals typically favor smaller immediate payoffs ($50 now) to larger delayed ones ($100 later) in traditional intertemporal choice paradigms (e.g., Bickel et al. 2016; Haushofer & Fehr 2019; Liu et al. 2012; Mellis et al. 2018; Ong, Theseira & Ng 2019; Pender 1996; Tanaka, Carmerer & Nguyen 2010). It thus seems that financially constrained individuals prioritize immediate concerns, showing little concern for long-term outcomes.

However, another stream of research demonstrates that financially constrained consumers *are* concerned about the long-term benefits of their decisions. For example, scarcity has been shown to lead to greater concern for enjoying one's resources for a longer period of time (Fernbach, Kan, & Lynch 2015, Tully, Hershfield & Meyvis 2015) and greater consideration of future needs (Spiller 2011; study 3). Thus, there is evidence supporting the view that scarcity does not inherently reduce one's ability to think or care about the future.

In sum, the feeling of financial constraint seems to bring about two (instead of one)—seemingly competing—motivations: Not only does it bring along an ultimate concern to satisfy one's pressing needs and immediate shortfall (Shah et al. 2012; Mani et al. 2013), but also a concern to spend one's scarce resources in a wise and future-oriented fashion. Important to note is that this increased concern for future needs does not manifest itself in the current scarcity-myopia paradigm.

In investigating how constraint affects myopic behavior, existing research studies typically rely on individual's preferences for either an immediate, smaller reward versus a later, larger reward (Bickel et al. 2016; Griskevicius et al. 2011; Haushofer & Fehr 2019; Liu et al. 2012; Mellis et al. 2018; Ong et al. 2019; Pender 1996; Tanaka et al. 2010). All studies have in common that they allow individuals to experience consumption utility at only one point in time, either now or later. We argue that this constraint—which is an artifact of the particular design of these tasks—could potentially shift attention to the immediate—at first sight myopic—choice alternative. This could lead to the premature conclusion that financially constrained individuals are short-sighted decision makers that have no concern for the future.

To illustrate, consider the following two choice scenarios: Scenario 1 involves a choice between an immediate $100 versus a delayed $200. Scenario 2 involves a choice between an immediate $150 versus a delayed $200, plus an immediate $50. Note that the second scenario represents a shifted case of the first one where an immediate $50 is added to both alternatives. Hence, utility is consumed at multiple consumption episodes.

In the first scenario, prior literature (e.g., Haushofer & Fehr 2019) would predict that feelings of constraint (vs. non-constraint) will lead to a higher preference for the smaller immediate alternative. From an evolutionary perspective, this prediction makes sense: constraints bring about a concern for—hierarchically higher—pressing needs (e.g., paying for basic groceries, rent, basic utilities; Maslow 1943; Shah et al. 2012), which makes the smaller, sooner alternative loom larger than the delayed alternative.

Conversely, when the choice situation allows individuals to satisfy both immediate needs *and* long-term concerns—as is the case in the second choice scenario—we propose that financially constrained individuals will make less myopic decisions. When both choice alternatives guarantee an accommodation of pressing needs, the conflict between short-term versus long-term needs is mitigated, enabling financially constrained individuals to carefully think about how to invest their scarce and precious resources. Put differently, if all choice alternatives within a choice scenario accommodate pressing needs (versus not), financial constraint consumers might thus *not* make short-sighted decisions.

Three studies support our hypotheses. In study 1 (N = 200, online pool of volunteers), participants were randomly assigned to one of the conditions in a 2(constraint level: constrained vs. not constrained) x 2(immediate token present: yes vs. no) between-subjects design. We manipulated financial constraint by asking participants to recall and write about a situation where they felt financially worse off (i.e., constrained condition) or better off (i.e., unconstrained condition) in comparison to their peers (Sharma & Alter 2012). Subsequently, participants in the "token absent" condition were presented with three hypothetical choice scenarios between a smaller immediate payoff versus a larger later one. The choice scenarios differed in the magnitudes involved and the length of the delay. In the "token present" condition, a small immediate sum (which varied across choices) was added to both the smaller immediate and larger later payoffs (see Table 1 for the stimuli). For each of the choice scenarios, participants indicated their preference among the alternatives on an 11-point scale (1 = I very much prefer alternative A to alternative B, 11= I very much prefer alternative B to alternative A). We also recorded participants' income and SES (Griskevicius et al. 2011). In study 2 (N = 251, Mturk workers), we measured financial constraint by asking participants to indicate when they received their last paycheck. It was expected that participants who received their paycheck a longer (shorter) time ago would feel more (less) constrained. Study 3 (N = 161) tested our hypotheses in a field setting. Specifically, we conducted our experiment either at a location where mainly constrained participants were present (i.e., the foodbank) or at a location where mainly non-constrained participants were present (i.e., golf club).

The results of the three studies demonstrate that consumers who feel financially constrained (vs. non-constrained) show more short-sightedness (i.e., higher preference for the immediate option) when faced with a classical intertemporal choice task (i.e., token absent condition), which is consistent with previous research. In contrast, financially constrained consumers show less short-sightedness when faced with an intertemporal choice task where an immediate sum was added to both alternatives (i.e., token present condition), as opposed to a classical intertemporal choice task. There is no difference in behaviour among financially non-constrained consumers in the token absent (vs. token present) condition.

The findings of this current research provide important implications, theoretically and practically. First, we contribute to previous research on resource scarcity and intertemporal decision making by calling for using a wider variety of tasks when studying the effects of financial constraint on intertemporal choice making. Furthermore,

from a more societal point of view, we advocate that financial services (e.g., saving plans) apply a choice architecture similar to the one we present in our studies. For example, giving participants a small bonus when opening a savings account would enable financially constrained individuals to carefully think about how to invest their scarce and precious resources and thus increase savings.

REFERENCES

Bickel, Warren K., A. George Wilson, Chen Mikhail, N. Koffarnus and Christopher T. Franck (2016), "Stuck in time: Negative income shock constricts the temporal window of valuation spanning the future and the past. *PloS one*, *11*, 9, e0163051.

Fernbach, Philip M., Christina Kan and John G. Lynch (2015), "Squeezed: Coping with Constraint through Efficiency and Prioritization," *Journal of Consumer Research*, 41, 5, 1204-1227.

Griskevicius, Vladas, Andrew W. Delton, Theresa E. Robertson, and Joshua M. Tybur (2011), "Environmental Contingency in Life History Strategies: The Influence of Mortality and Socioeconomic Status on Reproductive Timing," *Journal of Personality and Social Psychology*, 100 (February), 241–54.

Haushofer, Johannes, and Ernst Fehr, E. (2019), "Negative income shocks increase discount rates. Working paper.

Liu, Lei, Tingyong Feng, Tao Suo, Kang Lee and Hong Li (2012), "Adapting to the destitute situations: Poverty cues lead to short-term choice," *PloS one*, 7, 4, e33950.

Mani, Anandi, Sendhil Mullainathan, Eldar Shafir and Jiaying Zhao (2013), "Poverty impedes cognitive functioning," *Science*, 341, 976-80.

Maslow, A.H. (1943), "A theory of human motivation", *Psychological Review*, 50, 370-396.

McClure, Samuel M., David I. Laibson, George F. Loewenstein and Jonathan D. Cohen (2004) "Separate Neural Systems Value Immediate and Delayed Monetary Rewards." *Science*, 306, 5695, 503-507.

Mellis, Alexandra M., Liqa N. Athamneh, Jeffrey S. Stein, Yan Yan Sze, Leonard H. Epstein and Warren K. Bickel (2018), "Less is more: Negative income shock increases immediate preference in cross commodity discounting and food demand," *Appetite*, 129, 155-161.

Ong, Qiyan, Walter Theseira and Irene Y. H. Ng (2019), "Reducing debt improves psychological functioning and changes decision-making in the poor", *Proceedings of the National Academy of Sciences*, 116, 15, 7244-7249.

Pender, John L. (1996), "Discount rates and credit markets: Theory and evidence from rural India," *Journal of development Economics*, 50, 2, 257-296.

Shah, Anuj K., Sendhil Mullainathan and Eldar Shafir (2012). "Some consequences of having too little". *Science*, 338 (6107), 682-685.

Sharma, Eesha and Adam L. Alter (2012), "Financial Deprivation Prompts Consumers to Seek Scarce Goods," *Journal of Consumer Research*, 39, 3, 1, 545–560.

Spiller, Stephan A. (2011), "Opportunity Cost Consideration," *Journal of Consumer Research*, 38, 4, 595–610.

Tanaka Tomomi, Colin F. Camerer, Quang Nguyen (2010), "Risk and Time Preferences: Linking Experimental and Household Survey Data from Vietnam," *American Economic Review*, 100, 1, 557–571.

Tully, Stephanie M., Hal E. Hershfield, and Tom Meyvis (2015), "Seeking Lasting Enjoyment with Limited Money: Financial Constraints Increase Preference for Material Goods over Experiences," *Journal of Consumer Research*, 42, 1, 59–75.

Effect Sizes in Experimental Consumer Psychology Are Underestimated: Introducing a Simple Correction

Walter Herzog, WHU, Germany
Christopher Beisecker, WHU, Germany

EXTENDED ABSTRACT

The present research suggests that effect sizes in experimental consumer psychology are systematically underestimated because the dominant estimation strategy ignores the "reliability" of the experimental manipulation (i.e., the squared correlation between the manipulation and the independent variable, which is usually assessed via manipulation checks; Bollen 1989; Perdue and Summers 1986; Wilson, Aronson, and Carlsmith 2010). It is shown how to correct for this bias in published articles even when raw data are not available.

Corrected Effect Sizes

Experimental researchers report effect sizes to quantify the magnitude of a postulated effect. To do so, they typically compute a measure of statistical association between their experimental manipulation T (e.g., $T=1$ for the treatment condition; $T=0$ for the control condition) and the dependent variable Y. For example, Rosenthal, Rosnow, and Rubin (2000) argue that behavioral researchers should report the correlation between T and Y as an effect size measure because this statistic has a straightforward interpretation and can easily be transformed to other popular effect size measures (e.g., *eta-squared*, *Cohen's d*).

However, the standard method of computing such effect sizes does not take into account that in many psychological studies, the manipulation T is not a perfect proxy of the independent variable of interest X. For instance, consider a study aimed at investigating the impact of perceived product anthropomorphism (X) on product evaluations (Y). To create exogenous variance in X, a researcher might apply an experimental manipulation T, where the product is either described in humanlike terms ($T=1$; anthropomorphism condition) or in neutral terms ($T=0$; control condition). A formal manipulation check is typically conducted where the researcher quantifies the relationship between T and X (X is measured by manipulation check items; Perdue and Summers 1986). Such manipulation checks will almost certainly reveal that T and X are not perfectly correlated. For example, in a study by Huang, Wong, and Wan (2020, study 2), the correlation between T (a manipulation of perceived anthropomorphism) and X (perceived anthropomorphism) is .45. In other words, only .45²=20% of the variance in T corresponds to variation in the conceptual independent variable X. The latter quantity—that is, the *squared correlation between T and X*—is known as the *reliability* of the experimental manipulation Rel*(T)* (Bollen 1989; Perdue and Summers 1986).

Overall, the preceding discussion suggests that the currently used measures for quantifying the size of the effect of X on Y, such as the correlation between T and Y, are biased because T is an imperfect proxy for X. Furthermore, it is not possible to compute effect size measures based on the correlation between X and Y because X is not a randomized variable and hence, the correlation between X and Y does not correspond to a causal effect (Angrist, Imbens, and Rubin 1996; Rubin 2005). However, we argue that it is possible to "purge" the correlation between T and Y of the effects of unreliability in T, thereby creating an unbiased effect size measure with a causal interpretation (note that T is a randomized variable).

Specifically, it is well-known that a correlation-based effect size can be corrected for unreliability in the independent variable measure by dividing the correlation-based effect size by the square root of the reliability of the independent variable measure (Bollen 1989). This procedure is commonly referred to as "disattenuation" of a correlation coefficient (McDonald 1999) and it is frequently applied by behavioral scientists working with observational data to correct for measurement unreliability in an independent variable (Schmidt and Hunter 1996). Yet, the derivation of the underlying formula holds independent of the way in which a proxy for the independent variable is generated (Greene 2003; McDonald 1999). Hence, it can be applied in the context of observational studies (to correct for unreliability in measurement items of the independent variable) as well as for experiments (to correct for unreliability of manipulations of the independent variable). Overall, the disattenuation procedure can be used to "purge" the correlation between T and Y of the effects of unreliability in T:

$$C = \frac{Cor(T,Y)}{\sqrt{Rel(T)}} = \frac{Cor(T,Y)}{Cor(T,X)}$$

In this equation, C denotes the corrected effect size correlation. $Cor(T, X)$ can be estimated based on the data from the main study if measures of X were included in this study. Alternatively, it can be computed based on the data from a pre-study that was designed to test the effectiveness of the manipulation T. $Cor(T, Y)$ is estimated based on the data from the main study.

As can be seen from this equation, the standard effect size measure $Cor(T, Y)$ *underestimates* the true effect size C whenever T is an imperfect proxy for X (i.e., for Rel(T)<1). This is the case because only the reliable variance part in T (i.e., the variance in T which reflects variance in X) affects variance in Y. Hence, unreliability in T dilutes the traditional effect size measure $Cor(T, Y)$.

Example

Huang et al. (2020) hypothesized that perceived product anthropomorphism (X) leads to "increased preference for the [product] option with a more favorable overall evaluation over the [product] option with a greater number of superior dimensions" (p. 936) (Y). In study 2, the authors manipulated X by describing products in first-person language ($T=1$) versus third-person language ($T=0$) and measured X as well as Y. As predicted, T increased Y ($F(1, 99)=5.04$, $p=.027$, $\eta^2=.05$ and hence, $Cor(T, Y)=\eta==.22$). Furthermore, the manipulation check was successful, that is, T increased X ($F(1, 99)=24.95$, $p<.001$, $\eta^2=.20$ and hence, $Cor(T, X)=\eta==.45$). Thus, the corrected effect size correlation is

$$C = \frac{Cor(T,Y)}{Cor(T,X)} = \frac{.22}{.45} = .49$$

C is 123% larger than the uncorrected effect size correlation (.22). Furthermore, the corrected *eta-squared* coefficient is .49²=.24 and thus 380% larger than the uncorrected coefficient (.05).

Discussion

Overall, the present research suggests that experimental psychologists are currently underselling the importance of their empirical findings for consumers, policy makers, and managers. We provide a simple method to improve the current research practice and

correct already published effect sizes. Extensions of the proposed method (e.g., simultaneous correction for unreliability in T, X, and Y and applications in settings with more than two experimental groups) will be made available.

REFERENCES

Angrist, Joshua D., Guido W. Imbens, and Donald B. Rubin (1996), "Identification of Causal Effects Using Instrumental Variables," *Journal of the American Statistical Association*, 91 (434), 444–55.

Bollen, Kenneth A. (1989), *Structural Equations with Latent Variables*. New York, NY: John Wiley and Sons.

Greene, William H. (2003), *Econometric Analysis*, 5th ed. Upper Saddle River, NJ: Prentice Hall.

Huang, Feifei, Vincent Chi Wong, and Echo Wen Wan (2020), "The Influence of Product Anthropomorphism on Comparative Judgment," *Journal of Consumer Research*, 46 (February), 936–55.

McDonald, Roderick P. (1999), *Test Theory: A Unified Treatment*. Mahwah, NJ: Lawrence Erlbaum Associates.

Perdue, Barbara C., and John O. Summers (1986), "Checking the Success of Manipulations in Marketing Experiments," *Journal of Marketing Research*, 23 (November), 317–26.

Rosenthal, Robert, Ralph L. Rosnow, and Donald B. Rubin (2000), *Contrasts and Effect Sizes in Behavioral Research: A Correlational Approach*. Cambridge, UK: Cambridge University Press.

Rubin, Donald B. (2005), "Causal Inference Using Potential Outcomes: Design, Modeling, Decisions," *Journal of the American Statistical Association*, 100 (469), 322–31.

Schmidt, Frank L. and John E. Hunter (1996), "Measurement Error in Psychological Research: Lessons From 26 Research Scenarios," *Psychological Methods*, 1 (2), 199–223.

Wilson, Timothy D., Elliot Aronson, and Kevin Carlsmith (2010), "The Art of Laboratory Experimentation," in *The Handbook of Social Psychology*, 5th ed., Susan T. Fiske, Daniel T. Gilbert, and Gardner Lindzey, eds. Hoboken, NJ: John Wiley and Sons, 51–81.

De-Democratizing Search: When Financial Resources Scarcity Decreases Opportunity Cost Consideration

Diogo Hildebrand, Baruch College, CUNY, USA
Daniel Fernandes, Catholic University of Portugal, Portugal
Jannine Lasaleta, Sy Syms School of Business, Yeshiva University, USA
Leandro Malloy-Diniz, Federal University of Minas Gerais, Brazil

EXTENDED ABSTRACT

People making purchase decisions are likely to consider alternative ways to spend their resources (Spiller 2011; Shah et al., 2015). Although all individuals should benefit from a broader, careful evaluation of the alternatives available, such opportunity cost consideration should be especially beneficial to people living under a momentary or chronic scarcity of financial resources (Shah et al., 2015). Unsurprisingly, prior research shows that people under permanent or temporary financial resource scarcity are most likely to consider the opportunity cost of their decisions (Spiller 2011).

Implicit to the argument behind the positive effect of financial resource scarcity on opportunity cost consideration is the notion that search incurs in time and effort costs. Interestingly, however, although technological advancements have made such costs negligible, the impact of such reduction in informational cost on the consideration of alternative options among individuals with abundance and scarcity of financial resources is still unknown. We offer the counterintuitive prediction that reducing the informational cost disproportionally benefits those with abundance rather than scarcity in financial resources.

Choosing from a wide set of products can be detrimental to an individual's well-being because assortment size, or greater consideration of opportunity costs, have decreasing gains in utility when deciding across the different alternatives is difficult (Chernev, 2006; Schwartz, 2004). Scarcity increases the perceived importance of an individual's choices (Shah et al., 2015), which increases the perceived difficulty of the decision (Krijnen et al., 2015). Further, since scarcity impedes cognitive function (Mani et al., 2013), it should also increase the difficulty of making decisions. Taken together, these findings suggest that resource scarcity should increase perceptions of decision difficulty which has been shown to result in lower motivation to consider alternative options. In sum, while scarcity should make consumers less sensitive to the costs of considering opportunity costs, it should also decrease their baseline willingness to consider opportunity costs, such that when informational costs are sufficiently high (low), scarcity will result in greater (lower) willingness to consider opportunity costs. We tested this general framework over the course of four studies, reported next.

In study 1, fifty-nine undergraduate students first engaged in a perceived financial resources manipulation (Shah et al. 2015) and then were asked to perform an unrelated typing task rewarding them with additional options of candies they could choose from. Before, choosing a chocolate from a set of 8, participants described their thoughts during the choice task and indicated their perceived worth of the task and perceived effort they put on the task. After choosing the chocolate, they described their thoughts during the choice task, indicated their satisfaction with their choices, and decision difficulty. Results revealed that participants in the low (vs high) perceived resources condition typed more, had greater perceived worth of and effort put on the typing task, marginally significant lower satisfaction with the choice made, spent more time and were more redundant in justifying the choice. These findings indicate not only a greater motivation to consider the opportunity cost of the decisions, but a concomitant decision difficulty among those assigned to the financial scarcity condition. Given the nature of these countervailing forces, we theorize and test in the next studies that varying the cost of obtaining alternative options should moderate the effect of perceived financial resources on willingness to consider opportunity costs.

In study 2, participants recruited using Prolific Academic (N=194) received a financial allocation and had to use it to buy products in seventeen rounds. Each round, participants were also given the opportunity to obtain information about products that would be available on future rounds by clicking with the mouse (10 or 30 times per product, depending on information cost condition). We manipulated the participants' perceived financial resources by telling them that they would be randomly selected to receive either $50 or *$10* ($100) in the *high* (low) perceived financial resources condition; all participants received, in fact, $50. Results revealed a predicted a significant interaction as well as a significant main effect of information cost, with a positive significant effect of perceived financial resources on opportunity consideration when information cost was low and a negative significant effect when information cost was high. We provided robustness to these findings by replicating these findings in an additional study (study 3) where we manipulated actual (as opposed to perceived) financial resources by allocating either $10 or $100 dollars to participants.

In study 4 we analyzed data from a PEW Research Center survey (N = 2,864) on search behavior prior to purchasing products. We used income as a proxy for resource scarcity and information source (store visit vs. internet) as a proxy for informational cost. Results revealed a significant main effect of income and, importantly, a significant income by cost of search interaction, such that when the information was more costly to obtain, income decreased motivation to search, but increased motivation to search when the information was less costly to obtain.

This work makes several contributions to research on scarcity and opportunity cost consideration. Primarily, we are the first to propose and demonstrate that resource scarcity may be detrimental to consumers' opportunity cost consideration. Further, we propose a moderator that both explains parsimoniously findings from previous research and identifies conditions under which resource scarcity will reduce rather than increase information search. Finally, in providing evidence that resource scarcity increases decision difficulty, we add to a long list of factors that hinder the decision ability of individuals under resource scarcity.

REFERENCES

Chernev, Alexander (2006). Decision focus and consumer choice among assortments. *Journal of Consumer Research*, 33(1), 50-59.

Fitzsimons, Gavan J. (2000). Consumer response to stockouts. *Journal of Consumer Research*, 27(2), 249-266.

Krijnen, Job MT, Marcel Zeelenberg, and Seger M. Breugelmans (2015). Decision importance as a cue for deferral. *Judgment and Decision Making*, 10(5), 407.

Mani, Anandi, Sendhil Mullainathan, Eldar Shafir, and Jiaying Zhao (2013). Poverty impedes cognitive function. *Science*, 341(6149), 976-980.

Shah, Anuj K., Eldar Shafir, and Sendhil Mullainathan (2015). Scarcity frames value. *Psychological Science*, 26(4), 402-412.

Spiller, Stephen. A. (2011). Opportunity cost consideration. *Journal of Consumer Research*, 38(4), 595-610.

"Yes You Can" – How to Reduce the Collective Action Problem For Sustainable Consumer Behavior

Tobias Hinze, University of Cologne, Germany
Magdalena Bekk, University of Cologne, Germany; Seeburg Castle University, Austria

EXTENDED ABSTRACT

Consumers in today's world are confronted with the alarming consequences of unsustainable behavior (van der Wal, van Horen, and Grinstein 2018). To reduce the problems, a large group of consumers must undertake sustainable (pro-social and pro-environmental) behaviors for the benefits to be fully realized (White, Habib, and Hardisty 2019). Sustainable consumer behavior, such as donating for a good cause or recycling requires collective as opposed to individual action (Bamberg, Rees, and Seebauer 2015). But, there appears to be little motivation to participate in a collective action when individuals believe that the collective outcome will occur without their costly individual contributions ("collective action problem"; John and Klein 2003). Despite the increasing importance of sustainable consumer behavior for businesses and society, it remains unclear whether and how to reduce the collective action problem for sustainable consumer behavior.

Across three experiments, we show that collective (versus individual) action framing discourages sustainable consumer behavior, indicating that individual action framing serves as the more promising strategy. Further, we address recent calls in the literature to investigate the collective action problem from a marketing perspective (White, Habib, and Hardisty 2019) by examining how and why the collective action framing influences sustainable behavior looking at the moderating role of goal concreteness as well as the mediating role of perceived lack of self-efficacy.

Study 1 establishes the negative effect of a collective action framing on sustainable consumer behavior with a prosocial behavior in a fundraising field experiment in collaboration with Action Against Hunger. In a two group (framing: collective vs. individual action) between-subjects experiment, 145 participants (56.6% female) took part. A standardized verbal script, a poster (A1) and handout (A3) were used to approach participants and to ask them to donate, emphasizing the collective (individual) action of the donation. Two research assistants, blind to the hypotheses, went on campus on four days to collect donations as our dependent variable. We counterbalanced the order of experimental groups per day using an ABBA design (Otterbring et al. 2018). We conducted an ANCOVA to compare the amount of donation across the two groups (i.e., collective vs. individual action framing) whilst controlling for other factors potentially driving the amount of donation (e.g., gender). The analysis revealed a significant difference in the amount of donation ($F(1, 137) = 4.710$, $p = .032$), suggesting that the collective ($M = 2.623$, $SD = 3.116$) compared to individual ($M = 3.184$, $SD = 3.541$) action framing decreases the amount of donation and, thus, sustainable consumer behavior.

Study 2 replicates the finding from Study 1 and examines goal concreteness as moderator (Lee and Ariely 2006). In total, 242 participants ($M_{age} = 31.6$, 58.3% female) took part in the 2(framing: collective vs. individual action) × 2(type of goal: concrete vs. abstract) between-subjects experiment. Participants viewed a website screenshot of an actual online-petition of Action Against Hunger. We manipulated framing, as in all other studies, by communicating the collective (individual) action of the behavior: "If at least 30,000 people (you) sign the petition hunger in Yemen can be ended." The petition was open during the entire data collection period of Study 2. After showing the stimuli, participants indicated whether they will sign the petition. From Action Against Hunger, we obtained information on actual signatures on a daily basis, which we used to build a variable measuring the likelihood to sign the petition as an indicator of sustainable behavior. The results from the ANOVA replicate the main effect of framing ($F(1, 238) = 5.609$, $p = .019$) but no main effect of goal type ($F(1, 238) = 1.867$, $p = .173$) on sustainable behavior. The analysis revealed a significant interaction between framing and goal type, $F(1, 238) = 4.749$, $p = .030$. Simple main effects showed that sustainable behavior was significantly higher for participants with a concrete goal ($M = .314$, $SD = .192$) compared to an abstract goal ($M = .254$, $SD = .115$) in the individual action framing situation, $F(1, 238) = 6.29$, $p = .013$. Goal concreteness did not matter in the collective action framing situation.

Study 3 extends the negative effect from Studies 1 and 2 to a pro-environmental behavior and identifies the mediating role of perceived lack of self-efficacy. A sample of 101 participants ($M_{age} = 33.9$, 50.5% female) took part in a two group (framing: collective vs. individual action) between-subjects experiment. Participants viewed a recycling campaign poster and were asked to indicate their motivation to obtain recycling information (adapted from Acquisti, John, and Loewenstein 2012) and perceived lack of self-efficacy (Hanss and Böhm 2010). The results from the ANOVA replicate the main effect of framing for motivation to obtain recycling information, $F(1, 99) = 4.93$, $p = .029$. This result indicates that collective action framing reduces the willingness to behave sustainably. To examine whether perceived lack of self-efficacy mediates the effect, we run mediation analyses using the PROCESS macro (coding of framing: individual = 0, collective = 1, 10,000 bootstraps, Model 4; Hayes 2013). We included control variables to account for other factors driving sustainable behavior. Results revealed that framing positively affected perceived lack of self-efficacy, $b = .88$, $SE = .43$, $p = .043$. Perceived lack of self-efficacy affected participants' motivation to obtain recycling information negatively, $b = −.35$, $SE = .15$, $p = .018$. The indirect effect of framing on participants' motivation to obtain recycling information via perceived lack of self-efficacy was significant (a×b = −.31, 95% CI = [−1.059; −0.002[).

This research is the first to provide empirical evidence on how to reduce the collective action problem for sustainable consumer behavior from a marketing perspective. Specifically, it suggests that an individual action framing would be the more promising strategy compared to a collective action framing. We show that particularly for an individual action framing, marketers can increase sustainable behavior by providing a concrete goal to consumers. Lastly, to reduce the collective action problem, managers should shift consumers' focus to their personal abilities and to the impact their abilities can have (i.e., increase self-efficacy).

REFERENCES

Acquisti, Alessandro, Leslie K. John, and George Loewenstein (2012), "The Impact of Relative Standards on the Propensity to Disclose," *Journal of Marketing Research*, 49 (2), 160–74.

Bamberg, Sebastian, Jonas Rees, and Sebastian Seebauer (2015), "Collective Climate Action: Determinants of Participation Intention in Community-Based Pro-Environmental Initiatives," *Journal of Environmental Psychology*, 43, 155–65.

Hanss, Daniel and Gisela Böhm (2010), "Can I Make a Difference? The Role of General and Domain-Specific Self-Efficacy in Sustainable Consumption Decisions," *Umweltpsychologie,* 14 (2), 46–74.

Hayes, Andrew F. (2013), *Methodology in the Social Sciences. Introduction to Mediation, Moderation, and Conditional Process Analysis: A Regression-Based Approach*, Guilford Press.

John, Andrew and Jill Klein (2003), "The Boycott Puzzle: Consumer Motivations for Purchase Sacrifice," *Management Science*, 49 (9), 1196–209.

Lee, Leonard and Dan Ariely (2006), "Shopping Goals, Goal Concreteness, and Conditional Promotions," *Journal of Consumer Research*, 33 (1), 60–70.

Otterbring, Tobias, Christine Ringler, Nancy J. Sirianni, and Anders Gustafsson (2018), "The Abercrombie & Fitch Effect: The Impact of Physical Dominance on Male Customers' Status-Signaling Consumption," *Journal of Marketing Research*, 55 (1), 69–79.

Van der Wal, Arianne J., Femke van Horen, and Amir Grinstein (2018), "Temporal Myopia in Sustainable Behavior Under Uncertainty," *International Journal of Research in Marketing*, 35 (3), 378–93.

White, Katherine, Rishad Habib, and David J. Hardisty (2019), "How to SHIFT Consumer Behavior to be More Sustainable: A Literature Review and Guiding Framework," *Journal of Marketing*, 83 (3), 22–49.

Bundling Products Worldwide: How Self-Construal Influences Product Bundle Evaluation

Jennifer Seokhwa Hong, Seattle University, USA
Andrea Bonezzi, New York University, USA

EXTENDED ABSTRACT

Product bundling is a widely observed marketing practice, as it is known to be an effective strategy to increase sales of companies' offerings across various product categories. Despite its preexisting ubiquity, product bundles are still growing in number, because it has become easier for online-retailers to offer various forms of bundles to a wide range of customers across the globe (Venkatesh and Mahajan, 2009). Given that the same bundle offerings are being exposed to consumers with different cultural and individual characteristics, it is important to investigate what type of bundles appeals to which segment of consumers. The current research answers this question by examining the impact of the interplay between the bundle type and self-construal on consumers' bundle evaluation.

A bulk of research has shown that consumers prefer bundles of complementary products to bundles of substitute (Gaeth, 1990; Telsler, 1970) or unrelated products (Harlam et al., 1995; Popkowski-Leszczyc and Haubl, 2010). Together, these studies indicate that consumers extract an additional value from the perceived degree of complementarity between bundled items when evaluating product bundles. Building on this, we propose that the amount of value that a consumer extracts from complementarity differs depending on which self-construal consumers adhere to. It has been well documented that individuals with interdependent self-construal have a more pronounced ability to detect relationships between objects and/or concepts, compared to individuals with independent self-construal (Ahluwalaia, 2008; Lalwani and Shavitt, 2013; Monga and John, 2007). Accordingly, we predict that interdependents may be superior not only at uncovering the relationship between bundled products, but also at discerning the types of relationships between bundled products relative to independents. Thus, when bundles include complementary products, interdependents would evaluate bundles more favorably relative to independents because they would extract greater value from the complementarity. We test our hypotheses across one study using secondary sales data and three laboratory studies.

Study 1 provides an initial demonstration of the effect of self-construal on bundle evaluation using global cosmetics company's sales data from South Korea and U.S. We employed culture as an operationalization for self-construal, as interdependence is more prevalent in Korea, whereas independence is more prevalent in the U.S. Controlling for price, product categories, and fixed-time effects, sales of product bundles was greater in Korea than in the U.S. ($p = .002$). In contrast, sales of standalone single products did not differ across countries ($p = .23$). Furthermore, sales of bundles of complements was greater than that of bundles of non-complements in Korea ($p < .001$). This difference, however, was not evident in the U.S. ($p = .52$). Also, the market share of complement bundles was greater in Korea than in the U.S. ($p = .001$), supporting our prediction.

It is possible that the differences we found between these countries may be due to differences in other unobservable factors like distribution channels and market size. To address this issue, in Study 2 (n = 237 from U.S. online-panel), we directly measured participants' chronic level of self-construal and examined how that correlated with their evaluation of product bundles using a homogenous sample. Participants first filled out Oyersman's self-construal scales (1993) and then evaluated either a bundle of complements (La Roche-Posay's facial cleanser and moisturizer) or a bundle of substitutes (La Roche-Posay's two different facial cleansers). An OLS regression on bundle evaluation revealed that overall, participants favored the complement bundle more than the substitute bundle ($p = .003$). More importantly, this main effect was qualified by a significant bundle-type x interdependence interaction ($p = .04$), but not by bundle-type x independence interaction ($p = .64$). Interdependence was positively associated with bundle evaluation ($p < .001$) when it consisted of complements. When the bundle included substitutes, however, interdependence did not predict bundle evaluation ($p = .21$).

In Studies 3 (n = 343) and 4 (n = 247), we directly tested the causal effect of self-construal on bundle evaluation by manipulating self-construal. In addition, we examined the moderating role of a contextual factor (i.e., brand composition) on the relationship between self-construal and bundle evaluation. Consumers find multiple products to be more complementary to each other when the product are labeled with the same brand (vs. different brands, Rahinel and Redden, 2014). Thus, because interdependents are more susceptible to contextual cues like brand labels than independents, interdependents would extract greater value from the complementary between bundled products when they are from the same brand versus different brands. As a result, interdependents would favor a bundle of complements from the same brand. However, because independents are less concerned about relationship associated cues, a variation in brand composition would not affect their bundle evaluation.

We first primed self-construal by having participants write about who they are using a first-person singular vs. plural pronouns (S3) and what makes them similar to vs. different from their family and friends (S4). Subsequently, approximately half of participants saw a bundle of complements from the same brand (S3: MUJI notebook, pencil, and eraser; S4: Pantene shampoo, conditioner, and hairmasque). The other half saw the comparable products from different brands. We then measured participants' willingness-to-pay (S3) and purchase intention (S4) for the bundles. A significant self-construal x brand-composition interaction ($p_{S3} = .01$, $p_{S4} = .02$) revealed that interdependents indicated greater WTP and purchase intention for the same-branded (vs. differently-branded) bundles ($p_{S3} = .001$, $p_{S4} = .01$). These differences were not evident among independents ($p_{S3} = .94$, $p_{S4} = .50$). Furthermore, in Study 4, we measured perceived degree of complementarity among bundled items to test its moderated mediating impact. Primed interdependence increased the purchase likelihood of the bundle through enhanced perceived complementarity (C.I. [.04, .28]). There was no corresponding indirect effect among participants who evaluated the bundle of complements from different brands (C.I. [-.39, .08]).

In summary, we identify a key individual- and cultural-level difference in bundle evaluation that previous research has overlooked. In doing so, the current research suggests a novel marketing strategy to segment product bundles in both global and domestic markets, as certain regions are known to possess collectivist than individualistic culture.

REFERENCES

Ahluwalia, Rohini (2008), "How Far Can a Brand Stretch? Understanding the Role of Self-Construal," *Journal of Marketing Research,* 45 (3), 337–50.

Harlam, Bari A., Aradhna Krishna, Donald R. Lehmann, and Carl Frederick Mela (1995), "Impact of Bundle Type, Price Framing and Familiarity on Purchase Intention for the Bundle," *Journal of Business Research,* 33 (1), 57–66.

Lalwani, Ashok K. and Sharon Shavitt (2013), "You Get What You Pay For? Self-Construal Influences Price-Quality Judgments," *Journal of Consumer Research, 40*, 255-267.

Monga, Alokparna B. and Deborah R. John. (2007), "Cultural Differences in Brand Extension Evaluation: The Influence of Analytic versus Holistic Thinking," *Journal of Consumer Research,* 33 (4), 529–36.

Oyserman, Daphna (1993), "The Lens of Personhood: Viewing the Self and Others in a Multicultural Society," *Journal of Personality and Social Psychology, 65,* 993–1009.

Popkowski-Leszczyc, Peter T.L. and Gerald Häubl (2010), "To Bundle or Not to Bundle: Determinants of the Profitability of Multi-Item Auctions," *Journal of Marketing,* 74 (4), 110–24.

Telser, L.G. (1979), "A Theory of Monopoly of Complementary Goods," *Journal of Business,* 53 (2)*,* 211–30.

Venkatesh, Ramamurthy and Vijay Mahajan (2009), "Design and Pricing of Product Bundles: A Review of Normative Guidelines and Practical Approaches," *Handbook of Pricing Research in Marketing*, 232–257.

The Effect of Mere Physical Distance on Wishful Thinking:
How Proximity and Valence Interactively Affect Probability Judgment

Jennifer Seokhwa Hong, Seattle University, USA
Chiara Longoni, Boston University, USA
Vicki G. Morwitz, Columbia University, USA

EXTENDED ABSTRACT

Probability judgments are ubiquitous—from estimating the chance of landing a job, to predicting the movements of the stock market—and typically plagued by numerous errors and biases (Kahneman and Tversky 1973). We add to this stream of research by identifying a novel *proximity bias* in probability judgments, whereby event valence and event nearness systematically interact in determining probability estimates.

When it comes to the relationship between event valence and probability estimates, a robust finding is people's tendency to predict that they are less likely than others to experience negative events, and more likely than others to experience positive events (Perloff and Fetzer 1986). This optimistic bias is so pervasive that some consider it an adaptive regulatory function for protecting the self (Taylor and Brown 1988).

We extend this research by uncovering a novel bias: That proximity of an event moderates people's optimistic bias in probability judgments. Specifically, we theorize that the physical nearness of an event accentuates self-enhancing tendencies when predicting positive events, and self-protective tendencies when predicting negative events. Across five studies we manipulate (a) the valence of an event (i.e., whether the outcome of an event is positive or negative) and (b) the physical proximity of this event (i.e., whether the event takes place in a location that is nearby or far away), and then measure people's probability estimates. We consistently find interactive effects of event valence and nearness, such that near, positive events are predicted to be more likely than near, distant events. On the contrary, near, negative events are predicted to be less likely than distant, negative events. Boundary conditions underscore the motivational underpinnings of this bias.

In study 1 (n = 284), participants read a lottery scenario. Participants in the positive condition were told there was a 60% chance of winning a lottery for a laptop. In the negative condition, we told them there was a 60% chance of losing the lottery and the $20 they had paid to participate. We manipulated proximity by describing the lottery draw taking place in a location that was nearby or far away. We measured probability estimates as the likelihood of winning (positive condition) or losing (negative condition) the lottery. Significant valence vs. proximity interaction ($p < .01$) revealed that winning the lottery seemed more probable when the draw took place nearby than far ($p = .03$). Conversely, losing the lottery seemed less probable when the draw occurred nearby than far ($p = .05$). In study 2 (n = 295), we replicated the same findings with two different events where positive event is not the opposite of negative event.

In study 3 (n = 485), we directly examined the hypothesized motivational nature of this bias. We hypothesized that the proximity bias is due to a tendency to be self-enhancing with respect to positive outcomes and self-protecting with respect to negative outcomes. If this is indeed the case, it follows that this bias should emerge for probability estimates made for a self-relevant outcome, but not for a self-irrelevant outcome. In a job-offer scenario, participants read that a hiring decision would take place in either a close or far location. Participants estimated the probability of either getting an offer (positive-condition) or not getting an offer (negative-condition), for either themselves (self-relevant-outcome) or another similarly quali-

fied candidate (self-irrelevant-outcome). Results revealed significant three-way valence x proximity x relevance ($p = .01$) and two-way valence x proximity interactions for the self ($p < .01$) but not for other ($p = .43$). As predicted, participants estimated they were more likely to get an offer when the event was close than far ($p = .04$), and less likely to lose an offer when the event was close than far ($p = .04$), but this effect did not emerge when estimating likelihood for another individual.

Providing converging evidence for the motivational account, in, the next two studies, we manipulated (un)desirability of an outcome while keeping outcome valence constant. We expected to replicate our previous results in case of a highly (un)desirable outcome. However, we expected an attenuation of the proximity bias in case of a less (un)desirable outcome. In study 4A (n = 607), participants estimated the likelihood of highly undesirable and moderately undesirable outcomes. Participants read that they were experiencing symptoms that could indicate either a severe disease or a mildly severe disease. They were further told that their blood sample was being tested at a hospital located 2 miles or 200 miles from where they were. Participants then estimated the likelihood of testing positive for the disease. When considering a highly undesirable outcome, participants predicted that they were less likely to contract the severe disease when the hospital was located nearby (M = 37.78%) than far (M = 45.62%; p = .006). When estimating the likelihood of contracting the mild disease, however, that difference disappeared (M_{close} = 46.34%, M_{far} = 45.90%; p = .88)

In study 4B (n = 385), we used positive outcomes only. Using a simulation of an online-dating app, participants viewed the profiles of two potential dates who were either nearby or far away (between-subjects), and whose attractiveness varied (within-subjects). Participants estimated their probability of getting successfully matched with both dates. As expected, when considering a highly desirable date, participants predicted that they were more likely to be successfully matched if the potential date was nearby (M = 58.69%) than far-away (M = 50.91%; p < .001). However, the difference was weaker when considering a moderately desirable date (M_{close} = 48.97%, M_{far} = 46.37%; p = .34).

In summary, we extend prior research on biases in probability judgments by documenting a novel proximity bias. Importantly, by corroborating the motivated nature of the effect, we demonstrate our findings cannot be accounted for by existing theories explaining how people make probability judgments, such as construal level theory (Wakslak and Trope 2009; Wakslak 2012), which is agnostic to motivated reasoning effects on predictions. In so doing, this research extends prior work on biases in judgments and decision making.

REFERENCES

Kahneman, Daniel and Amos Tversky (1973), "On the Psychology of Prediction," *Psychological Review*, 80 (4), 237-51.

Perloff, Linda S. and Barbara K. Fetzer (1986), "Self-Other Judgments and Perceived Vulnerability to Victimization," *Journal of Personality and Social Psychology*, 50 (3), 502-10.

Taylor, Shelley E. and Jonathon D. Brown (1988), "Illusion and Well-Being: A Social Psychological Perspective on Mental Health," *Psychological Bulletin*, 103 (2), 193-210.

Wakslak, Cheryl J. (2012), "The Where and When of Likely and Unlikely Events," *Organizational Behavior and Human Decision Processes,* 117 (1), 150-57.

Wakslak, Cheryl and Yaacov Trope (2009), "The Effect of Construal-Level on Subjective Probability Estimates," *Psychological Science,* 20 (1), 52-58.

The Appeal of Copycats When the Horizon is Wide: How Broad Versus Narrow Mindset Influences Evaluation of Product Imitations

Femke van Horen, Vrije Universiteit Amsterdam, The Netherlands
Zachary Estes, Bocconi University, Italy

EXTENDED ABSTRACT

Copycat brands imitate the name, logo, and/or package design of a national brand to capitalize on the latter's positive associations and marketing efforts (Van Horen and Pieters 2012a; Zaichkowsky 2006). Past research investigating the success of copycat brands has focused on *product* characteristics, such as degree of similarity (Aribarg, Arora, Henderson, and Kim 2014; Loken, Ross, and Hinkle 1986), type of similarity (Van Horen and Pieters 2012b), price (Warlop and Alba 2004), and positioning (Sayman, Hoch, and Raju 2001; Van Horen and Pieters 2017). Although those prior studies have provided many insights about copycatting, notably, none of those studies has examined how *consumer* characteristics influence copycat evaluation.

In the present studies we focus on the role of mindset in copycat evaluation and predict that a broad (inclusive and holistic information processing) as compared to a narrow mindset (exclusive and differentiating information processing) will positively affect copycat evaluation, independent of perceptions of similarity. When consumers process more inclusively, attending to the entire package, a transfer of positive associations is likely to occur, resulting in positive copycat evaluation (Van Horen and Pieters 2012a). When, on the other hand, a narrow mindset is activated, consumers will focus on the disparate imitated features and become more aware of the imitation practices used, causing reactance (Campbell and Kirmani 2000; Friestad and Wright 1994; Van Horen and Pieters 2012b). We test this rationale in four studies.

Study 1 (N = 385, students) tested whether holistic thinking was positively correlated with copycat evaluation. After completion of the holistic thinking scale (10-items, Choi, Dalal, Kim-Prieto, and Park 2003), participants evaluated the high similarity copycat "Bellamia"– an imitation of "Bertolli" spreadable butter – and indicated their willingness to buy, all on 7-point scales (4 items collapsed, α = .88). The results showed that participants who are more inclined to think holistically evaluated the copycat more positively (β = .14, t = 2.84, p = .01). Inclusion of the three control variables (familiarity with, evaluation, and purchase frequency of the imitated brand) did not change the pattern of results.

Study 2 (N = 148, students) tested whether a direct perceptual measure of processing mindset, the Framed Line Task (Kitayama, Duffy, Kawamura, and Larsen 2003), predicts copycat evaluation. The FLT measures the extent to which people are attuned to contextual information, by calculating the difference between the length of an original line presented in a frame and the line participants draw in a new frame that is either larger or smaller than the original frame, with larger error indicating a broader mindset. After completing six trials of the FLT, participants were asked to evaluate the high similarity copycat "Lecha" (imitation of "Milka" chocolate) and to indicate their willingness to buy (collapsed, α = .92). Results showed that the broader and more inclusive participants' processing mindset (higher error), the more positively participants evaluated the copycat (β = .17, t = 2.06, p = .04).

Study 3 (N = 93, students, 2-group between-subjects design) tested the effect more directly by experimentally activating a broad versus narrow mindset using the why/how task (Freitas, Gollwitzer, and Trope 2004). After thinking in an increasingly broad (narrow) way *why* (*how*) one would maintain good personal friendships, participants were asked to evaluate the Milka copycat, using the same stimuli and measures as in Study 2 (collapsed, α = .87). In addition to the control variables of Study 1, perceived similarity with the imitated brand and appropriateness of such similarity were assessed. As predicted, participants evaluated the copycat significantly more positively in the broad (M = 3.80, SD = 1.07) than in the narrow mindset (M = 3.08, SD = 0.98), $F(1, 91)$ = 11.41, p = .001, η_p^2 = .11. Furthermore, the effect of mindset on copycat evaluation remained significant after accounting for perceived similarity and appropriateness of similarity ($F(1, 90)$ = 8.83, p = .004 η_p^2 = .09). None of the control variables accounted for any of the variance (all ps > .10).

Study 4 (N = 556, Amazon Mechanical Turk) tested whether the effect of broad mindset is specific to *copycat* products, or improves evaluations of *any* product. Participants were randomly assigned to a 2 (mindset: broad, narrow; between-subjects) × 2 (product similarity: high, no; within-subject) mixed design. Participants in the narrow mindset condition generated examples of a given item, whereas those in the broad mindset condition generated superordinate categories of the same item (Fujita, Liberman, and Levin-Sagi 2006). All participants then evaluated, in random order, a "no" and "high" similarity brand of hazelnut spread (mimicking "Nutella"), and indicated their willingness to buy (collapsed, αs > .92). A two-way mixed ANOVA yielded a significant main effect of mindset ($F(1, 554)$ = 6.01, p = .02, η_p^2 = .01), with evaluations more positive in the broad (M = 4.87, SD = 1.31) than in the narrow mindset (M = 4.59, SD = 1.38), and a significant similarity×mindset interaction ($F(1, 554)$ = 4.68, p = .03, η_p^2 = .008). The high-similarity copycat was evaluated more positively in the broad (M = 4.96, SD = 1.44) than in the narrow mindset (M = 4.56, SD = 1.59; $F(1, 554)$ = 9.75, p = .002, η_p^2 = .02), whereas there was no such difference for the no-similarity brand (p = .21). Including perceived similarity, or any of the control variables, did not affect the product similarity×mindset interaction ($F(1, 554)$ = 5.18, p = .02, η_p^2 = .009).

Four studies demonstrate that copycats are evaluated more positively when people have a broad mindset – processing information more inclusively and holistic – than when they have a narrow mindset. These effects could not be explained by differences in similarity perception. We demonstrate the effects across different measures (traits) and manipulations (states), and across product categories, copycat stimuli, and samples, attesting the generalizability and robustness of the effect. This research demonstrates that consumer characteristics in general, and information processing more specific, critically affect copycat evaluation, demonstrating the appeal of copycats when the horizon is wide.

REFERENCES

Aribarg, Anocha, Neeraj Arora, Ty Henderson, and Youngju Kim (2014), "Private label imitation of a national brand: Implications for consumer choice and law," *Journal of Marketing Research,* 51(6), 657-75.

Campbell, Margaret C., and Amna Kirmani (2000), "Consumers' use of persuasion knowledge: The effects of accessibility and cognitive capacity on perceptions of an influence agent," *Journal of Consumer Research,* 27(1), 69-83.

Choi, Incheol, Reeshad Dalal, Chu Kim-Prieto, and Hyekyung Park (2003), "Culture and judgement of causal relevance," *Journal of Personality and Social Psychology*, 84(1), 46-59.

Fujita, Kentaro, Yaacov Trope, Nira Liberman, and Maya Levin-Sagi (2006), "Construal levels and self-control," *Journal of Personality and Social Psychology*, 90(3), 351-67.

Kitayama, Shinobu, Sean Duffy, Tadashi Kawamura, and Jeff T. Larsen (2003), "Perceiving an object and its context in different cultures: A cultural look at new look." *Psychological science,* 14(3), 201-06.

Sayman, Serdar, Stephen J. Hoch, and Jagmohan S. Raju (2002), "Positioning of store brands." *Marketing Science,* 21(4), 378-97.

Van Horen, Femke, and Rik Pieters (2012), "When high-similarity copycats lose and moderate-similarity copycats gain: The impact of comparative evaluation." *Journal of Marketing Research*, 49(1), 83-91.

_____ (2012b), "Consumer evaluation of copycat brands: The effect of imitation type", *International Journal of Research in Marketing,* 29(3), 246-55.

_____ (2017), "Out-of-category brand imitation: Product categorization determines copycat evaluation", *Journal of Consumer Research,* 44(4), 816-32.

Warlop, Luk, and Joseph W. Alba. (2004), "Sincere flattery: Trade-dress imitation and consumer choice", *Journal of Consumer Psychology,* 14(1&2), 21-7.

Zaichkowsky, Judith, L. (2006), *The psychology behind trademark infringement and counterfeiting,* New Jersey: Lawrence Erlbaum Associates, Inc.

Pay Me with Venmo: Effect of Service Providers Decisions to Adopt P2P Payment Methods on Consumer Evaluations

Liang Huang, University of Arizona, USA
Anastasiya Pocheptsova Ghosh, University of Arizona, USA
Ruoou Li, University of South Carolina, USA
Elise Chandon Ince, University of South Carolina, USA

EXTENDED ABSTRACT

Using a payment method is an indispensable part of any transaction in the marketplace. While traditional payment methods (such as credit cards or cash) are still responsible for the majority of transactions in the marketplace (84%, Kumar, Maktabi, and O'Brien 2018), new Peer-to-Peer (P2P) payment methods (such as Venmo and Zelle) have rapidly grown in the last decade, with an adoption rate of 52.1% in 2017 (Green and Stavins 2018). Notably, while originally P2P payments were offered exclusively for interpersonal transactions, the use of P2P payment methods in business transactions is expected to reach $74 billion dollars in 2021 (Kharif 2018). Yet, little is known about how these new payment methods impact consumer perceptions and willingness to transact.

We propose that the adoption of P2P payment methods by business providers can have unanticipated consequences. Specifically, we propose that when service providers offer P2P payment methods, consumers will perceive such providers as less competent and will be less likely to complete the transaction. We further propose that such perceptions would be enduring and have downstream consequences for firms and consumers over time: consumers would only change their evaluations after repeated positive experiences with the providers highlighting the competence dimension of their business. We discuss our theoretical development below.

First, P2P payment methods, such as Venmo, were introduced as an easy way to carry out social transactions with acquaintances, friends, and family, such as paying back friends for dinner (Zhang et al. 2017). P2P payment companies also promote these payment methods as platforms to foster social relationships, merging financial transactions with social life (Bary 2017). Pairing of two stimuli strengthens the mental association between them (Rudman 2004; Smith and Queller 2001; Van Osselaer 2008). Thus, P2P payment methods should be more likely to evoke social (vs. business) transactions.

Second, the mental association between P2P payment methods and social transactions will affect consumers' perception of service providers and their decisions to transact with them. In the marketplace, consumers often lack direct information about the competence or quality of a service provider and rely on other available cues to make these inferences. For example, consumers infer higher quality of product and service from a higher price (Baumgartner 1995) and availability of warranties (Boulding and Kirmani 1993). We suggest that the payment method offered would also affect consumers' perceptions of the service provider.

Third, consumers often form perceptions of others based on two dimensions: warmth and competence (Cuddy, Fiske, and Glick 2008). Warmth judgments relate to evaluations of kindness, friendliness, trustworthiness, and helpfulness (Aaker, Vohs, and Mogilner 2010), and competence judgments relate to the evaluation of effectiveness, intelligence, power, and skillfulness (Hoegg and Lewis 2011). Social interactions typically make the warmth dimension salient (Cuddy, Fiske, and Glick 2008). Because P2P payment methods are often used for social transactions, they are more likely to be associated with the warmth dimension. However, consumers often view warmth and competence as opposites: when forming judgments about people

or companies, an increase in perceived warmth decreases perceptions of competence (Aaker, Garbinsky, and Vohs 2012; Aaker et al. 2010). Thus, we expect that consumers will perceive business service providers offering P2P payment methods as less competent, when no other direct competence cues are available (H1).

Inference about the competence of service providers is an important evaluative dimension when consumers decide whether to transact with providers (Kirmani and Campbell 2004). This happens because consumers hire such providers to help them accomplish a goal. Therefore, consumers should focus more on provider's ability to help achieve that goal (competence) than on other dimensions of the provider, such as provider's perceived warmth (Kirmani and Campbell 2004; Kirmani et al. 2017). As a consequence, consumers should be less willing to buy from companies perceived as less competent (Aaker et al. 2010). Thus, we expect that the lower perceptions of service providers' competence should negatively affect the likelihood of consumers hiring them (H2).

We further propose that consumers' perceptions of a business service provider offering P2P payment methods can change over time. Perceived service quality is jointly determined by consumers' beliefs and the actual quality of the delivered service, and consumers update their perceptions of service providers based on their interactions with them (Boulding et al. 1993). When there is evidence that the service provider can deliver unambiguous and consistently competent service, consumers' evaluation of the service provider should improve over time. However, when the service provider demonstrates variance in service quality, such improvement in evaluation is less likely to take place. This happens because consumers attend more to negative (vs. positive) information when making judgments (Baumeister et al. 2001; Ito et al. 1998; Rozin and Royzman 2001). And they tend to encode new information in a way that is consistent with their prior knowledge, especially when the evidence is ambiguous (Higgins, Rholes, and Jones 1977; Srull and Wyer 1979, 1980). Thus, when a service experience contains mixed positive and negative information, consumers, who hold the prior belief that a business service provider who offers P2P payment methods is less competent, are less likely to update their perceptions than when their experienced service quality is consistently high. Thus, the negative impact of P2P payment methods on perceptions of a business service provider should attenuate over time when repeated interactions with the provider are consistently positive but not when they are ambiguous (H3).

Finally, we expect that a positive change in consumer judgments over multiple transactions with the service provider depends on positive performances being demonstrated in the domain of competence but not warmth. Consumers view warmth of a service provider as "extra-role aspect of the service encounter" (Grandey et al. 2005, 47). Displaying extra warmth in service does not improve consumers' satisfaction and expected service quality perceptions, when the core characteristic of a service provider, competence, is not secured (Grandey et al. 2005). For instance, consumers are less willing to purchase from non-profit companies when there is doubt about their competence, even when perceived warmth of these companies is high (Asker et al. 2010). Thus, the negative impact of P2P (vs. non-

P2P) payment methods on perceptions of a business service provider should attenuate over time only when repeated positive interactions with the provider highlight the competence dimension of the service but not when they highlight the warmth dimension (H4).

We test our hypotheses in three studies.

Study 1 (N = 264) tests whether consumers perceive a business service provider offering P2P payment methods to be less competent and subsequently are less likely to hire them (H1 and H2). We test the effect in two service domains (based on pretest) that require either a high level of competence or warmth, i.e. computer repairing and dog walking, with a 2 service type (computer repair vs. dog walk) x 2 payment method (P2P: Venmo vs. non-P2P: credit card) between-subjects design. Participants were asked to imagine either looking to hire a computer repairman or a dog walker. Then, participants in the P2P (non-P2P) payment condition read that the service provider requests to pay with Venmo (credit card). Participants indicated their likelihood to hire the service provider and rated competence (competent, experienced, and professional, α=.93) and warmth (kind, warm, and social, α = .85) of the service provider.

Hiring Likelihood. A 2-way ANOVA revealed a significant interaction ($F(1, 260)=40.29, p<.001$). Specifically, P2P payment led to a significantly lower hiring likelihood (M_{P2P}=3.42, SD=1.84 vs. M_{nonP2P}=4.31, SD=1.61; $F(1, 260)=9.53, p=.002$) in the computer repair condition, but a higher hiring likelihood (M_{P2P}=5.18, SD=1.59 vs. M_{nonP2P}=3.49, SD=1.57; $F(1, 260)=34.68, p<.001$) in the dog walker condition.

Competence and warmth ratings. In the computer repairman condition, the results revealed a significant interaction of payment type by rating type ($F(1,130)=90.50, p <.001$). Importantly, consumers perceived computer repairman as less competent, when the provider asked for P2P (vs. non-P2P; $M_{P2P=3.20, SD=1.17}$ vs. $M_{nonP2P=4.76, SD=1.23}$; $F(1,130)=55.40, p<.001$). There was a marginal increase in warmth ratings ($M_{P2P=4.39, SD=.90}$ vs. $M_{nonP2P=4.08, SD=.98}$; $F(1,130)=3.62, p=.06$). Further, the perceived competence of the service provider mediated the effect of payment methods on hiring (indirect effect: $\beta = 1.22$, 95% CI [.78, 1.75], while the perceived warmth did not (indirect effect: $\beta = -.08$, 95% CI [-.34, .02]).

In the dog walker condition, the results also revealed a significant interaction of payment type by rating type ($F(1,130)=27.22, p<.001$). Consumers perceived the dog walker as warmer when the provider asked for P2P (vs. non-P2P) ($M_{P2P=4.84, SD=1.17}$ vs. $M_{nonP2P=3.89, SD=1.23}$; $F(1,130)=27.22, p<.001$). No comparable effects were observed for competence ratings ($p > .80$). Opposite to the results in the computer repair condition, the perceived warmth of the dog walker mediated the effect of payment methods on hiring (indirect effect: $\beta = -.28$, 95% CI [-.57, -.02]), but the perceived competence did not (indirect effect: $\beta = .02$, 95% CI [-.17, .21]).

Study 2 (N = 226) tests the effect of P2P payment methods on consumers' expected service quality by a service provider over time (H3). In this study, we use service quality expectations as our main dependent variable because they reflect consumers' perceived competence of the service provider (Swartz and Brown 1989) and often predict consumer hiring decisions (Boulding et al. 1993). Study 2 employed a 2 payment method (P2P: Venmo vs. non-P2P: credit card; between) x 2 experienced service quality (consistently positive vs. ambiguous; between) x Time (within) mixed design. Participants were told that they were looking to hire a pest control service for a monthly visit and found a provider that accepted Venmo (credit card) in addition to cash. Then, participants rated the expected service quality in the first month prior to having any interaction with the pest control provider (T_0). Next, in the consistent positive condition, participants first read that the service for the first month was effective

and indicated the expected pest control service quality in the second month (T_1). Next, participants read again that the service was effective and reported the expected service quality in the third month (T_2). By contrast, in the ambiguous condition, participants first read that pest control was effective and rated the expected service quality in the second month (T_1). Next, participants read that the service was not effective and reported the expected service quality in the third month (T_2). To make the last service experience more comparable in the two conditions, in the ambiguous condition only, participants received third feedback. They read that the service was effective and rated the expected service quality in the fourth month (T_3).

Consistent positive experience condition. A mixed ANOVA with payment method (between-subjects) and time (within-subject) revealed a main effect of payment method ($F(1,116)=5.94, p=.016$), such that the adoption of P2P (vs. non-P2P) payment methods lowered expected quality of the business service provider (M_{P2P}=5.21, SD=1.25; $M_{nonP2Pp}$=5.72, SD=1.00), consistent with study 1. Importantly, there was a significant payment method by time interaction ($F(1,116)=12.28, p=.001$). Offering P2P (vs. non-P2P) payment methods led to lower expected service quality at T_0 (M_{P2P}=4.19, SD=1.51; M_{nonP2P}=5.20, SD=1.32; $F(1,116)=15.09, p<.001$). However, the contrasts were not significantly different at T_1 and T_2 ($Fs < 2.32$), indicating that consistent positive experience over time attenuated the negative effect of offering P2P payment methods on the perceptions of service quality.

Ambiguous experience condition. A mixed ANOVA again revealed a significant main effect of payment method ($F(1,106)=10.03, p=.002$), such that offering P2P (vs. non-P2P) payment methods lowered expected service quality (M_{P2P}=4.36, SD=1.21; M_{nonP2P}=5.07, SD=1.14). The was also a quadratic main effect of time ($F(1,106)=6.50, p=.012$), such that experiencing effective service increased expected service quality and experiencing ineffective service decreased expected service quality. There was no interaction between payment methods and time (quadratic effect: $F < 1$), suggesting that the negative effect of payment methods persists over time when experienced service quality is more ambiguous, supporting H3.

Study 3 (N = 267) tests the impact of repeated positive interactions with the provider that highlight the competence vs. the warmth dimension of the service (H4). The study employed a 2 payment method (P2P: Venmo vs. non-P2P: credit card; between) x 2 experienced service (warmth vs. competence; between) x Time (within) mixed design. Participants were told that they needed to hire a pest control provider for a monthly service and found one that, besides cash, started to accept either Venmo or credit card. Participants rate the expected service quality at T_0, T_1, and T_2 as in study 2. In the competent service experience condition, participants read that the pest control agency acted in a very professional and efficient way. While participants, in the warm service experience condition, read that the service provider acted in a very warm and friendly way (e.g. after T_0 and T_1).

Competent service experience condition. Replicating study 2, the results revealed a significant interaction of payment method by time ($F(2,247)=11.34, p < .001$). Specifically, offering P2P (vs. non-P2P) payment method led to lower expected service quality at T_0, (M_{P2P}=4.18, SD=1.41; M_{nonP2P}=4.86, SD=1.42; $F(1,137)=8.08, p=.005$). However, the contrasts between were not significantly different at T_1 and T_2 ($Fs<.95$), indicating that providing competent service over time attenuated the negative effect of payment methods.

Warm service experience over condition. The analysis revealed a significant main effect of payment method ($F(1,126)=11.31, p=.001$), such that the use of P2P (vs. non-P2P) payment methods

led to lower expected service quality. However, there was no interaction between payment methods and time ($F < .20$): the expected service quality when P2P (vs. non-P2P) payment method was used was lower for all time periods, supporting H4.

In three studies, we address the consequences of service providers adopting new P2P payment methods for consumer perceptions and willingness to transact. We argue that consumers associate P2P payment methods more with social transactions than with business transactions, which leads them to rate service providers as warmer and thus less competent, and decreases the likelihood of transactions. This effect has long-term consequences: perceptions of service providers improve only when their competence is demonstrated over multiple service encounters. However, the negative impact of P2P payment methods on perceptions of business service providers persists when experiences are mixed (both positive and negative) or highlight only warmth aspects of business.

Our work has both theoretical and managerial contributions. Prior work on payment methods has almost exclusively focused on the differences in experienced pain of payment between the payment methods and its consequences for amount and type of product purchased (Prelec and Simester 2001; Raghubir and Srivastava 2008; Soman 2004; Thomas, Desai, and Seenivasan 2011). The paper extends the literature by showing that payment methods can have a broader impact on evaluations of business, specifically judgments of competence of service providers. Furthermore, we demonstrate that this happens via a different mechanism (mental associations with warmth and competence) than pain of payment. Our work also contributes to the growing literature that shows that benefits of innovations adoption are context-dependent (Longoni et al. 2019; Van Ittersum et al. 2013). While keeping up with technological innovations is often seen as critical for businesses to survive in the marketplace, our findings suggest that service providers should be cautious when adopting novel payment methods, which might be associated with unexpected characteristics of transactions (e.g., warmth vs. competence).

REFERENCES

Aaker, Jennifer L., Emily N. Garbinsky, and Kathleen D. Vohs (2012), "Cultivating Admiration in Brands: Warmth, Competence, and Landing in the 'Golden Quadrant'," *Journal of Consumer Psychology,* 22 (2), 191-194.

Aaker, Jennifer, Kathleen D. Vohs, and Cassie Mogilner (2010), "Nonprofits are Seen as Warm and For-Profits as Competent: Firm Stereotypes Matter," *Journal of Consumer Research*, 37(2), 224-237.

Bary, Emily (2017), "Is Venmo the Next Big Social Network?" https://www.barrons.com/articles/is-venmo-the-next-big-social-network-1489085179

Baumeister, Roy F., Ellen Bratslavsky, Catrin Finkenauer, and Kathleen D. Vohs (2001), "Bad is Stronger than Good," *Review of General Psychology*, 5 (4), 323-70.

Baumgartner, Hans (1995), "On the Utility of Consumers' Theories in Judgments of Covariation," *Journal of Consumer Research*, 21 (4), 634-43.

Boulding, William, Ajay Kalra, Richard Staelin, and Valarie A. Zeithaml (1993), "A Dynamic Process Model of Service Quality: From Expectations to Behavioral Intentions," *Journal of Marketing Research*, 30 (1), 7-27.

Boulding, William and Amna Kirmani (1993), "A Consumer-Side Experimental Examination of Signaling Theory: Do Consumers Perceive Warranties as Signals of Quality?" *Journal of Consumer Research*, 20 (1), 111-23.

Cuddy, Amy J.C., Susan T. Fiske, and Peter Glick (2008), "Warmth and Competence as Universal Dimensions of Social Perception: The Stereotype Content Model and the BIAS Map," *Advances in Experimental Social Psychology*, 40, 61-149.

Grandey, Alicia A., Glenda M. Fisk, Anna S. Mattila, Karen J. Jansen, and Lori A. Sideman (2005), "Is 'Service with a Smile' Enough? Authenticity of Positive Displays during Service Encounters," *Organizational Behavior and Human Decision Processes*, 96, 38-55.

Greene, Claire, and Joanna Stavins (2018), "The 2016 and 2017 Surveys of Consumer Payment Choice: Summary Results," *Research Data Reports*.

Higgins, E. Tory, William S. Rholes, and Carl R. Jones (1977), "Category Accessibility and Impression Formation," *Journal of Experimental Social Psychology*, 13 (2), 141-54.

Hoegg, Joandrea and Michael V. Lewis (2011), "The Impact of Candidate Appearance and Advertising Strategies on Election Results," *Journal of Marketing Research*, 48 (5), 895-909.

Ito, Tiffany A., Jeff T. Larsen, N. Kyle Smith, and John T. Cacioppo (1998), "Negative Information Weighs More Heavily on the Brain: The Negativity Bias in Evaluative Categorizations," *Journal of Personality and Social Psychology*, 75 (4), 887-900.

Kharif, Olga (2018), "Venmo Competitor Zelle Wants to Let You Pay Businesses, Too," https://www.washingtonpost.com/business/on-small-business/venmo-competitor-zelle-wants-to-let-you-pay-businesses-too/2018/08/15/f610da64-a0c5-11e8-a3dd-2a1991f075d5_story.html?utm_term=.58d1c52d3040

Kirmani, Amna and Margaret C. Campbell (2004), "Goal Seeker and Persuasion Sentry: How Consumer Targets Respond to Interpersonal Marketing Persuasion," *Journal of Consumer Research*, 31 (3), 573-82.

Kirmani, Amna, Rebecca W. Hamilton, Debora V. Thompson, and Shannon Lantzy (2017), "Doing Well versus Doing Good: The Differential Effect of Underdog Positioning on Moral and Competent Service Providers," *Journal of Marketing*, 81 (1), 103-17.

Kumar, Raynil, Tayeba Maktabi, and Shaun O'Brien (2018), "2018 Findings from the Diary of Consumer Payment Choice", San Francisco, CA: Federal Reserve Bank of San Francisco.

Longoni, Chiara, Andrea Bonezzi, and Carey Morewedge (2019), "Resistance to Medical Artificial Intelligence," *Journal of Consumer Research*, Forthcoming.

Prelec, Drazen and Duncan Simester (2001), "Always Leave Home without It: A Further Investigation of the Credit-Card Effect on Willingness to Pay," *Marketing Letters*, 12 (1), 5-12.

Raghubir, Priya and Joydeep Srivastava (2008), "Monopoly Money: The Effect of Payment Coupling and Form on Spending Behavior," *Journal of Experimental Psychology: Applied,* 14 (3), 213-25.

Rozin, Paul and Edward B. Royzman (2001), "Negativity Bias, Negativity Dominance, and Contagion," *Personality and Social Psychology Review*, 5 (4), 296-320.

Rudman, Laurie A. (2004), "Sources of Implicit Attitudes," *Current Directions in Psychological* Science, 13 (2), 79-82.

Smith, Eliot R. and Sarah Queller (2001), "Mental Representation," *Blackwell Handbook of* Social Psychology, Vol. 1: Intraindividual Processes, ed. Abraham Tesser and Norbert Schwarz, Oxford, UK: Basil Blackwell, 111-33.

Soman, Dilip (2004), "The Effect of Payment Transparency On Consumption: Quasi-Experiments from The Field," *Marketing Letters*, 14(3), 173-183.

Srull, Thomas K. and Robert S. Wyer, Jr. (1979), "The Role of Category Accessibility in the Interpretation of Information about Persons: Some Determinants and Implications," *Journal of Personality and Social Psychology*, 37 (10), 1660-72.

———— (1980), "Category Accessibility and Social Perception: Some Implications for the Study of Person Memory and Interpersonal Judgements," *Journal of Personality and Social Psychology*, 28 (6), 841-56.

Swartz, Teresa A. and Stephen W. Brown (1989), "Consumer and Provider Expectations and Experiences in Evaluating Professional Service Quality," *Journal of the Academy of Marketing Science*, 17 (2), 189-95.

Thomas, Manoj, Kalpesh Kaushik Desai, and Satheeshkumar Seenivasan (2011), "How Credit Card Payments Increase Unhealthy Food Purchases: Visceral Regulation of Vices," *Journal of Consumer Research*, 38 (1), 126–39.

Van Ittersum, Koert, Brian Wansink, Joost M.E. Pennings, and Daniel Sheehan (2013), "Smart Shopping Carts: How Real-Time Feedback Influences Spending," *Journal of Marketing*, 77 (6), 21-36.

Van Osselaer, Stijn M. J. (2008), "Associative Learning and Consumer Decisions," *Handbook* of Consumer Psychology, Vol. 1, ed. Curtis P. Haugtvedt, Paul M. Herr, and Frank R. Kardes, Mahwah, NJ: Erlbaum, 699–729.

Zhang, Xinyi, Shiliang Tang, Yun Zhao, Gang Wang, Haitao Zheng, and Ben Y. Zhao (2017), "Cold Hard E-Cash: Friends and Vendors in the Venmo Digital Payments System," *Eleventh International Association for the Advancement of Artificial Intelligence Conference on Web and SoFcial Media*, Palo Alto, CA: The AAAI Press, 387-96.

Presence of Meaning in Life Improves Response to Others' Self-Promotion

Young Eun Huh, Korea Advanced Institute of Science and Technology (KAIST), South Korea
Irene Scopelliti, City University of London, UK
Seo Young Myaeng, Northwestern University, USA

EXTENDED ABSTRACT

It is not uncommon to be exposed to others' self-promotional attempts, especially in the digital age. People use social media platforms to convey a positive self-image by sharing positive moments, consumption experiences, and the best aspects of their lives (Kross et al., 2013). They may believe their audiences would receive their achievements and fortunes favorably, yet recipients often perceive self-promotion as bragging and respond negatively to it (Packard, Gershoff, & Wooten, 2016; Scopelliti, Loewenstein, & Vosgerau, 2015; Sezer, Gino, & Norton, 2018). Frequent exposure to this type of messages may in part explain why the consumption of social media has been linked to declines in subjective well-being (Kross et al., 2013; Orben & Przybylski, 2019; Verduyn et al., 2015).

Previous research has shown that the lack of a sense of meaning underlies some negative emotional consequences of social media use (Sagioglou & Greitemeyer, 2014), and that the effect of social feedback on post authors' self-esteem is moderated by individual differences in one's sense of purpose in life (Burrow & Rainone, 2016). Yet, little is known about whether individual differences can mitigate the perceived aversiveness of others' self-promotion. The present research addresses this gap by proposing that the *search for* vs. *presence of meaning in life* (MIL; Steger, Kashdan, Sullivan, & Lorentz, 2008; King & Napa, 1998) influences recipients' well-being by changing their emotional responses to others' self-promotion.

MIL, defined as "the extent to which people comprehend, make sense of, or see significance in their lives, accompanied by the degree to which they perceive themselves to have a purpose, mission, or overarching aim in life (Steger, 2009, p. 682)," has a multitude of beneficial and salubrious effects, including higher life satisfaction, better social relationships, and more skillful adjustment to stressful life events (Park & Baumeister, 2017; Steger et al., 2008). Presence of MIL is associated with psychological stability, healthy self-acceptance, strong social relationships, higher satisfaction with oneself and others, and better ability to recover emotionally from exposure to negative stimuli (Steger et al., 2008; Schaefer et al., 2013). Thus, we predict presence of MIL to be related to less negative emotional responses to others' self-promotion—perhaps the act being viewed as a form of celebration rather than bragging. We tested this prediction in two pre-registered studies, the second of which shows that a simple intervention to increase one's sense of presence of MIL can improve responses to others' self-promotion.

In study 1 (N = 202), we the relationship between MIL and emotional responses to others' acts of self-promotion. Participants imagined following many of their former high school classmates on Instagram, and seeing that a former classmate posted a photo of a luxurious spa with a caption about having a wonderful holiday. They indicated the extent to which the post made them experience positive emotions and negative emotions (1 = not at all; 7 = very much), and completed the Meaning in Life Questionnaire (MLQ; Steger et al. 2006).

As predicted, the presence of MIL was positively correlated with the experience of positive emotions ($r = .196$, $p = .005$) and negatively correlated with the experience of negative emotions ($r = -.157$, $p = .026$).

Study 2 tested whether an intervention to foster one's perceptions of presence MIL would reduce negative responses to self-promotion. At Time 1, participants (N = 1,808) completed the MLQ questionnaire. One week later (Time 2), all participants were invited to take part in a second survey, which was open to 400 participants (401 actually completed it). These participants were randomly assigned to an intervention or control condition. Participants in the intervention condition were asked to reflect upon and write a few sentences about the meaning in their lives. They were instructed to focus on anything that gives meaning to their lives and makes their lives significant. Participants in the control condition did not complete this writing task. Afterwards, all participants imagined accessing their Facebook account and seeing a post by a former classmates mentioning a promotion to a higher rank position. Participants indicated the extent to which the post caused them to experience positive and negative emotions, annoyance, envy, and irritation (1 = not at all; 7 = very much). Finally, participants completed the MLQ a second time and reported their demographic information.

The intervention increased presence of MIL at Time 2, $F(1, 255) = 30.21$, $p < .001$. Participants in the control group showed no change in their MIL scores between Time 1 and Time 2. Replicating the results of Study 1, the presence of MIL was positively correlated with the experience of positive feelings ($r = .280$, $p < .001$) and negatively correlated with the experience of negative feelings ($r = -.269$, $p < .001$) and other specific negative emotions ($rs < -.186$, $ps < .001$) when reading the post.

Most importantly, participants in the intervention condition experienced less negative emotions, $F(1, 396) = 6.93$, $p = .009$, and felt less annoyed, envious, and irritated, than participants in the control condition. As a more rigorous test of whether the intervention changed emotional responses to self-promotion by increasing presence of MIL, we observed a significant mediation of presence of MIL on all emotions measured. These results demonstrate that an intervention as simple as writing a few sentences about what makes one's life meaningful significantly increased participants' sense of presence of MIL and improved their experience when exposed to a self-promotional social media post.

Social media has become an integral part of people's lives. Although a beneficial means of instant communication and connection, these platforms are also commonly used for self-promotional purposes, which may be received adversely (Pew Research Center, 2018), decreasing one's sense of well-being (Kross et al., 2013; Orben & Przybylski, 2019; Verduyn, et al., 2015). The present research is one of the first to suggest simple ways to reduce negative interpretations of acts of self-promotion. Our findings suggest that briefly contemplating the significance and meaning of one's life can help mitigate negative responses to others' acts of self-promotion.

REFERENCES

Burrow, A. L., & Rainone, N. (2017). How many likes did I get?: Purpose moderates links between positive social media feedback and self-esteem. *Journal of Experimental Social Psychology*, *69*, 232-236.

King, L. A., & Napa, C., K. (1998). What makes a life good? *Journal of Personality and Social Psychology, 75,* 156–165.

Kross, E., Verduyn, P., Demiralp, E., Park, J., Lee, D. S., Lin, N.,... Ybarra, O. (2013). Facebook use predicts declines in subjective wellbeing in young adults. *PLoS ONE*, 8, e69841.

Orben, A., & Przybylski, A. K. (2019). Screens, teens, and psychological well-being: Evidence from three time-use-diary studies. *Psychological Science*, 30, 682-696.

Our World in Data. (2019). The rise of social media. Retrieved from https://ourworldindata.org/rise-of-social-media

Packard, G., Gershoff, A. D., & Wooten, D. B. (2016) When boastful word of mouth helps versus hurts social perceptions and persuasion. *Journal of Consumer Research*, 43(1). 26-43.

Park, J., & Baumeister, R. F. (2017). Meaning in life and adjustment to daily stressors. *The Journal of Positive Psychology*, 12, 333–341.

Pew Research Center. (2018). Teens and their experiences on social media. Retrieved from https://www.pewinternet.org/2018/11/28/teens-and-their-experiences-on-social-media/

Sagioglou, C., & Greitemeyer, T. (2014). Facebook's emotional consequences: Why Facebook causes a decrease in mood and why people still use it. *Computers in Human Behavior*, *35*, 359-363.

Schaefer, S. M., Boylan, J. M., Van Reekum, C. M., Lapate, R. C., Norris, C. J., Ryff, C. D., & Davidson, R. J. (2013). Purpose in life predicts better emotional recovery from negative stimuli. *PloS one*, *8*(11), e80329.

Scopelliti, I., Loewenstein, G., & Vosgerau, J. (2015). You call it "self-exuberance"; I call it "bragging". *Psychological Science,26*(6), 903-914.

Sezer, O., Gino, F., & Norton, M. I. (2018). Humblebragging: A distinct—and ineffective—self-presentation strategy. *Journal of Personality and Social Psychology*, 114(1), 52-74.

Steger M. F. Meaning in life. In: Lopez SJ, Snyder CR, Lopez SJ, Snyder CR, editors. Oxford handbook of positive psychology. 2nd ed. Oxford library of psychology. 2. New York, NY: Oxford University Press; 2009. pp. 679–87

Steger, M. F., Frazier, P., Oishi, S., & Kaler, M. (2006). The meaning in life questionnaire: Assessing the presence of and search for meaning in life. *PsycTESTS Dataset,*80-93.

Steger, M. F., Kashdan, T. B., Sullivan, B. A., & Lorentz, D. (2008). Understanding the search for meaning in life: Personality, cognitive style, and the dynamic between seeking and experiencing meaning. *Journal of Personality,76*(2), 199-228.

Verduyn, P., Lee, D. S., Park, J., Shablack, H., Orvell, A., Bayer, J., . . . Kross, E. (2015). Passive Facebook usage undermines affective well-being: Experimental and longitudinal evidence. *Journal of Experimental Psychology: General*, 144(2), 480-488.

When Curiosity Helps to Make Sense of It: How Ad-Evoked Curiosity Affects the Evaluation of Low-Fit Brand Extensions

Verena Hüttl-Maack, University of Hohenheim, Germany
Tara Madleen Sedghi, University of Hohenheim, Germany

EXTENDED ABSTRACT

While it is a promising strategy to introduce high-fit brand extensions (e.g., Aaker and Keller 1990), for some brands, it might be necessary to extend into more distant categories to exploit growth and ensure long-term success. However, consumers confronted with low-fit brand extensions face the challenge of resolving the perceived incongruity between the brand and the new extension category. The effortful process of understanding and cognitively classifying new low-fit extensions is challenging, and thus their evaluation tends to be negative. However, if they can be integrated into the cognitive structure, an affectively intense and positive reaction follows (Mandler 1982). An important factor in this process is the perceived ease of resolution, defined as the facility by which an incongruent situation is resolved. A higher ease of resolution typically leads to positive evaluations (Alden, Mukherjee, and Hoyer 2000). We argue that the process of incongruity resolution can be facilitated by inducing curiosity with an advertisement. Curiosity is a motivating force that triggers exploratory behavior and an active search for information (Berlyne 1960; Loewenstein 1994). Therefore, it urges individuals to make sense of an unclear situation (Litman and Jimerson 2004). Moreover, resolving curiosity causes positive affect (Ruan, Hsee, and Lu 2018).

Our research aims to investigate whether and how ad-evoked situational curiosity influences the processing and evaluation of brand extensions and, more generally, how it affects incongruity resolution. We assume that curiosity can ease incongruity resolution, resulting in a more favorable evaluation, and we expect the effect to be stronger for low-fit compared to high-fit brand extensions. In three studies following a 2 (curiosity: low vs. high) x 2 (category fit: low vs. high fit) between-subjects design, we investigated these assumptions.

Study 1 examined the effect of curiosity on the attitude toward brand extensions and the moderating role of fit. In a paper-and-pencil study, university students ($N = 280$) were randomly assigned to one of the four conditions and were shown fictious ads for a new brand extension. We chose two well-known and equally liked brands and combined them with the product category chewing gum to create high- and low-fit brand extensions. To manipulate curiosity, a stepwise procedure of information disclosure was applied, with an information gap being created and subsequently resolved (Menon and Soman 2002). To avoid any perceptual differences induced by the manner in which the information is disclosed, we used the stepwise procedure in both the high- and low-curiosity conditions. In the high-curiosity condition, the ad showed only a brand logo, a hint about the new product, and a request: "Find out more!" It neither showed the product nor provided any further information. However, in the low-curiosity condition, the respondents were shown a product picture and some basic product information. After measuring situational curiosity (Lee and Qiu 2009), a follow-up ad revealed details about the brand extension. Participants then reported their perceived fit (Boush et al. 1987; Keller and Aaker 1992) and their attitude toward the brand extension. A two-way ANOVA revealed a positive effect of curiosity on the attitude toward the brand extension ($p < .001$) and the expected interaction ($p < .05$), indicating that curiosity led to a more favorable attitude toward the low-fit brand extension but did not affect the attitude toward the high-fit brand extension.

Study 2 investigated the mediating role of ease of resolution by again surveying university students ($N = 182$) in a paper-and-pencil study. The test product category consisted of potato chips. Combining this category with a well-known crackers brand created a high-fit brand extension, and with a sausage-brand, a low-fit brand extension. The procedure, curiosity manipulation, and measures were similar to Study 1. Additionally, the ease of resolution (Alden et al. 2000; Jhang, Grant, and Campbell 2012) was assessed after the second ad. A moderated mediation model (PROCESS, Hayes 2018) provided evidence for the indirect effect. For the low-fit brand extension, curiosity increased the ease of resolution, which led to a more positive attitude (.34; CI: [.14; .56]). The indirect effect was not significant for the high-fit brand extension (.02; CI: [−.19; .20]).

Study 3 additionally examined the role of curiosity's affective consequences (Ruan et al. 2018) with a consumer sample ($N = 152$) in an online shopping context. Again, two different brands were used to create the perception of a high-fit and a low-fit extension for the category of e-book readers. A moderated multiple mediation model confirmed the ease of resolution as a mediator only for the low-fit extension. In addition, we found a parallel sequential mediation indicating that an increased ease of resolution led to positive feelings, which consequently resulted in a more positive attitude (.13; CI: [.02; .29]). Unlike for the effect on ease of resolution, there was no significant interaction of curiosity and fit on positive feelings.

Our results show that ad-evoked curiosity improved brand extension evaluation, driven by an increased ease of resolution and positive feelings. This is especially relevant for low-fit brand extensions, which are challenging to process. An interesting aspect is that perceived fit was not directly affected by curiosity, although this also would have been plausible. Examining this in more depth is an avenue for future research. For marketers, curiosity-evoking advertisements may provide a good possibility for increasing the acceptance of incongruent products, be they brand extensions or innovations.

REFERENCES

Aaker, David A. and Kevin L. Keller (1990), "Consumer Evaluations of Brand Extensions," *Journal of Marketing*, 54 (1), 27–41.

Alden, Dana L., Ashesh Mukherjee, and Wayne D. Hoyer (2000), "The Effects of Incongruity, Surprise and Positive Moderators on Perceived Humor in Television Advertising," *Journal of Advertising*, 29 (2), 1–15.

Barone, Michael J., Paul W. Miniard, and Jean B. Romeo (2000), "The Influence of Positive Mood on Brand Extension Evaluations," *Journal of Consumer Research*, 26 (4), 386–400.

Berlyne, Daniel E. (1960), *Conflict, Arousal and Curiosity*, New York, NY: McGraw-Hill Book Company.

Boush, David M., Shannon Shipp, Barbara Loken, Esra Gencturk, Susan Crockett, Ellen Kennedy, Bettie Minshall, Dennis Misurell, Linda Rochford, and Jon Strobel (1987), "Affect Generalization to Similar and Dissimilar Brand Extensions," *Psychology & Marketing*, 4 (3), 225–37.

Hayes, Andrew F. (2018), *Introduction to Mediation, Moderation, and Conditional Process Analysis: A Regression-based Approach (2nd edition)*, New York, NY: Guilford.

Jhang, Ji Hoon, Susan Jung Grant, and Margaret C. Campbell (2012), "Get It? Got It. Good! Enhancing New Product Acceptance by Facilitating Resolution of Extreme Incongruity," *Journal of Marketing Research*, 49 (2), 247–59.

Keller, Kevin L. and David A. Aaker (1992), "The Effects of Sequential Introduction of Brand Extensions," *Journal of Marketing Research*, 29 (1), 35–50.

Lee, Yih Hwai and Cheng Qiu (2009), "When Uncertainty Brings Pleasure: The Role of Prospect Imageability and Mental Imagery," *Journal of Consumer Research*, 36 (4), 624–33.

Litman, Jordan A. and Tiffany L. Jimerson (2004), "The Measurement of Curiosity as a Feeling of Deprivation," *Journal of Personality Assessment*, 82 (2), 147–57.

Loewenstein, George (1994), "The Psychology of Curiosity: A Review and Reinterpretation," *Psychological Bulletin*, 116 (1), 75–98.

Mandler, George (1982), "The Structure of Value: Accounting for Taste," in *Affect and Cognition: The 17th Annual Carnegie Symposium on Cognition*, ed. Margaret S. Clark and Susan T. Fiske, Hillsdale, NJ: Erlbaum, 3–36.

Menon, Satya and Dilip Soman (2002), "Managing the Power of Curiosity for Effective Web Advertising Strategies," *Journal of Advertising*, 31 (3), 1–14.

Ruan, Bowen, Christopher K. Hsee, and Zoe Y. Lu (2018), "The Teasing Effect: An Underappreciated Benefit of Creating and Resolving an Uncertainty," *Journal of Marketing Research*, 55 (4), 556–70.

Consumer Response to Nutrition Claims: Focus on Adding Good or Removing Bad

Iina Ikonen, University of Bath, UK
Aylin Aydinli, Vrije Universiteit Amsterdam, The Netherlands
Peeter Verlegh, Vrije Universiteit Amsterdam, The Netherlands

EXTENDED ABSTRACT

Nutrition claims are one way to highlight the healthiness of a food. While there is regulation surrounding the way manufacturers may use such claims, freedom to decide whether or not to carry such claims, and which specific ones, remains. For example, a product may be low in fat, but high in fiber: does it matter which claim a manufacturer decides to place on their product? While recent work has established that consumers react differently to various types of nutrition claims (André et al., 2019), current regulation and previous academic research seems to ignore such differences. Furthermore, though a framework of claim types has been established (André et al., 2019), understanding of what is driving the different consumer reactions and which claim types may be preferred is still missing.

Furthermore, research has found mixed results for consumer reactions to nutrition claims – some find that consumers eat more healthy as a result, others find even negative results (Seymour et al., 2004; Wansink & Chandon, 2006). To understand this, and to further study consumer reactions to nutrition claims, the purpose of this paper is to understand how consumers differentiate between two specific types of nutrition claims, namely those focusing on adding positive nutrients (from now on "addition claims" vs. highlighting the removal of negative nutrients, "removal claims"). While previous work has differentiated different broad categories of food claims, such as nutrition claims, health claims and health risk reduction claims (e.g. Aschemann & Hamm, 2008; Paek et al., 2011), the specific focus on the content of these claims has been very limited in previous academic research. In fact, there is limited understanding of how consumers react to the variety of nutrition claims, while the importance of such knowledge is increasingly important as concerns for consumer health as well as the usage of nutrition claims on product packaging are both increasing (André et al., 2019).

Research has found that positively framed messages are typically more effective in influencing consumer perceptions and behaviors as they increase consumers' positive associations towards the product (Levin et al., 1998; Newman et al., 2012), though the opposite has also been argued (Amatulli et al., 2019; Block & Keller, 1995). Previous work specifically on nutrition claims has also found consumers to like removal claims less, possibly as the removal process is seen as hurting the naturalness of the product (Rozin, 2006; Rozin et al., 2009).

However, adding a nutrient may also be perceived as receiving something additional with the product. As long as consumers perceive the addition as a wanted "bonus", consumers should react positively to addition claims as they do towards for example bonus pack or multiple item promotions even when the unit price remains the same (Cohen & Babey, 2012). Following the idea of André, Chandon and Haws (2019), who suggested consumers may perceive addition claims as higher effort from the manufacturer, we argue that consumers react positively towards addition claims as they perceive products carrying such claims to bring more value through this added nutrient. In other words, the addition of positive nutrients offers consumers something more than a regular product, or one where nutrients have been removed.

Based on this, we formulate the following hypotheses:

Hypothesis 1	*Consumers will evaluate a food product carrying an addition claim more positively than one carrying a removal claim.*
Hypothesis 2	*The positive effect of addition claims (vs. removal claims) is driven by a higher perceived value offered by the product with the claim.*

We first conduct a meta-analysis of previous work on nutrition claims to find initial evidence for our proposal that consumers differentiate between these two claim types. To shed more light on the mechanism behind the effect, we follow up with two experiments, which support the idea that consumers react more positively to addition claims (vs. removal claims) and that this effect is driven by the increased perception of value for money of the product. We further exclude some potential alternative explanations, such as a removal claim hurting tastiness perceptions.

The contribution of our work is threefold. Firstly, the findings offer an explanation to the inconsistencies in existing research and can function as a starting point for future research on nutrition labeling and claims. Secondly, we offer guidance to marketers looking to improve consumer reactions to healthier food products by offering insight into the types of claims that consumers react more positively towards. Finally, we highlight the importance of taking these differences in claim types into account in creating new regulation on nutrition claims. Policy makers need to be aware that consumers differentiate between addition and removal claims, and to look further into avoiding the claims being used in a misleading way by food manufacturers.

Meta-analysis of main effect

To gather initial evidence to our general proposal that consumers differentiate between the two types of nutrition claims, namely addition and removal focused ones, we conducted a meta-analysis of existing work focusing on front-of-package nutrition claims. To this end, we searched databases of EbscoHost, Web of Science and Pro-Quest for peer-reviewed articles written in English using the search terms ((packag* AND food*) AND ((health* OR nutrition*) AND (claim*))) in the fall of 2018. After going through the initial set and checking them for matching the inclusion criteria, such as comparing a claim present condition to a no claim control condition as well as focusing on food products and nutrition claims, the final article set included 30 academic papers from various fields of research, including for example Marketing and Nutrition Science.

Nearly all of the identified articles reported multiple effect sizes, resulting in a total set of 419 effect sizes. For each effect size, the relevant coded variables for the analyses presented here include type of claim (addition or removal claim), sample size and dependent variable. Our analysis here focuses on purchase intentions and healthiness perceptions given the limited number of observations for other types of dependent variables – for example for tastiness perceptions all research has focused on removal claims and a comparison between the claims types was therefore not possible. Thus, our final analyses include 58 effect sizes for healthiness perceptions and 41 for purchase intentions. The effect size was calculated as a correlation coefficient r and standardized using Fisher's Z_r transformation (Hedges & Olkin, 1985). We used a standard meta-analytical

approach by investigating the mean effect sizes with a random effects Hedges-Olkin meta-analysis (HOMA) and meta-regression weighing each effect with the inverse of its variance (N–3) (Lipsey & Wilson, 2001).

For purchase intentions, the results show that the addition of a nutrition claim focusing on the addition of positive nutrients increases consumers' intention to purchase the product (M_r = .095, SE = .027, p < .001). For claims focusing on the removal of negative nutrients, the effect is in fact negative with consumers reporting lower intentions to purchase the product than without the claim being present (M_r = -.071, SE = .034, p = .040). A random-effects meta-regression shows that this difference in significant (β = .083, SE = .022, p < .001).

Looking at the weighted average effect size for healthiness perceptions shows that both types of nutrition claims have a positive effect on consumers' perceptions about the product's healthiness ($M_{r\_removal\_claim}$ = .100, SE = .024, p < .001; $M_{r\_addition\_claim}$ = .137, SE = .049, p = .005). The random effects meta-regression analysis shows that this difference in effect sizes is not significant (β = .018, SE = .027, p = .501).

All in all, the meta-analysis shows that while consumers on average perceive products carrying nutrition claims more healthy than versions without a claim, they do prefer purchasing products with an addition claim. This difference does not seem to be explained by an addition claim being more trustworthy as this should be reflected in the healthiness evaluations. Another possible explanation, which we could not exclude based on the meta-analysis due to the limited number of previous studies, to the effect could be that removing nutrients from food products signals a lower level of tastiness to consumers. We followed the meta-analysis with two experiments to understand what is driving the different reactions to these two types of nutrition claims. Specifically, we look for evidence for our proposal that suggests the addition of positive nutrients adds additional value to the product, while showing that the tastiness explanation does not account for the effect.

Experiment 1

Experiment 1 focused on the main effect of nutrition claim type on product attitude, and tested the proposed mechanism by moderation. 236 undergraduate students (M_{age} = 19.69, 28.4 % female) took part in a 2 (addition vs. removal claim)* 2 (naturalness highlighted vs. not) experiment in a research lab, and were exposed to a cornflakes package with one of four claims (non-natural removal: "low fat", non-natural addition: "high fiber", natural removal: "no artificial sweeteners", natural addition: "only natural sugar").

We follow the approach by André, Chandon and Haws (2019) in assuming that unless naturalness is specifically mentioned, consumers expect a "high" or "low" claim to imply modifications to the product. If the effect is driven by the added value from the addition of the positive nutrient, it's natural presence should not show a similar positive effect as the natural form of the product has not changed. The respondents reported their attitude towards the product on a 7-point 3-item scale (bad–good, unfavorable–favorable, negative–positive). We also measured perceived tastiness to exclude the alternative explanation that removing ingredients would hurt the taste. Some additional control measures are not reported here for space reasons.

A two-way ANCOVA with gender as a covariate (controlling for uneven distribution of genders in the sample) shows no main effect of either naturalness (p = .145) or claim type (p = .116). However, there is a marginally significant interaction of the factors (F(1, 231) = 3.527, p = .062). Specifically, the simple effects show that in

the non-natural condition, respondents report more positive attitudes towards the addition claim (M_{high_fiber} = 3.94) than the removal claim (M_{low_fat} = 3.45, F(1, 231) = 5.95, p = .015). In the natural condition the two claims ($M_{no\_artificial\_sweeteners}$ = 3.50; $M_{only\_natural\_sugar}$ = 3.46; p = .763) do not differ. A similar pattern emerges for purchase intention. For tastiness, no such interaction emerges (p = .555).

These results show that consumers indeed show more positive attitudes towards products with addition claims, but only when the positive nutrient is indeed added and not simply naturally present in the product. This supports our premise that the positive reaction may be driven by the added value consumers derive from the addition of the positive nutrient. Importantly, there is no interaction of the two independent variables on tastiness perceptions – the product with the removal claim is not expected to taste worse than the one with added nutrients. Therefore, our effect cannot be explained by the idea that removing ingredients would lower tastiness perceptions.

Experiment 2

The goal of experiment 2 was to investigate the proposed underlying process through mediation by measuring perceived value for money. We also addressed a key shortcoming of experiment 1, where one possible explanation for the effect could have been the differences between the nutrients (fat and fiber) highlighted in the claims. The positive reaction towards the high fiber claim could have signaled a generally more positive attitude of the respondents towards fiber. We designed a single-factor between-subjects experiment with three levels (addition claim, removal claim and a no claim -control; N = 172; M_{age} = 19.12; 49.4% female). Participants were undergraduate students taking part in a number of unrelated studies in one session in the research lab of the university. We used a claim with an unknown nutrient, alanine (approach similar to Wänke & Leutner (2009), and gave respondents fictional information about it being either a positive (in the "high" condition) or a negative nutrient (in the "low" condition). After reading this information, respondents saw a pack of cornflakes with one of the claims or no claim. They then reported their attitude towards the product, perceived tastiness, willingness to pay as well as perceived value for money (for a price of 2.50).

A one-way ANOVA shows a main effect of experimental group on product attitude (F(1, 169) = 17.50, p < .01). Importantly, post-hoc comparisons show that this effect is driven by a positive reaction towards the "now with added alanine" claim (M = 4.34) compared to the "now reduced in alanine" (M = 3.14, p < .001) as well as the no claim control condition (M = 3.29, p < .001). The reduction claim and the control do not differ (p = .764). Similar results appear for WTP and purchase intention. A mediation analysis (PROCESS Model 4; Hayes, 2013) shows that a higher perceived value for the addition claim mediates the effect (b = .243, 95% CI [.082; .470]). Importantly, even though the addition claim is perceived as tastier than the other products (p's < .01), the reduction claim is not less tasty than the control condition (p = .993). Thus, the reduction claim does not hurt tastiness perceptions compared to the regular product.

General discussion, limitations and implications

These results support our premise that consumers perceive the 'positive nutrients added' claim to signal a higher value for money due to additional ingredients being present in the product. If the positive claim highlights that the positive nutrient is present naturally, such a perception of receiving "something extra" will not take place. These results help explain the mixed findings of previous research on nutrition claims, and offer more insights into nudging consumers towards healthier consumption. For example, promoting healthier

products in terms of added benefits may be more impactful in driving consumers towards healthier choices.

Similarly to the work of André, Chandon and Haws (2019), our results highlight that it is important for policy makers to understand that these two nutrition claim types are not perceived as the same by consumers, and regulation should take these differences into account. Given consumers' more positive reactions towards addition claims, they may be more easily misled by such claims compared to removal claims. This, however, remains to be confirmed in future research. Given that many food products may qualify for multiple claims, and often do carry more than just one claim and even a mix of the various types (Holtrop et al., 2019), further work should also aim to understand how the two claim types interact when presented simultaneously.

Finally, previous work suggests that consumers react to nutrition claims differently depending on the healthiness of the carrier product (Steinhauser et al., 2019). Future research should look to understand whether this preference for addition claims is general or dependent on the product category. As more research on nutrition claims, and especially addition claims, is conducted, expanding on this current meta-analysis would provide a useful tool for such a category comparison allowing for a broad range of categories and settings.

REFERENCES

Amatulli, C., De Angelis, M., Peluso, A. M., Soscia, I., & Guido, G. (2019). The Effect of Negative Message Framing on Green Consumption: An Investigation of the Role of Shame. *Journal of Business Ethics*, *157*(4), 1111–1132. https://doi.org/10.1007/s10551-017-3644-x

André, Q., Chandon, P., & Haws, K. (2019). Healthy Through Presence or Absence, Nature or Science?: A Framework for Understanding Front-of-Package Food Claims. *Journal of Public Policy & Marketing*, *38*(2), 172–191. https://doi.org/10.1177/0743915618824332

Aschemann, J., & Hamm, U. (2008). *Determinants of Choice Regarding Food with Nutrition and Health Claims*. 1–6.

Block, L. G., & Keller, P. A. (1995). When to Accentuate the Negative: The Effects of Perceived Efficacy and Message Framing on Intentions to Perform a Health-Related Behavior. *Journal of Marketing Research*, *32*(2), 192. https://doi.org/10.2307/3152047

Cohen, D. A., & Babey, S. H. (2012). Contextual Influences on Eating Behaviors: Heuristic Processing and Dietary Choices. *Obesity Reviews*, *13*(9), 766–779. https://doi.org/10.1111/j.1467-789X.2012.01001.x.Contextual

Hayes, A. F. (2013). *Introduction to Mediation, Moderation, and Conditional Process Analysis: A Regression-Based Approach*. The Guilford Press.

Hedges, L. V., & Olkin, I. (1985). *Statistical Methods for Meta-Analysis*. Academic Press, Inc.

Holtrop, N., Cleeren, K., Geyskens, K., & Verhoef, P. C. (2019). The Impact of Nutrition Claims on SKU Choice : An Investigation of the Effect of SKU and Category Characteristics. *Working Paper*.

Levin, I. P., Schneider, S. L., & Gaeth, G. J. (1998). All Frames Are Not Created Equal: A Typology and Critical Analysis of Framing Effects. *Organizational Behavior and Human Decision Processes*, *76*(2), 149–188. https://doi.org/10.1006/obhd.1998.2804

Lipsey, M. W., & Wilson, D. B. (2001). *Practical Meta-analysis*. SAGE Publications Inc.

Newman, C. L., Howlett, E., Burton, S., Kozup, J. C., & Tangari, A. H. (2012). The influence of consumer concern about global climate change on framing effects for environmental sustainability messages. *International Journal of Advertising*, *31*(3), 511–527. https://doi.org/10.2501/IJA-31-3-511-527

Paek, H.-J., Yoon, H. J., & Hove, T. (2011). Not All Nutrition Claims Are Perceived Equal: Anchoring Effects and Moderating Mechanisms in Food Advertising. *Health Communication*, *26*(2), 159–170.

Rozin, P. (2006). Naturalness Judgments by Lay Americans: Process Dominates Content in Judgments of Food or Water Acceptability and Naturalness. *Judgment and Decision Making Journal*, *1*(2), 91–97.

Rozin, P., Fischler, C., Morin, C. E., & Shields-Argelès, P. C. (2009). Additivity dominance: Additives are more potent and more often lexicalized across languages than are "subtractives" *Judgment and Decision Making*, *4*(5), 475–478. https://doi.org/10.2979/JFR.2009.46.1.67

Seymour, J. D., Lazarus Yaroch, A., Serdula, M., Blanck, H. M., & Khan, L. K. (2004). Impact of nutrition environmental interventions on point-of-purchase behavior in adults: A review. *Preventive Medicine*, *39*(SUPPL. 2), 108–136. https://doi.org/10.1016/j.ypmed.2004.04.002

Steinhauser, J., Janssen, M., & Hamm, U. (2019). Consumers' purchase decisions for products with nutrition and health claims: What role do product category and gaze duration on claims play? *Appetite*, *141*(1), 1–12.

Wänke, M., & Reutner, L. (2009). *Pragmatic Persuasion or the persuasion Paradox*.

Wansink, B., & Chandon, P. (2006). Can "Low-Fat" Nutrition Labels Lead to Obesity? *Journal of Marketing Research*, *43*(4), 605–617. https://doi.org/10.1509/jmkr.43.4.605

The Perfection Premium

Mathew S. Isaac, Seattle University, USA
Katie Spangenberg, University of Washington, USA

EXTENDED ABSTRACT

Media reports suggest that people disproportionately value perfection. For example, Walnut Hills High School was featured in national newspapers after seventeen students earned a perfect score of 36 on the American College Test (ACT).[1] However, individuals also seem to value near-perfection. For example, Tesla's Model S received accolades after earning a near-flawless road test score of 99 (out of 100) from *Consumer Reports*.[2] We find that even when the objective numerical gap between two values is identical, people perceive the difference between items to be greater if one item has attained a perfect attribute value or rating. Our work suggests, for example, that the perceived difference between products of 100%- and 99%-effectiveness is greater than the perceived gap between products of 99%- and 98%-effectiveness. In addition to documenting this *perfection premium*, we show that it occurs at least in part because of a categorization bias.

Relevant to our proposed perfection premium is prior research documenting discontinuities in judgments at endpoints of a scale. This work has shown that a change in probability near 0% or 100% is weighted more heavily than an identically-sized change in the middle of a distribution (Li & Chapman, 2009; Tversky & Kahneman, 1992; Wu & Gonzalez, 1996). However, given that most research examining whether people perceive meaningful differences near maximum scale values has focused on risk perceptions, it is unclear whether differences will emerge when comparing the performance of individuals or items that do not vary in terms of riskiness.

In addition to documenting a perfection premium in performance perceptions, we aim to implicate a new psychological mechanism: categorization. Individuals are prone to categorize numbers (e.g., odd/even; Laski & Siegler, 2007). For example, people spontaneously create mental categories at "round number" (e.g., zero- or five-ending) boundaries, thus expanding the perceived distance between adjacent numbers in different categories (Isaac and Schindler, 2014). We posit that when individuals encounter high attribute values, a natural basis for categorization is whether an item is perfect. If an item with a perfect attribute is categorized separately, the evaluative distance between it and a near-perfect item will be exaggerated.

In Experiment 1 (N=450), participants were assigned to one of three conditions. Those in the perfect condition read that Baking Bar A (B) contained 99% (100%) pure ingredients. In the two near-perfect conditions, Baking Bar A (B) contained 98% (99%) and 97% (98%) pure ingredients. Consistent with the perfection premium, Bar B was chosen by 67.5% of participants in the perfect condition, as compared to 51.0% of participants in the higher near-perfect condition ($\chi^2(1) = 8.44$; $p = .004$) and 59.2% of participants in the lower near-perfect condition ($\chi^2(1) = 2.27$; $p = .13$). Responses to a relative preference measure also revealed a similar pattern.

Next, we tested the perfection premium in a different context (i.e., social cognition) and used points on a test rather than percentages. In Experiment 2 (N=252), participants learned that 20 high school students had taken the ACT, which was partially correlated with IQ scores. Participants then rated the intelligence of two students on ten separate occasions. Each time, we randomly varied the numerical in-formation that participants encountered such that the higher-scoring student in each pair was between 32 and 36 (i.e., a perfect score) and the lower-scoring student's score was one or two points less. A 2 (perfection: perfect, near-perfect) x 2 (score difference: 1 point, 2 points) repeated-measures ANOVA on relative intelligence ratings revealed a significant main effect of perfection, ($F(1, 251 = 22.32$, $p < .001$). When paired students' ACT scores were one point apart, relative intelligence ratings were more disparate when the higher-scoring student achieved a perfect score ($M_{36/35} = 74.27$) as compared to a near-perfect score ($M_{other} = 70.64$; $F(1, 251) = 23.81$, $p < .001$). We observed the same pattern when the scores were two points apart, and the interaction between perfection and score difference was non-significant.

Based on our theorizing, if we place near-perfect and perfect numerical values in the same evaluative category, the perfection premium should be attenuated. In Experiment 3 (N=322), participants were told the wool content of two pairs of socks: 100% versus 98% (perfect superior option) or 96% versus 94% (near-perfect superior option). Participants in the categorization cue absent [present] condition were not given any further information [told that both pairs of socks had received perfect 5-star ratings on Amazon from the same number of reviewers]. A 2 x 2 ANOVA on relative sock preference revealed a significant interaction between perfection condition and categorization cue condition ($F(1, 318) = 4.56$, $p = .033$). When the categorization cue was absent, we replicated the perfection premium ($F(1, 318) = 11.54$, $p = .001$). However, when the categorization cue was present, the relative preference of participants in the perfect and near-perfect conditions did not differ.

Finally, Experiment 4 provided direct evidence for our mechanism by using categorization as a dependent variable. Participants (N=338) learned that three students (Q, R, and S) had taken a test in which a perfect score was either 100 points [round perfect value] or 88 points [non-round perfect value]. Those in the perfect (near-perfect) condition learned that the three students had earned 98, 99, and 100 (97, 98, and 99) points out of 100, or 86, 87, and 88 (85, 86, and 87) points out of 88. Subsequently, participants assigned the students to Group A or Group B based on their performance, with at least one student in each group. In line with our prediction, a binary logistic regression showed a significant main effect of the superior option condition ($B = 1.32$, $SE = .32$, Wald = 16.58, $p < .001$) on participants' likelihood of placing the highest-scoring student into its own category.

This research shows that individuals disproportionately value items or individuals that are perfect on certain attributes as compared to those that are near-perfect on those same attributes. Further, we find this perfection premium occurs because individuals spontaneously categorize perfect items separately from other items.

REFERENCES

Isaac, M. S., & Schindler, R. M. (2014). The top-ten effect: Consumers' subjective categorization of ranked lists. *Journal of Consumer Research, 40*(6), 1181-1202.

Laski, E. V., & Siegler, R. S. (2007). Is 27 a big number? Correlational and causal connections among numerical categorization, number line estimation, and numerical magnitude comparison. *Child Development, 78*, 1723-1743.

---

[1] https://www.washingtonpost.com/education/2019/04/25/students-one-high-school-get-perfect-scores-act/

[2] https://money.cnn.com/2013/05/09/autos/tesla-model-s-consumer-reports/index.html

Li, M., & Chapman, G. B. (2009). "100% of anything looks good": The appeal of one hundred percent. *Psychonomic Bulletin & Review, 16*, 156-162.

Tversky, A., & Kahneman, D. (1992). Advances in prospect theory: Cumulative representation of uncertainty. *Journal of Risk and Uncertainty, 5*, 297-323.

Wu, G., & Gonzalez, R. (1996). Curvature of the probability weighting function. *Management Science, 42*(12), 1676-1690.

The Half-Robin Hood Effect: How Corporate Political
Activism Leads Consumers to Cheat Corporations

Pradeep Jacob, Arizona State University, USA
Naomi Mandel, Arizona State University, USA

EXTENDED ABSTRACT

In recent years, corporations have increasingly taken widely publicized stances on divisive political issues, often offending and alienating consumers who do not share similar views. Prominent recent examples include Delta Airlines' elimination of discounts for NRA members, Hobby Lobby's opposition to insurance coverage for birth control, Nike's use of Colin Kaepernick as a brand ambassador, and Chick-fil-A's stance against gay marriage. In this research, we examine how and why a consumer's political ideology influences reactions to corporations' public opinions on divisive political issues.

Corporations frequently engage in political activism, either advocating for liberal or conservative issues. While consumers' political ideology plays a pivotal role in shaping their attitudes, very little is known about their marketplace behavior in response to corporate political activism. The current research examines the impact of consumers' political ideology on their likelihood to dishonestly retaliate against corporations that take a liberal or conservative stance on a divisive political issue. More precisely, we examine whether liberals or conservatives are more willing to dishonestly retaliate (i.e., the willingness to unethically retaliate against a corporation due to an active desire to harm the corporation) against corporations that take a conservative (vs. liberal) stance. We predict and find that liberals are more likely than conservatives to dishonestly retaliate against corporations that take conservative stances, because they are more likely to perceive that the corporation's actions have caused harm to vulnerable others. In contrast, liberals and conservatives are equally unlikely to dishonestly retaliate when the corporation takes a liberal activist stance because both liberals and conservatives perceive that a corporation's liberal stance is less harmful to vulnerable individuals and groups than a corporation's conservative stance. Like Robin Hood, liberals desire to punish the rich (i.e., corporations that take a conservative stance) to indirectly benefit the weak (i.e., marginalized others perceived to be harmed by corporate activism). However, we use the term "Half-Robin Hood" because the participants in our studies take from the "rich" (corporations) but keep the money for themselves, rather than giving it to the poor.

Prior research at the intersection of political orientation and consumer behavior has typically examined the impact of ideology on purchase behavior (e.g., Fernandes and Mandel 2013; Ordabayeva and Fernandes 2018), or customer complaints (Jung et al. 2017). Our research differs from prior research that examines how ideology influences one's likelihood of seeking reparations from firms with whom one has had a service interaction (e.g., Jung et al. 2017), as we examine the impact of political ideology on individuals seeking retribution against activist firms, even when the corporation's actions do not impact them directly. The construct of dishonest retaliation is conceptually distinct from previously examined constructs such as relationship exit (e.g., boycott) and demands for reparation (e.g., complaining behavior) because consumers do not engage in such acts to retaliate against firms (Grégoire and Fisher 2008). We contribute to the literature on political psychology and consumer retaliation by expanding the range of phenomena explored to politically motivated retaliation via fraud against corporate political activism.

Theoretical Background

Conservatives are typically more threat-sensitive than liberals (Hibbing, Smith, and Alford 2014), and are thus more motivated to accept inequality and preserve the status quo to help manage threat and uncertainty (Jost, Glaser, et al. 2003). Thus, conservatives (vs. liberals) value traditional social institutions that bind people and maintain the social order (Graham, Nosek, et al. 2011). Conservative corporations therefore take activist stances that protect traditional social structures that bind people and maintain the social order, whereas liberal corporations take activist stances that protect vulnerable individuals from harm and promote social justice. Corporations' conservative stances, thus, tend to favor dominant groups while preventing vulnerable groups from achieving social equality (Sidanius and Pratto 1999, Wilson 1973, Billig 1982). In contrast, corporations' liberal stances tend to challenge the legitimacy of traditional institutions that endorse a dominance-based social hierarchy (Diekman and Goodfriend 2007). Given that conservative corporate activism advocates preserving relatively abstract traditional social values, the victims of such activism are often relatively identifiable marginalized individuals and groups that do not conform to traditional societal norms. In contrast, given that liberal activism challenges the dominance-based hierarchy (Hydock, Paharia, and Weber 2019), the victims of such activism are often relatively abstract traditional institutions and social conventions.

Individuals across the political spectrum perceive moral violations such as the repudiation of traditional institutions and social conventions to be less harmful compared to the harm inflicted on vulnerable victims, because such violations typically harm institutions that possess high levels of power and agency, and are thus less capable of experiencing suffering (Gray, Jenkins, et al. 2011, Rai and Diermeier 2015). Consumers develop stronger emotional reactions towards identifiable victims than abstract victims (Small and Loewenstein 2003) and thus, perceive the severity of the harm experienced by identifiable victims to be greater than the harm experienced by abstract victims (Nordgren and McDonnell 2011), like a social convention or traditional institution. Thus, consumers across the political spectrum perceive conservative corporate activism as more harmful to vulnerable individuals and groups than liberal corporate activism, because the victims of conservative corporate activism are more identifiable than those of liberal corporate activism.

However, liberals (vs. conservatives) place the prevention of harm to vulnerable individuals and groups to be more morally relevant to their judgment (Graham, Haidt, and Nosek 2009) and feel greater empathy towards vulnerable populations (Skitka and Tetlock 1993). Thus, while liberals and conservatives perceive a conservative (vs. liberal) activist firm to be more harmful, liberals do so to a significantly greater extent.

Consumers seek to retaliate against harmful corporations because they assign a higher standard of responsibility to corporations (vs. individual perpetrators), as they possess greater resources and greater ability to anticipate the consequences of their actions (Hans and Ermann 1989). Furthermore, corporations have a social contract or obligation with society to not harm others for selfish reasons (Sousa and Piazza 2014), and thus, consumers are more likely to punish harmful corporations for violating their social contract with society (Rotman, Khamitov and Connors 2017). Moreover, consumers will

also be able to justify punishing corporations, even through unethical means, because they find it easier to rationalize their dishonest actions when such behavior benefits other individuals, apart from themselves (Wiltermuth 2011). Thus, given that liberals perceive that a corporation's conservative stance is more harmful than conservatives do, and given that consumers are more likely to seek retaliation against harmful corporations, we propose that liberals, but not conservatives, will be motivated to dishonestly retaliate against such corporations.

Experiments

Across three studies, we examined whether liberals would be more likely than conservatives to dishonestly retaliate against a corporation that takes a conservative (vs. liberal) stance. First, to determine the extent to which political positions were considered conservative or liberal, we conducted a pre-test with undergraduates (N = 557, female = 55.5%). Participants assessed whether the support or opposition to various social issues, such as universal healthcare, gun rights, abortion rights, transgender bathroom access rights, etc., was conservative or liberal. Based on the responses we received, we created vignettes depicting institutions taking either a very conservative or a very liberal position on healthcare access (study 1), and transgender bathroom access (studies 2 and 3). Also, across the following studies, we controlled for socioeconomic status and perceptions of large firms, to ensure that the need for money, and negative perceptions of large corporations respectively, did not influence likelihood of dishonest retaliation against corporations that took a conservative (vs. liberal) stance.

Study 1 examines the likelihood of an individual returning $100 that was accidentally credited into his or her credit card by a restaurant. We randomly assigned undergraduate business students (N=694, 56.7% female) to one of two conditions (liberal restaurant vs. conservative restaurant). Participants viewed a short description of a restaurant chain, which either took a liberal position on healthcare (i.e., advocating Medicare For All), or a conservative position on healthcare (i.e., opposing any expansions to Medicare and Medicaid). Finally, we measured each participant's conservatism on a 7-point scale ranging from 1=extremely liberal to 7=extremely conservative ($M = 3.88, SD = 1.376$). This resulted in a 2 (restaurant's ideology: liberal vs. conservative; manipulated) X participant's conservatism (continuous; measured) experimental design.

A regression analysis with individuals' conservatism and restaurant's ideology on cheating revealed a marginally significant main effect of political ideology on dishonest retaliation ($b = -.159, t (684) = -1.875, p = 0.06$) indicating that liberals were marginally more likely to dishonestly retaliate than conservatives. The main effect of the firm's ideology was significant ($b = -0.956, t(684) = -1.953, p = .05$), indicating that participants who viewed the conservative firm were marginally more likely to dishonestly retaliate than those who viewed the liberal firm. The interaction of political ideology and firm ideology condition was directionally significant ($b = .195, t(684) = -1.634, p = .10$). Simple slopes analysis (Aiken and West 1991) revealed that the slope of political ideology was marginally significant for the conservative firm ($b = -.159, t(684) = -1.875, p = .06$) and nonsignificant in the liberal firm ($b = .036, t(684) = 0.425, p > .67$) indicating that liberals were marginally more likely to dishonestly retaliate than conservatives among those who viewed the conservative firm, while liberals and conservatives were equally unlikely to dishonestly retaliate in the liberal firm condition.

In study 2, we examined the likelihood of an individual returning $25 that was accidentally credited into his or her credit card account by a restaurant. We randomly assigned undergraduate business

students (N=306, 49.6% female) to one of two conditions (liberal restaurant vs. conservative restaurant). Participants also provided their political ideology on a nine-point Likert scale (Jost 2006; 1 = Very liberal, 9 = Very conservative; $M = 4.88, SD = 1.671$) in a presurvey several weeks before the main study. Participants viewed a short description of a restaurant chain, which either took a liberal or a conservative stance on transgender bathroom access rights. We measured participants' perceptions of whether the restaurant chain's actions caused harm to other vulnerable groups on a 7-point scale (1 = Not at all, 7 = A great deal), because we hypothesized that both liberals and conservatives will perceive a conservative activist firm to be more harmful than a liberal activist firm, while liberals will perceive that conservative activist firms cause greater harm to vulnerable individuals and groups than conservatives do. A regression analysis revealed a main effect of firm ideology, indicating that participants across the political spectrum perceived the conservative firm to be more harmful than the liberal firm ($b = -6.314, t(303) = -9.708, p < .001$). Spotlight analyses also revealed that conservatives also perceived the conservative firm as more harmful than the liberal firm ($b = -1.173, t(303) = -4.194, p < .001$). Moreover, a simple slopes analysis revealed that liberals found the conservative firm to be more harmful to vulnerable others than conservatives did ($b = -.376, t(303) = -4.010, p < .001$).

A regression analysis with individuals' conservatism and restaurant's ideology on dishonest retaliation revealed a significant main effect of the restaurant's ideology ($b = -2.211, t(303) = -2.933, p < .01$), indicating that participants were more likely to dishonestly retaliate when the restaurant took a conservative (vs. liberal) stance. We also found a marginally significant interaction between conservatism and the firm's ideology ($b = .275, t(303) = 1.888, p = .060$). The simple slopes of individuals' political ideology for each firm ideology condition (Aiken and West 1991) revealed that slope of political ideology was significant in the conservative firm condition ($b = -.233, t(303) = -2.135, p < .05$) and nonsignificant in the liberal firm condition ($p = .66$), thus indicating that liberals were more likely to dishonestly retaliate against the conservative firm than conservatives, while liberals and conservatives were equally unlikely to dishonestly retaliate against the liberal firm. We also tested the proposed moderated mediation path where perceptions of harm to vulnerable others and desire for retaliation serve as serial mediators: firm's ideology -> perceived harm to vulnerable others -> desire for retaliation -> dishonest retaliation. The index of moderated mediation was significant ($95\% \ CI \ [-.1071, -.0035]$), indicating that individuals' political ideology moderated mediation through perceived harm to vulnerable others and desire for retaliation. Importantly, pairwise contrasts indicate that the process is stronger for liberals than for conservatives ($95\% \ CI \ [.013, .350]$).

Finally, in study 3, we replicated the results of study 2 by examining the likelihood of an individual returning $25 that was accidentally credited into his or her credit card account by a restaurant. In contrast with study 3, undergraduate business students (N=657, 59.2% female) were instead assigned to one of three (vs. two) scenarios, where a restaurant chain took a liberal conservative, or apolitical stance on transgender bathroom access. Participants provided their political ideology on a nine-point Likert scale (1 = Very liberal, 9 = Very conservative: $M = 4.72, SD = 1.973$).

The main effect of political ideology was significant ($b = -.261, t (647) = -3.747, p < .001$), indicating that liberals were more likely to dishonestly retaliate than conservatives. The main effect of the firm's ideology (liberal vs. conservative firm) was significant ($b = -1.813, t (647) = -3.621, p < 0.001$) indicating that participants who viewed the conservative firm were more likely to dishonestly retali-

ate than those who viewed the liberal firm. The main effect of the firm's ideology (apolitical vs. conservative firm) was also significant *(b = -1.064, t (647) = -2.011, p < 0.05)* indicating that participants who viewed the conservative firm were more likely to dishonestly retaliate than those who viewed the apolitical firm. More importantly, the interaction of political ideology with the liberal firm significantly predicted dishonest retaliation *(b = 0.268, t (647) = 2.753, p < 0.01)* while the interaction of political ideology with the apolitical firm was not significant *(p > 0.12)*. Simple slopes analyses revealed that the slope was significant in the conservative firm condition *(b = -.261, t (647) = -3.747, p < .001)*, but nonsignificant in the liberal and apolitical firm conditions *(all p's > .2)*. Again, moderated serial mediation analysis (Hayes 2018) supported our hypothesized process. The conditional indirect effect for the hypothesized process was significant in the conservative (vs. liberal) firm condition *(95% CI [.050, .127])* and in the conservative (vs. apolitical) firm condition *(95% CI [.031, .086])*.

In this research, we demonstrated that liberals are more likely than dishonestly retaliate against harmful corporations. Our findings may help managers and executives assess the implications of taking a broad politically motivated stances on their business. Customers may defraud a business in a variety of ways, including returning items not purchased or filing a false claim for an injury or accident. Corporations will be well advised to better understand the political ideology and sentiments of their target customers before taking an activist stance on political issues, as consumers are willing to go beyond boycotts and complaining behavior to actively retaliate against corporations that they perceive to be harmful to vulnerable others.

REFERENCES

Aiken, L. S., & West, S. G. (1991). Multiple regression: Testing and interpreting interactions. Sage Publications, Inc.

Billig, M. 1982. Ideology and social psychology: Extremism, moderation and contradiction. Oxford: Blackwell.

Diekman, Amanda B, and Wind Goodfriend. 2007. "The Good and Bad of Social Change: Ambivalence Towards Activist Groups." Social Justice Research 401-417.

Fernandes, D. and Mandel, N. (2014), Political conservatism and variety-seeking. Journal of Consumer Psychology, 24: 79-86. doi:10.1016/j.jcps.2013.05.003

Graham, Haidt, and Nosek, 2009, Journal of Personality and Social Psychology 96(5):1029-46 · June 2009 "Liberals and Conservatives Rely on Different Sets of Moral Foundations."

Graham, Jesse & Haidt, Jonathan & Koleva, Sena & Motyl, Matt & Iyer, Ravi & Wojcik, Sean & Ditto, Peter. (2012). Moral Foundations Theory: The Pragmatic Validity of Moral Pluralism. Advances in Experimental Social Psychology. 47.

Gray, K, A C Jenkins, A C Heberlein, and D M Wegner. 2011. "Distortions of mind perception in psychopathology." Proceedings of the National Academy of Sciences 477-479.

Grégoire, Yany & Fisher, Robert. (2008). Customer betrayal and retaliation: When your best customers become your worst enemies. Journal of the Academy of Marketing Science. 36. 247-261. 10.1007/s11747-007-0054-0.

Grégoire, Y., Laufer, D., & Tripp, T. M. (2010). A comprehensive model of customer direct and indirect revenge: Understanding the effects of perceived greed and customer power. Journal of the Academy of Marketing Science, 38(6), 738–758. https://doi.org/10.1007/s11747-009-0186-5

Hans, Valerie P, and M David Ermann. 1989. "Responses to corporate versus individual wrongdoing." Law and Human Behavior 151-166.

Hayes (2018), Introduction to Mediation, Moderation, and Conditional Process Analysis: a Regression-Based Approach, New York: The Guilford Press.

Hibbing, JR, KB Smith, and JR Alford. 2014. "Differences in Negativity Bias Underlie Variations in Political Ideology." Digital Commons at University of Nebraska-Lincoln.

Jost, John T., Jack Glaser, Arie W. Kruglanski, and Frank J. Sulloway (2003), "Political Conservatism as a Motivated Social Cognition," Psychological Bulletin, 129(3), 339–75.

Jost, J.T. (2017), The marketplace of ideology: "Elective affinities" in political psychology and their implications for consumer behavior. Journal of Consumer Psychology, 27: 502-520. doi:10.1016/j.jcps.2017.07.003

Jung, Kiju & Garbarino, Ellen & Briley, Donnel & Wynhausen, Jesse. (2017). Blue and Red Voices: Effects of Political Ideology on Consumers' Complaining and Disputing Behavior. Journal of Consumer Research. 44. ucx037. 10.1093/jcr/ucx037.

Nordgren, Loran F, and Mary-Hunter Morris McDonnell. 2011. "The Scope-Severity Paradox: Why Doing More Harm Is Judged to Be Less Harmful." Social Psychological and Personality Science 97-102.

Ordabayeva, Nailya & Fernandes, Daniel. (2018). Better or Different? How Political Ideology Shapes Preferences for Differentiation in the Social Hierarchy. Journal of Consumer Research. 45. 10.1093/jcr/ucy004.

Rai, T S, and D Diermeier. 2015. "Corporations are Cyborgs: Organizations that can think but cannot feel elicit anger as villains but fail to elicit sympathy as victims." Organizational Behavior and Human Decision Processes 18-26.

Rotman, Jeff D, Mansur Khamitov, and Scott Connors. 2017. "Lie, Cheat, and Steal: How Harmful Brands Motivate Consumers to Act Unethically." Journal of Consumer Psychology 353-361.

Sidanius, Jim, and Felicia Pratto. 1999. Social dominance : an intergroup theory of social hierarchy and oppression. Cambridge, UK, New York: Cambridge University Press.

Small, D.A., Loewenstein, G. Helping a Victim or Helping the Victim: Altruism and Identifiability. Journal of Risk and Uncertainty 26, 5–16 (2003).

Sousa, Paulo, and Jared Piazza. 2014. "Harmful transgressions qua moral transgressions:: A deflationary view." Thinking and Reasoning 99-128.

Wilson, Glenn D. 1973. The Psychology of Conservatism. London: Academic Press.

Wiltermuth, S.S: Cheating more when the spoils are split Organizational Behavior and Human Decision Processes, 115 (2011), pp. 157-168

Increasing Donations for Multiple Victims

Hyunkyu Jang, Governors State University, USA

EXTENDED ABSTRACT

People are less willing to help multiple unidentified victims than a single identified victim, which previous studies have referred to as the identifiable victim effect (Jenni & Loewenstein, 1997; Slovic, 2007; Small, Loewenstein, & Slovic, 2007). Singularity has been suggested to be a driver for the identifiable victim effect, which results in people donating more to a single identified victim than to multiple identified victims (Kogut & Ritov, 2005; Västfjäll, Slovic, Mayorga, & Peters, 2014).

Kogut and Ritov (2005) mentioned the lack of perspective-taking as a possible reason for why singularity matters, stating that people may be more likely to adopt a victim's perspective when a single victim is involved than when there are multiple victims. The current research suggests that after people have taken the perspective of a single victim, if they see other victims whose situations are similar to that of the single victim, they will be more likely to help the other victims. Some research on intergroup relations has shown that taking the perspective of an out-group member or a stigmatized group member leads to more positive evaluations and attitudes about the out-group or the stigmatized group as a whole (Batson, Polycarpou, et al., 1997; Dovidio et al., 2004; Finlay & Stephan, 2000; Galinsky & Moskowitz, 2000; Todd, Bodenhausen, & Galinsky, 2012; Vescio, Sechrist, & Paolucci, 2003). These findings imply that prior perspective-taking of a single victim may lead to more favorable attitudes towards other victims who are in a similar situation to that of the single victim, which, in turn, may lead people to help other victims more.

Hypothesis 1:   When multiple victims are potential beneficiaries of donations, prior perspective-taking of a single victim who is in a similar situation to that of the multiple victims will increase donations.

Some research has shown the positive effect of prior perspective-taking of an out-group member on attitudes toward the out-group as a whole and has demonstrated that the positive effect is mediated by self-other overlap with the out-group member (Todd et al., 2012; Todd & Burgmer, 2013). Similarly, the positive effect of prior perspective-taking of a single victim on donations for multiple victims, predicted in H1, may be mediated by self-other overlap with the single victim. As perspective-taking of another person increases self-other overlap with that person (Davis et al., 1996; Galinsky & Moskowitz, 2000; Goldstein & Cialdini, 2007; Laurent & Myers, 2011; Myers et al., 2014), perspective-taking of multiple victims may increase self-other overlap with those victims. If prior perspective-taking of a single victim leads to perspective-taking of multiple victims who are in a similar situation as the single victim, perspective-taking of a single victim should result in not only increased self-other overlap with the single victim, but also increased self-other overlap with the multiple other victims. Increased self-other overlap with multiple other victims should then lead to greater helping behavior toward the multiple victims. Taken together, the positive effect of prior perspective-taking of a single victim on donations for multiple victims may be sequentially mediated by self-other overlap with a single victim and self-other overlap with multiple other victims. Therefore, it is expected:

Hypothesis 2   Self-other overlap with a single victim whose perspective was taken and self-other overlap

with multiple victims serve as serial mediators of the effect of prior perspective-taking of a single victim on donations to multiple beneficiaries.

One pre-study and Studies 1 and 2 were conducted to examine Hypotheses 1 and 2. Pre-study ($N = 300$) used a 4 (prior perspective-taking: imagine-other, imagine-self, imagine-both, objective) between-subjects design. The goal of the pre-study was to examine whether donations increase with a potential donor's prior experience of adopting the perspective of a single victim who is in a similar situation to that of the multiple victims and whether there would be a difference between different perspective approaches.

Participants received an instruction about one of the four prior perspective-taking approaches. The pre-study also adopted perspective-taking approaches from past research (Batson, Early, & Salvarani, 1997; Davis, Conklin, Smith, & Luce, 1996). After reading the instructions about a perspective-taking approach, participants in all conditions read the story about a single victim and took the perspective of a single victim (i.e., prior perspective-taking). The pre-study adopted and revised the stimulus stories about multiple victims and a single victim from past research (Kogut & Ritov, 2005a, 2005b). Next, participants in all conditions then read the story about multiple victims who were described as being in a similar situation to that of the single victim. Participants then indicated their donations amounts to the multiple victims.

The results of the pre-study showed that participants in the three prior perspective-taking conditions donated more ($M = \$7.26$) than participants in the objective condition ($M = \$6.00$, $p < .05$). This indicate that prior perspective-taking increases donations to multiple victims. There was no significant difference between the three difference perspective-taking approaches (ps = n.s.).

In Study 1 ($N = 400$), the design was a 2 (singularity of victim: single-victim, multiple-victim) x 2 (perspective-taking: prior perspective-taking, no prior perspective-taking) between-subjects. The results showed there was no main effect of singularity ($p > .60$) or perspective-taking ($p > .20$). However, there was a significant interaction effect ($p < .05$): donations in the single-victim condition did not differ between the prior perspective-taking condition ($M = \$5.79$) and the no prior perspective-taking condition ($M = \$6.16$, $p > .40$), whereas in the multiple-victim condition, donations in the prior perspective-taking condition ($M = \$6.69$) were significantly greater than those in the no prior perspective-taking condition ($M = \$5.28$; $p < .05$).

Study 2 (N = 450) used a 2 (prior perspective-taking: prior perspective-taking, no prior perspective-taking) between-subjects design. Study 2 showed that donations in the prior perspective-taking condition ($M = \$5.70$) were significantly greater than those in the no prior perspective-taking condition ($M = \$4.82$, $p < .05$). In Study 2, a serial mediation analysis with 10,000 bootstrap samples (model 6 in PROCESS; Hayes, 2017) demonstrated that prior perspective-taking of a single victim increased donations to multiple victims through two serial mediators, self-other overlap with a single victim and self-other overlap with multiple victims (95% bootstrap CI: 0.0187, 0.5055).

The current research contributes to the literature on the identifiable victim effect by adding a new strategy to increase donations to multiple victims. Charities can collect as many donations for multiple victims as for a single victim by leading potential donors to

engage in perspective-taking of a single victim prior to requesting donations for multiple victims in order to enable them to take the perspectives of multiple victims who are in a similar situation to that of the single victim. This will lead to greater self-other overlap between donors and multiple victims and to greater donations for those multiple victims.

REFERENCES

Batson, C. D., Early, S., & Salvarani, G. (1997). Perspective taking: Imagining how another feels versus imaging how you would feel. *Personality and Social Psychology Bulletin*, *23*(7), 751–758.

Davis, M. H., Conklin, L., Smith, A., & Luce, C. (1996). Effect of perspective taking on the cognitive representation of persons: a merging of self and other. *Journal of Personality and Social Psychology*, *70*(4), 713.

Hayes, A. F. (2017). *Introduction to mediation, moderation, and conditional process analysis: A regression-based approach*. Guilford Publications.

Jenni, K., & Loewenstein, G. (1997). Explaining the identifiable victim effect. *Journal of Risk and Uncertainty*, *14*(3), 235–257.

Kogut, T., & Ritov, I. (2005). The "identified victim" effect: An identified group, or just a single individual? *Journal of Behavioral Decision Making*, *18*(3), 157–167.

Slovic, P. (2007). "If I look at the mass I will never act": Psychic numbing and genocide. *Judgment and Decision Making*, *2*(2), 79–95.

Small, D. A., Loewenstein, G., & Slovic, P. (2007). Sympathy and callousness: The impact of deliberative thought on donations to identifiable and statistical victims. *Organizational Behavior and Human Decision Processes*, *102*(2), 143–153.

Västfjäll, D., Slovic, P., Mayorga, M., & Peters, E. (2014). Compassion fade: Affect and charity are greatest for a single child in need. *PloS One*, *9*(6), e100115.

Experiential Disadvantage For the Lonely Consumer

Eunyoung Jang, Oklahoma State University, USA
Pramit Banerjee, Oklahoma State University, USA

EXTENDED ABSTRACT

Previous research has shown that experiential purchases elicit greater happiness than material purchases, and this is referred to as the 'experiential advantage' (Carter and Gilovich 2012, Howell and Hill 2009, Van Boven and Gilovich 2003). However, does this hold true for every consumer? In this research, we propose that this experiential advantage may not hold true for lonely people, and they may in fact derive lower happiness from their experiential purchases compared to material purchases. This is because experiences reside in people's memories, but lonely people's impaired memory tends to inhibit the recall of the positive feelings they experienced at the time of the consumption, eventually weakening the evoked happiness from their experiential purchases.

Loneliness has many negative effects on cognition. For example, Cacioppo and Hawkley (2009) suggest that loneliness impairs cognitive function. Loneliness increases the levels of stress hormones like cortisol (Fratiglioni, Paillard-Borg and Winblad 2004) or other inflammatory markers (Jaremka et al. 2013) which impair cognitive function. Due to the memory disadvantage, lonely people would need more memory aids to maintain the positive feelings of their experiences. However, while the tangible and permanent nature of material goods offers a better connection between the feelings experienced in the past and the present, the intangible and ephemeral nature of experiential goods makes the evoked feelings from the experiences inconsistent and likelier to decay across time (Goodman, Malkoc and Stephenson 2016; Shu and Gneezy 2010). This makes experiential purchases more difficult to recall than material purchases. Thus, we predict a negative association between loneliness and the happiness evoked from past experiential purchases. However, we expect that the effects of material purchases on happiness would be constant regardless of the levels of loneliness. Lonely people's lower happiness from their experiential purchases would be mediated by the memory associated with consumption. In order to test these hypotheses, we ran two studies.

Study 1. The purpose of this experiment was to find out whether lonely people derive greater happiness from material purchases rather than experiential purchases. Participants (N=116, M_{age} =37, female 48%) were recruited from Amazon TurkPrime.com (Litman, Robinson and Abbercock 2017) and randomly assigned to one of two conditions (experiential vs. material) of a between-subject design. Participants were instructed to think of the last time they spent their money on a purely experiential or material purchase, then they completed three items of happiness (Guevarra and Howell 2015) on a nine-point scale. We then measured their loneliness using the SELSA-S scale (Ditommaso, Brannen, and Best 2004) which has three dimensions (Social Loneliness, Family Loneliness and Romantic Loneliness), each measured on a seven-point scale with five items each.

Results revealed a significant interaction between loneliness and purchase type on happiness (β = .75, SE = 0.30, t (112) = 2.54, p = .012). Specifically, in the experiential purchase condition, there was a significantly negative association between loneliness and the levels of happiness (β = -.74, SE = .22; t(112) = -3.41, p < .001). On the other hand, in the material purchase condition, there was no association between loneliness and the levels of happiness (β = -.03, SE = .20; t(112) = -0.12, p = .90). To probe this interaction, we used the Johnson-Neyman floodlight analysis technique (Spiller et al. 2013) and found that levels of happiness from experiential (vs. material) purchases was higher at the value of loneliness below 2.09 (β = -.91, SE = .46; t(112) = -1.98, p = .05) supporting the existing finding of experiential advantage. However, the levels of happiness from experiential (vs. material) purchase was lower at the value of loneliness above 5.86 (β = 1.92, SE = .97; t(112) = 1.98, p = .05). Overall, study 1 shows that the level of happiness of experiential purchase decreased as loneliness increased.

Study 2. The purpose of study 2 is to explore the possible underlying mechanism behind this finding. Participants (N=201, M_{age} = 37.23, female = 54.5%) were randomly assigned to one of the conditions of a 2 (purchase types: experiential vs. material) x continuous (loneliness) between-subject design. The procedures were identical to study 1, except that participants were asked to rate on two-items of memory (Goodman, et al. 2016) and ten-items of UCLA loneliness (Pieters 2013). Participants also rated other variables related to purchase such as price, time of purchase and time of last use so as to control those factors.

We regressed the loneliness and purchase types on happiness by using Process model 1 (Hayes 2018) including several control variables. Replicating study 1, in the experiential purchase condition, there was a negative association between loneliness and the levels of happiness (β = -.87, *SE* = .22; t(190) = -4.01, *p* < .001), while in the material purchase condition, there was no association between loneliness and the level of happiness (β = -.24, *SE* = .21; t(190) = -1.14, *p* = .26). To test the mediating role of memory, we conducted a moderated mediation analysis by using Process model 8 (Hayes 2018). We used loneliness as a predictor variable, purchase type (0=experiential, 1=material) as a moderator, memory as a mediator, and happiness as a dependent variable. The results showed a significant indirect effect of memory (β = .12, SE = .07, 95%, CI [.01, .28]). For experiential purchase, the relationship between loneliness and happiness was negatively mediated by the memory (β = -.15, SE = .08, 95%, CI [-.33, -.02]). On the other hand, for material purchase, there was no significant mediating effect of memory (β = -.03, SE = .05, 95%, CI [-.14, .04]).

In conclusion, the present research suggests a boundary condition for the experiential advantage. Previous research found that experiential purchases lead to higher happiness than material purchases. However, when consumers feel lonelier, the positive effect of experiential purchases on happiness disappears, possibly due to memory impairment. This research has important contributions for consumers well-being. Also, as a managerial implication, we suggest that to increase lonely consumers' happiness, companies involved in experiential goods (e.g., vacation, music, etc.) should provide some memory aid such as souvenirs.

REFERENCES

Carter, Travis J., and Thomas Gilovich (2012), "I Am What I Do, Not What I Have: The Differential Centrality of Experiential and Material Purchases to the Self," *Journal of Personality and Social Psychology, 102*(6), 1304-1317.

Cacioppo, John T., and Louise C. Hawkley (2009), "Perceived Social Isolation and Cognition," *Trends in Cognitive Sciences, 13*(10), 447-454.

Ditommaso, Enrico, Cyndi Brannen, and Lisa A. Best (2004), "Measurement and Validity Characteristics of the Short Version of the Social and Emotional Loneliness Scale for Adults," *Educational and Psychological Measurement, 64*(1), 99-119.

Fratiglioni, Laura, Stephanie Paillard-Borg, and Bengt Winblad (2004), "An Active and Socially Integrated Lifestyle in Late Life Might Protect Against Dementia," *The Lancet Neurology, 3*(6), 343-353.

Goodman, Joseph K., Selin A. Malkoc, and Brittney L. Stephenson (2016), "Celebrate or Commemorate? A Material Purchase Advantage When Honoring Special Life Events." *Journal of the Association for Consumer Research, 1*(4), 497-508.

Guevarra, Darwin A., and Ryan T. Howell (2015), "To Have in Order to Do: Exploring the Effects of Consuming Experiential Products on Well-Being," *Journal of Consumer Psychology, 25*(1), 28-41.

Hayes, Andrew F (2018), "Introduction to Mediation, Moderation, and Conditional Process Analysis Second Edition: A Regression-Based Approach." New York, NY: Ebook The Guilford Press.

Howell, Ryan T., and Graham Hill (2009), "The Mediators of Experiential Purchases: Determining the Impact of Psychological Needs Satisfaction and Social Comparison," *The Journal of Positive Psychology, 4*(6), 511-522.

Jaremka, Lisa M., Christopher P. Fagundes, Juan Peng, Jeanette M. Bennett, Ronald Glaser, William B. Malarkey, and Janice K. Kiecolt-Glaser (2013), "Loneliness Promotes Inflammation During Acute Stress," *Psychological Science* 24(7), 1089-1097.

Litman, Leib, Jonathan Robinson, and Tzvi Abberbock (2017), "TurkPrime.com: A Versatile Crowdsourcing Data Acquisition Platform for the Behavioral Sciences," *Behavior Research Methods,* 49(2), 433-442.

Pieters, Rik (2013), "Bidirectional Dynamics of Materialism and Loneliness: Not Just a Vicious Cycle," *Journal of Consumer Research 40*(4), 615-631.

Shu, Suzanne B., and Ayelet Gneezy (2010), "Procrastination of Enjoyable Experiences," *Journal of Marketing Research, 47*(5), 933-944.

Spiller, Stephen A., Gavan J. Fitzsimons, John G. Lynch Jr, and Gary H. McClelland (2013), "Spotlights, Floodlights, and the Magic Number Zero: Simple Effects Tests in Moderated Regression," *Journal of Marketing Research,* 50(2), 277-288.

Van Boven, Leaf, and Thomas Gilovich (2003), "To Do or To Have? That is the Question." *Journal of Personality and Social Psychology, 85*(6), 1193.

Are Lonely Consumers Loyal Consumers?

Eunyoung Jang, Oklahoma State University, USA
Zachary Arens, Oklahoma State University, USA

EXTENDED ABSTRACT

Loneliness has widespread effects on consumer behavior. Lonely consumers are more materialistic (Pieters 2013), are more likely to go shopping (Kim, Kang and Kim 2005), and prefer humanlike products (Orth et al. 2017). But the implications of loneliness on brand loyalty are contradictory. Prior studies suggest inconsistent findings. Some suggest that loneliness strengthens brand loyalty (MacInnis and Folkes 2017) while others suggest that it weakens it (Long et al. 2015).

The present research proposes that loneliness can strengthen and weaken brand loyalty, depending on the loneliness dimension. Although most consumer research treats loneliness as a unidimensional construct, evidence suggests two dimensions – emotional and social. Emotional loneliness is due to inadequate relationship quality (i.e., a desire for greater relationship intimacy) whereas social loneliness is due to inadequate relationship quantity (i.e., a desire for more relationships). Since these dimensions of loneliness are not completely compensatory (Weiss 1983), emotional loneliness are resolved by developing intimate relationships with one individual, while social loneliness are resolved by developing new relationships with many individuals.

Just like human relationships, consumers' brand relationships are multidimensional, varying in quality and quantity (Fournier 1998; 2014). Brand loyalty reflects the quality of a consumer's relationship with brands, whereas brand assortment reflects the quantity of brands with which the consumer has a relationship. Thus, a multidimensional conceptualization of loneliness suggests distinct effects on consumer preferences for brand loyalty and brand assortment. Specifically, consumers experiencing emotional loneliness will prefer loyal brand relationships. However, consumers experiencing social loneliness will prefer a large assortment of brands rather than any single brand. Three experiments were conducted.

Experiment 1 used a 2 (loneliness level:high vs. low) x 2 (loneliness dimension:emotional vs. social) between-subject design. Loneliness was manipulated by asking participants to write about a time when they felt lonely (or not) due to lacking (vs. having) close relationships (emotional loneliness) or social networks (social loneliness). Next, they chose a bottled-water brand to drink each day over the next five days, and rated their brand loyalty towards them on a nine-point scale ($\alpha = .91$). Regarding brand loyalty, there was a significant interaction ($F(1, 426) = 5.35, p < .05$). Specifically, participants in the high (vs. low) emotional loneliness condition showed a stronger brand loyalty ($M_{High\text{-}emotionalL} = 6.04, SE = .20$ vs. $M_{Low\text{-}emotionalL} = 5.24, SE = .20; F(1, 426) = 8.00, p < .05$). However, social loneliness had no significant impact on brand loyalty ($M_{High\text{-}SocialL} = 5.48, SE = .19$ vs. $M_{Low\text{-}SocialL} = 5.58, SE = .19; p = .71$). Regarding the brand assortment, there was a significant interaction ($F(1, 426) = 7.44, p = .01$). Participants in the high (vs. low) social loneliness condition chose more brands ($M_{High\text{-}socialL} = 1.99, SE = .11$ vs. $M_{Low\text{-}socialL} = 1.59, SE = .11; F(1, 426) = 6.41, p < .05$), whereas emotional loneliness had no effect on assortment ($M_{High\text{-}emotionalL} = 1.55, SE = .12$ vs. $M_{Low\text{-}emotionalL} = 1.78, SE = .12; p = .18$). Overall, the experiment 1 provides initial evidence that different loneliness dimensions have different outcomes for brand loyalty and brand assortment, corresponding relational deficits.

Experiment 2a aims to show further evidence by using an advertisement setting, with a 3 (loneliness:emotional vs. social loneliness vs. control) x 2 (ad emphasis:brand loyalty vs. brand assortment) between-subjects design. Loneliness was manipulated by asking participants to read a scenario in which their friendships changed—a best friendship grows emotionally distant (emotional loneliness), a number of casual friendships end (social loneliness), or a scenario unrelated to loneliness (control). Next participants viewed an advertisement for a fictional socks-of-the-month delivery service, which emphasized either loyal devotion to customers or a large brand assortment. Then, participants indicated a willingness to purchase. Results revealed a significant interaction ($F(2, 424) = 4.68, p < .05$). Participants in the emotional loneliness condition showed greater willingness to purchase when the ad emphasized loyalty ($M = 5.64, SE = .28$) than brand assortment ($M = 4.82, SE = .27; F(1, 424) = 4.61, p < .05$). However, participants in the social loneliness condition were more willing to purchase when the ad emphasized brand assortment ($M = 5.82, SE = .26$) than loyalty ($M = 5.00, SE = .27; F(1, 424) = 4.69, p < .05$). Participants in the control condition showed no differences ($p = .74$).

Experiment 2b proposes that these findings are due to consumers' lay belief about brand and human relationships. The method was identical to experiment 2a except for the addition of an ostensible reading comprehension task. In the non-substitute condition, the reading task article argued that brand relationships cannot substitute for human relationships. In the baseline condition, the article discussed a neutral topic unrelated to loneliness. As in experiment 2a the dependent measure was willingness to purchase a brand after viewing an ad that emphasized loyalty or brand assortment. We predict that the baseline condition will replicate the prior experiment, whereas the non-substitute condition will eliminate the effect of loneliness. As expected, it revealed a significant three-way interaction ($F(1, 598) = 10.94, p < .01$). The baseline condition successfully replicated the prior result: a significant interaction between loneliness dimension and ad emphasis ($F(1, 598) = 12.07, p < .01$). However, in the non-substitute condition, this effect disappeared ($p = .21$). When participants were led to believe that brand relationships cannot substitute for human relationships, loneliness dimensions had no effect on brand relationships.

In conclusion, we demonstrate the consequences of multidimensional loneliness on brand loyalty and assortment. We find that emotionally lonely consumers prefer loyal brand relationships. This is consistent with prior work linking loneliness with stronger brand loyalty (MacInnis and Folkes 2017; Tsai 2014). We also find that socially lonely consumers prefer a greater number of brand relationships, weakening their connection to any single brand. This is consistent with prior work suggesting that loneliness weakens brand loyalty (Long et al. 2015). Our findings suggest a potential resolution to this inconsistency. Practically, we also provide implications on relationship marketing strategies such that brands can provide intimate relationships for emotionally lonely consumers and multiple brands experiences for socially lonely consumers.

REFERENCES

Fournier, S. (1998), "Consumers and Their Brands: Developing Relationship Theory in Consumer Research," *Journal of Consumer Research*, 24(4), 343-373.

Fournier, S. (2014). "Lessons learned about consumers' relationships with their brands," In *Handbook of brand relationships,* ed. D. J. MacInnis, C. W. Park. & J. R. Priester, Routledge, 27-45.

Kim, YounKyung., Jikyeong Kang, and Minsung Kim (2005), "The Relationships among Family and Social Interaction, Loneliness, Mall Shopping Motivation, and Mall Spending of Older Consumers," *Psychology & Marketing*, 22(12), 995-1015.

Long, Christopher R., Sukki Yoon, and Mike Friedman (2015), "How Lonely Consumers Relate to Brands: Insights from Psychological and Marketing Research," In *Strong brands, strong relationships*, ed. Susan Fournier, Michael Breazeale, Jill Avery, Routledge, 95-105.

MacInnis, Deborah J., and Valerie S. Folkes (2017), "Humanizing Brands: When Brands Seem to Be Like Me, Part of Me, and in a Relationship with Me," *Journal of Consumer Psychology*, *27*(3), 355-374.

Orth, Ulrich R., T. Bettina Cornwell, Jana Ohlhoff, & Christiane Naber (2017), "Seeing Faces: The Role of Brand Visual Processing and Social Connection in Brand Liking," *European Journal of Social Psychology*, 47(3), 348–361.

Pieters, Rik (2013), "Bidirectional Dynamics of Materialism and Loneliness: Not Just A Vicious Cycle," *Journal of Consumer Research*, *40*(4), 615-631.

Tsai, Shu-pei (2014), "Meaning Threats Heighten Consumer Attachment: Implications for Global Brand Management," *European Management Journal*, *32*(6), 991-1000.

Weiss, Robert S (1973), "Loneliness: The Experience of Emotional and Social Isolation," Cambridge, MA: MIT Press, 1-236.

Humanizing the Family Business: When is Communicating Family-ownership Beneficial?

Philipp Jaufenthaler, University of Innsbruck, Austria
Roland Schroll, University of Innsbruck, Austria

EXTENDED ABSTRACT

The vast majority of businesses are family businesses. For example, family businesses account for approximately 90% of all U.S. companies, employ around 60% of the total U.S. workforce, and are responsible for 30-60% of the domestic GDP (Astrachan and Shanker 2003). Moreover, some of the largest and most successful companies such as Wal-Mart, Nike, and Ford are family-owned businesses.

Despite their omnipresence, relatively little is known about how consumers respond to the communication of family ownership. Initial research in that domain indicates that family-owned companies can leverage their family ownership to positively influence consumer responses (Beck and Prügl 2018; Binz Astrachan et al. 2019). However, it is unlikely that communicating family-ownserhihp univocially enhances consumer responses. Thus, it is important to understand, from a theoretical and managerial perspective, under what conditions communicating family-ownership enhances versus deteriorates consumer response.

Drawing from knowledge activation theory (Epley, Waytz, and Cacioppo 2007; Higgins 1996), we argue that consumers humanize a company that communicates family-ownership. Specifically, the cue "family" activates existing knowledge about families (e.g., warmth and caring), which lead to a more human perception of the company. In turn, we predict that a more human perception of the company should lead to more favorable consumer responses due to greater perceived benevolence. Benevolence refers to "the extent to which a trustee is believed to want to do good to the trustor, aside from an egocentric profit motive" (Mayer, Davis, and Schoorman 1995, 718). Accordingly, because warmth and caring are uniquely human characteristics, we predict that a humanized (vs. non-humanized) company is perceived to be more attentive to consumer needs and to take special care of their interests. More formally:

Hypothesis 1: *Communicating family-ownership humanizes the company and, in turn, enhances consumer response because of greater perceived benevolence.*

Knowledge activation theory further states that incongruity between activated knowledge and a stimulus often leads to negative responses. For example, Van Horen and Pieters (2012) demonstrate that consumers react negatively to copycat strategies that imitate a leading brand's perceptual features. Thus, we expect that antisocial corporate behavior will be perceived as incongruent with the activated human schema as it contradicts the expected caring and concern for others. Consequently, consumers will punish a family-owned company more for negative corporate behavior so that the positive effect of communicating family-ownership vanishes in the presence of information about negative corporate behavior. More formally:

Hypothesis 2: *The effect of communicating family-ownership depends on the congruence of corporate behavior. That is, communicating family-ownership enhances consumer responses only when corporate behavior is congruent with the activated human schema.*

In a pilot study, 80 U.S. consumers from MTurk were exposed to a company logo that either contained or was lacking the information "family-owned" below the company name (between-subjects design). We measured perceived humanness adapting Aggarwal and McGill (2007)'s anthropomorphism measure. As predicted, the results show that consumers humanized the family-owned company significantly more than the company with no ownership information ($p = .010$).

Study 1 (N = 142) used the same procedure as the pilot study, with two differences. First, study 1 used a different ownership manipulation (i.e., company description) and provided ownership information also in the control condition (i.e. publicly owned). Second, in addition to humanization, we also measured benevolence (Mayer and Davis 1999) and purchase intention. The results show that consumers humanized the family company significantly more versus the publicly-owned company ($p = .003$), attributed significantly greater benevolence to the family-owned versus the publicly-owned company ($p = .004$), and were significantly more likely to purchase from a family-owned versus the publicly-owned company ($p < .001$). Importantly, we found a significant indirect effect (CI_{95}: [.03, .38]) via our proposed pathway (ownership communication → humanization → benevolence → purchase intention).

Study 2 (N = 212) used a 2 (ownership: no ownership cue vs. family-owned) × 2 (corporate behavior: no information vs. negative) between-subjects design. A company description referred to the company as either "family-owned," or just "company". While the negative corporate behavior condition showed a newspaper article about an environmental scandal involving the company, no such article was provided in the control condition. The results show a significant ownership × corporate behavior interaction ($p = .016$). When no corporate behavior information was provided, participants reported more favorable attitudes towards the company when the company was described as family-owned (vs. no ownership cue) ($p = .001$). However, as proposed, this positive effect vanished in the presence of negative corporate behavior ($p = .977$).

Study 3 (N = 204) used a 2 × 2 mixed factorial design with ownership (publicly-owned vs. family-owned) as a between-subjects factor and corporate behavior (no information vs. negative) as a within-subjects factor. We used the same company descriptions as in study 1. To manipulate corporate behavior, we again created a fictitious newspaper article informing about contaminated beer possibly related to the company described. First, participants read a company description containing our ownership manipulation and reported purchase intention. Second, participants read a fictional newspaper article containing our corporate behavior manipulation and again reported purchase intention.

The results show that, before knowing about negative corporate behavior, consumers were significantly more likely to purchase from a family-owned versus publicly-owned company ($p < .001$). This positive effect vanished after consumers learned about negative corporate behavior ($p = .214$).

In sum, the current research makes the following contributions. First, this work extends research on consumer's tendency to humanize family businesses (Beck and Prügl 2018) by using a more established measure of humanization (i.e., anthropomorphism). Results show that consumers attribute greater benevolence to a humanized company, which, in turn, positively influences purchase intention and attitude toward the company. Second, we identify a relevant boundary condition to this positive effect. Our results suggest that commu-

nicating family ownership enhances consumer responses only when corporate behavior is in-line with the activated human schema.

REFERENCES

Aggarwal, Piankaj and Ann L. McGill (2007), "Is That Car Smiling at Me? Schema Congruity as a Basis for Evaluating Anthropomorphized Products," *Journal of Consumer Research*, 34 (4), 468–79.

Astrachan, Joseph H. and Melissa C. Shanker (2003), "Family Businesses' Contribution to the U.S. Economy: A Closer Look," *Family Business Review*, 16 (3), 211–19.

Beck, Susanne and Reinhard Prügl (2018), "Family Firm Reputation and Humanization: Consumers and the Trust Advantage of Family Firms Under Different Conditions of Brand Familiarity," *Family Business Review*, 31 (4), 460–82.

Binz Astrachan, Claudia, Reinhard Prügl, Joseph F. Hair, and Barry J. Babin (2019), "Marketing and branding in family business: Assessing the landscape and charting a path forward," *Journal of Family Business Strategy*.

Epley, Nicholas., Adam Waytz, and John T. Cacioppo (2007), "On Seeing Human: A Three-Factor Theory of Anthropomorphism," *Psychological Review*, 114 (4), 864–86.

Fiske, Susan and Patricia W. Linville (1980), "What does the Schema Concept Buy us?," *Personality and Social Psychology Bulletin*, 6 (4), 543–57.

Higgins, Tory E. (1996), "The "Self Digest": Self-Knowledge Serving Self-Regulatory Functions," *Journal of Personality and Social Psychology*, 71 (6), 1062–83.

Kim, Sara and Ann L. McGill (2011), "Gaming with Mr. Slot or Gaming the Slot Machine? Power, Anthropomorphism, and Risk Perception," *Journal of Consumer Research*, 38 (1), 94–107.

Mayer, Roger. C. and James H. Davis (1999), "The effect of the performance appraisal system on trust for management: A field quasi-experiment," *Journal of Applied Psychology*, 84 (1), 123–36.

Mayer, Roger. C., James H. Davis, and David F. Schoorman (1995), "An Integrative Model of Organizational Trust," *The Academy of Management Review*, 20 (3), 709–34.

Van Horen, Femke and Rik Pieters (2012), "When High-Similarity Copycats Lose and Moderate-Similarity Copycats Gain: The Impact of Comparative Evaluation," J*ournal of Marketing Research*, 49 (1), 83–91.

Wagner, Tillmann, Richard J. Lutz, and Barton A. Weitz (2009), "Corporate Hypocrisy: Overcoming the Threat of Inconsistent Corporate Social Responsibility Perceptions," *Journal of Marketing*, 73 (6), 77–91.

Speed Up, Size Down: How Animated Movement Speed in Product Videos Influences Size Assessment and Product Evaluation

He (Michael) Jia, University of Hong Kong, China
B. Kyu Kim, Yonsei University, Korea
Lin Ge, Chinese University of Hong Kong, China

EXTENDED ABSTRACT

Fueled by advances in telecommunication technologies, video advertising has penetrated various digital channels and plays an increasingly crucial role in marketing communications (Teixeira, Wedel, and Pieters 2012). Video advertising often involves dynamic presentations of products that are displayed to move spontaneously but not able to move freely in reality (i.e., immobile products). Products in video ads cannot be shown as their actual physical sizes. When no explicit size information is provided in video ads, consumers may have different assessments of the product's physical size, which is an important attribute in consumer decision-making (Deng and Kahn 2009; Hagtvedt and Brasel 2017; Ordabayeva and Chandon 2013).

Given the potential ambiguity regarding product size in video ads and the importance of size assessment in consumer preference formation, it is beneficial for marketers to be aware of what dynamic visual cues consumers might draw on to infer the physical size of a product. To shed light on this issue, we examine whether and how the *movement speed* of a product (e.g., the speed at which a product rotates, vibrates, or bounces as a whole, moves its parts, or transforms its shape) displayed in video ads can influence consumers' size assessment as well as their willingness-to-pay for the product.

Developing a cross-domain knowledge transfer model (Goode, Dahl, and Moreau 2010; Gregan-Paxton and John 1997; Moreau, Markman, and Lehmann 2001), we propose that consumers overgeneralize the negative size–speed association learned from the base domain of free-moving, animate agents (e.g., animals and humans) to the target domain of immobile, inanimate products (e.g., consumer goods) that are animated to move in video ads. Specifically, we propose a *speed-based scaling effect*, such that consumers estimate the size of a product to be smaller when the product is displayed to move faster in video ads.

Study 1 ($N = 352$) adopted a single-factor between-subjects design with five product-animation conditions varying in movement speed (50%, 100%, 150%, 200%, vs. 250% of the original speed) and two static-image conditions (slide mode and image combination). The results show that an incremental increase in movement speed leads to a proportional decrease in size assessment ($B = -2.12$, $t(248) = -2.86$, $p = .005$), and the speed-based scaling effect seems to result from fast movement speed decreasing product size assessment, compared to the slide-mode condition ($B = -5.02$, $t(297) = -3.04$, $p = .003$) and the image-combination condition ($B = -3.89$, $t(293) = -2.35$, $p = .02$).

Study 2 ($N = 403$) used a 2 (movement speed: fast vs. slow) × 2 (perceived movement similarity: control vs. low) between-subjects design. Participants watched a video, in which a Swiss Army knife is animated to unfold its various tools (e.g., blades) and spin spontaneously at either a fast or a slow speed. After watching the product animation, participants completed a choice task. In the low-similarity (vs. control) condition, participants were shown three pictures of objects, including a gear, a tire, and a fan (vs. animate agents, including a fish, a dog, and a bird) and indicated which of the three objects (vs. animals) was relatively the most similar to the knife they viewed earlier in the way they are moving. A movement speed × perceived movement similarity interaction emerged ($F(1, 399) = 6.12$, $p = .01$). In the control condition, participants estimated the knife to have a smaller size in the fast-movement condition than in the slow-movement condition ($M_{fast} = 5.27$, vs. $M_{slow} = 6.07$; $F(1, 399) = 4.58$, $p = .03$). In the low-similarity condition, this effect was attenuated ($M_{fast} = 5.79$, vs. $M_{slow} = 5.27$; $F(1, 399) = 1.86$, $p = .17$).

Study 3 ($N = 163$) used a 2 (movement speed: fast vs. slow) × 2 (learned association: default/negative vs. reversed/positive) between-subjects design. We sequentially presented three video clips. The first two video clips manipulated the accessibility of the relationship between physical size and movement speed. In the default-association cells, participants watched a video of a small, fast-moving animal (a hummingbird) and another video of a large, slow-moving animal (an elephant). In the reversed-association cells, participants watched a video of a small, slow-moving animal (a snail) and one of a large, fast-moving animal (a cheetah). The third video clip was the target video for size assessment, in which a mobile WiFi device performs various lively movements, such as spinning and zooming out. There was a movement speed × learned association interaction ($F(1, 159) = 7.04$, $p = .009$). In the default-association cells, participants estimated the mobile WiFi device to be marginally smaller when it moved faster ($M_{fast} = 5.99$ vs. $M_{slow} = 6.85$; $F(1, 159) = 2.95$, $p = .09$). In the reversed-association cells, the effect of movement speed was reversed, such that participants estimated the size of the mobile WiFi device to be larger when it moved faster ($M_{fast} = 6.73$ vs. $M_{slow} = 5.68$; $F(1, 159) = 4.13$, $p = .04$).

Study 4 ($N = 200$) further demonstrates that the speed-based scaling effect was moderated by participants' target-domain knowledge ($B = 1.21$, $t(196) = 2.16$, $p = .03$). Fast speed decreased size assessment only for participants who had low target-domain knowledge ($M_{fast} = 19.60$ vs. $M_{slow} = 25.03$; $B = -2.71$, $t(196) = -3.03$, $p = .003$). In contrast, for those who had high target-domain knowledge, movement speed did not influence size assessment ($M_{fast} = 24.44$ vs. $M_{slow} = 24.38$; $B = .03$, $t(196) = .03$, $p = .98$).

Two final studies show the downstream consequences of the speed-based scaling effect, such that faster animated movement speed leads to higher willingness-to-pay when a small product size is desirable (e.g., mobile WiFi device, Study 5), but it results in lower willingness-to-pay when a large product size is preferable (e.g., bottled beverage, Study 6). Moreover, size perception mediates the effect of animated movement speed on willingness-to-pay.

We demonstrate a speed-based scaling effect across various product categories (e.g., consumer electronics, hand tools, home appliances, consumer packaged goods). The findings provide new theoretical insights into digital video advertising and offer important managerial implications.

REFERENCES

Deng, Xiaoyan, and Barbara E. Kahn (2009), "Is Your Product on the Right Side? The 'Location Effect' on Perceived Product Heaviness and Package Evaluation," *Journal of Marketing Research*, 46 (December), 725–38.

Goode, Miranda R., Darren W. Dahl, and C. Page Moreau (2010), "The Effect of Experiential Analogies on Consumer Perceptions and Attitudes," *Journal of Marketing Research*, 47 (April), 274–86.

Gregan-Paxton, Jennifer, and Deborah Roedder John (1997), "Consumer Learning by Analogy: A Model of Internal Knowledge Transfer," *Journal of Consumer Research*, 24 (December), 266–84.

Hagtvedt, Henrik, and S. Adam Brasel (2017), "Color Saturation Increases Perceived Product Size," *Journal of Consumer Research*, 44 (August), 396–413.

Moreau, C. Page, Arthur B. Markman, and Donald R. Lehmann (2001), "'What Is It?' Categorization Flexibility and Consumers' Responses to Really New Products," *Journal of Consumer Research*, 27 (March), 489–98.

Ordabayeva, Nailya, and Pierre Chandon (2013), "Predicting and Managing Consumers' Package Size Impressions," *Journal of Marketing*, 46 (September), 123–37.

Teixeira, Thaies, Michel Wedel, and Rik Pieters (2012), "Emotion-Induced Engagement in Internet Video Advertisements," *Journal of Marketing Research*, 49 (April), 144–59.

Low-Power State Promotes Variety-Seeking

Fei Jin, Sichuan University, China
Xiaodan zhang, Peking University, China

EXTENDED ABSTRACT

We propose that low-power state promotes variety-seeking. This effect occurs because consumers in low-power state desire sense of control and variety-seeking is a way to restore it. Furthermore, the effect is reduced when consumer knowledge in a certain consumption domain is high and when the low power state is stable.

Variety plays a critical role in consumer choice, and companies often stimulate purchase by constructing an assortment. Previous research examines factors influencing consumers' variety-seeking tendency from multiple perspectives, such as personality traits (Ariely and Levav 2000; Berlyne 1970), product characteristics (Gourville and Soman, 2005), and environmental factors (Levav and Zhu, 2009). However, how consumers' internal psychological factors affect variety-seeking remains an open question worthy of further exploration.

Contributing new insights to existing work on the topic, the current research tackles this question by examining how power states, one of the key psychological states of consumers, impact variety-seeking. We propose that low-power states promote consumers' variety-seeking tendency which is rooted in the compensatory value of variety-seeking. As an important basis of social hierarchy, power refers to asymmetrical control over valuable resources (Magee & Galinsky, 2008) which can affect consumers' thinking, feeling, perception, and behavior (Guinote, 2017). Low power is an aversive state. Consumers in low-power state often feel out of control in relation to their own or others' behaviors (Rucker & Galinsky, 2008). Previous research suggests that loss of control leads to many negative consequences. When people are in low-power states, they are motivated to change this aversive condition. Previous studies have shown that offering multiple choices can enhance consumers' sense of autonomy and happiness, and even the mere exercise of making choices can improve consumers' sense of control (Iyengar & Lepper, 1999). Similarly, the behavior of seeking variety can make consumers think that they are independent and autonomous (Kim & Drolet, 2003), and such autonomy serves as an important component of sense of control. Therefore, we argue that if consumers have the motivation to fulfill a need for control, they will choose variety. Our hypothesis is supported to an extent by Inesi et al. (2011), who note that when consumers are deprived of control, they prefer a large choice set to small one, as a large choice set (vs. a small choice set) contains more various items. We hypothesize that need for control mediates the effect of low power state on variety-seeking.

However, if consumers have an alternative means to increase their power state, they will not seek variety. We probe the moderating role of consumer knowledge. For consumers in low-power state, knowledge, as a source of power states (French and Raven, 1959), can compensate for a lack of sense of control. When choosing knowledge as an alternative means to enhance sense of control, they would therefore be less likely to choose variety. In contrast, consumers in high-power state make decisions based more on their own preferences than on their level of consumer knowledge, hence, the level of knowledge will not affect their variety-seeking tendency. We hypothesize that consumer knowledge moderates the effect of power state on variety-seeking, such that when consumer knowledge is high (vs. low), consumers in low-power state show a lower variety-seeking tendency.

Furthermore, stability is an important factor that has been shown to influence the extent to which consumers strive to change or maintain their power state (Maner and Mead 2010). If consumers in low-power state choose variety to restore sense of control, we predict that they would seek variety only when the current state is unstable, because they think that they can struggle out from the aversive state. However, consumers would less likely to choose variety when they find it is hard to change the current state. Hence, the effect of low-power on variety-seeking will be moderated by whether one's sense of power is stable. That is, they choose variety when the low-power state is unstable.

Study 1

This pilot study gave a correlational evidence for the relationship between power and variety-seeking. We analyzed transaction data from jd.com, a popular online ecommerce platform in China. We use consumers' level of membership as a proxy variable to measure power states (Magee and Galinsky, 2008). 1702 reviews concerning ten products, including transaction information and consumers' level of membership from jd.com were captured through R software during late January, 2018. Membership level, from registered member to diamond VIP member, was coded from 1 to 5 (1 = lowest membership level, 5 = highest membership level). Results indicated that membership level was negatively correlated with variety-seeking (r (1702) = -0.34, $p < 0.001$, Fisher's Z = 0.35). However, from a correlational analysis we could not claim there was a causal relation between power state and variety-seeking. There might be a number of alternative explanations for this correlation. For example, high membership level may represent an experienced consumer for whom a tendency toward variety-seeking might be reduced, or it may represent consumers with a strong internal tendency toward variety-seeking. Therefore, we conducted four experiments to test for a causal relationship between power states and variety-seeking by manipulating power states directly.

Study 2

Study 2 aimed to provide direct evidence that consumers in low-power state (vs. high-power state) were more likely to seek variety, by manipulating participants' power state. Following Garbinsky, Klesse, and Aaker (2014), 100 students were assigned into high-power (vs. low-power) condition by manipulating power states through role play. We measured variety-seeking by counting the number of different colors participants chose. A general linear model analysis was performed with power states (high-power state = 2, low-power state = 1) as the independent variable and variety-seeking as the dependent variable. Results demonstrated that the main effect of power state was significant ($F(1,96) = 7.21$, $p = 0.009$, $\eta^2 = 0.07$), and participants in the low-power state were more likely to choose variety than those in the high-power state ($M_{\text{low-power state}}$ = 4.33, SD = 0.99 vs. $M_{\text{high-power state}}$ = 3.61, SD = 1.58). The results held when we added appealing and liking as covariates.

Study 3

Study 3 aimed to provide convergent evidence for the main effect by using different experimental context, and probe the underlying mechanism of need for control. 180 participants were first asked to complete an episodic priming manipulation of power (Galinsky et al., 2003), and then were asked to complete a chocolate shopping

decision task. We directly measured need for control (Burger and Cooper, 1979; Consiglio et al., 2018). Two research assistants majoring in English rated the participants' recall tasks ("To what extent, did the participants' recall task reflect his/her power states?" 1 = not at all, 7 = very much). A one-way ANOVA was performed on the average of the two RAs' scores. The results showed that the power state of participants in the high-power group was significantly higher than that of participants in the low-power group ($M_{\text{high-power state}}$ = 4.61, SD = 1.60; $M_{\text{low-power state}}$ = 2.29, SD = 0.57; $F(1,174)$ = 164.19, $p < 0.001$, Cohen's d = 2.73). A general linear model analysis indicated that the main effect of power state was significant and participants in low-power state were more likely to choose variety than those in high-power state ($M_{\text{low-power state}}$ = 4.23, SD = 1.40; $M_{\text{high-power state}}$ = 3.56, SD = 1.52; $F(1,174)$ = 9.27, p = 0.003, η^2 = 0.05). Furthermore, the indirect effect of need for control was significant (95% CI = [-0.40, -0.03]), indicating that the mediating effect of need for control was significant (see Fig. 1).

Study 4

Study 4 examined whether consumer knowledge moderates the effect of low-power state on variety-seeking. 120 university students were randomly assigned to two groups (low power state vs. high power state), with measuring consumer knowledge (Clarkson, Janiszewski, and Cinelli, 2013). The scenarios and measurement of variety-seeking were consistent with those in Study 3. The results indicated that the interaction of power states and consumer knowledge was significant (B = 0.20, t = 2.41, p = 0.02, Cohen's d = 0.41), the main effect of consumer knowledge was significant (B = -0.33, t = -3.87, $p < 0.001$, Cohen's d = 0.70), but the main effect of power state was not significant ($p > 0.1$). Further spotlight analysis illustrated that in the condition of low consumer knowledge (vs. high consumer knowledge), consumers in low-power state showed a higher variety-seeking tendency (B = -1.04, t = -4.53, $p < 0.001$, [-1.50, -0.59]), but consumer knowledge did not affect the variety-seeking tendency of participants in high-power state (B = -0.23, t = -0.04, p = 0.37, [-0.72, 0.27], *ns*). Furthermore, in the condition of low consumer knowledge, participants in low-power state showed higher variety-seeking tendency than those in high-power state (B = -0.57, t = -2.875, p = 0.01, [-0.97, -0.17]). However, in the condition of high consumer knowledge, there was no significant difference between consumers in high or low-power states in variety-seeking tendency (B = 0.11, t = 0.56, p = 0.58, [-0.28, 0.51], *ns*).

Study 5

Study 5 examined the moderating role of stability. 201 university students were randomly assigned to 2 (power: low vs. high) × 2 (stability: stable vs. unstable) between-subjects design. We manipulated power and stability using workplace contract. After that, participants saw a list of six activities and were asked to choose six activities they would like to do over the next week (adapted from Etkin, 2016). Participants could choose six different activities or the same one(s) many times. the results of MANOVA showed that there was a significant interaction of power and stability ($F(1, 197)$ = 6.23, p = 0.01, η^2 = 0.03), but no main effect of power ($F(1, 197)$ = 0.19, *ns*) or stability ($F(1, 197)$ = 0.40, *ns*). Planned contrast revealed that for low-power participants, when they were in unstable condition, they showed higher variety-seeking tendency (M = 4.39, SD = 1.62) than they were in stable condition (M = 3.63, SD = 1.69, F = 4.89, p = 0.03, η^2 = 0.02). But there were no significant differences between stable (M = 4.34, SD = 1.69) and unstable condition (M = 3.89, SD = 1.88, F = 0.19, p = 0.03) for those in high-power states. The results

still held if we put marital status as a covariate ($F(1, 197)$ = 6.55, p = 0.01, η^2 = 0.03).

General Discussion

Variety-seeking is an important characteristic in contemporary society and it is influenced by numerous factors. The current research explores whether, why, and when power state affects variety-seeking. Five studies, including secondary data from jd.com and experiments using different contexts, provide convergent evidence that variety-seeking can be used to compensate for lacking sense of control.

Our research extends the literature on power states, variety-seeking, and consumer knowledge in several ways. First, we enrich the related research on compensatory consumption (Rucker & Galinsky, 2008). Previous literature on compensation consumption has focused mainly on symbolic or status products (Rucker & Galinsky, 2008; Rucker, Hu, & Galinsky, 2014), but our research demonstrates that consumers also perform strategic compensation for ordinary products through variety-seeking. Second, we contribute to the power states literature by showing that a lower-power state promotes variety-seeking behavior. Third, we demonstrate that consumer knowledge moderates the effect of power state on variety-seeking, providing a more nuanced understanding of how power state affects variety-seeking and how consumer knowledge influences decision making.

Our results also have managerial implications for businesses and marketing managers. First, in market segmentation, companies can consider the strategy of increasing the variety of products if consumers have the characteristics of low-power states (such as low income and low social status). Companies can enhance consumer knowledge of target groups if they do not want consumers to switch to competitors due to variety-seeking. Second, although many sellers always emphasize variety in their promotion activities, our results suggest that such advertising strategies may not be effective for consumers with rich knowledge in a certain domain. For those in high-power state and with rich consumer knowledge, a single and deep strategy is better than one of variety.

REFERENCES

Ariely, D. & Levav, J. (2000). Sequential Choice in Group Settings: Taking the Road Less Traveled and Less Enjoyed. *Journal of Consumer Research*, 27 (12), 279–90.

Anderson, C., & Galinsky, A. D. (2006). Power, optimism, and risk-taking. *European Journal of Social Psychology*, 36(4), 511-536.

Berlyne, D. E. (1970). Novelty, Complexity and Hedonic Value. *Perception & Psychophysics*, 8 (5A), 279–86.

Burger, J. M., & Cooper, H. M. (1979). The desirability of control. *Motivation and Emotion*, 3, 381–393.

Consiglio, I., De Angelis, M., Costabile, M., Fischer, E., & Argo, J. (2018). The Effect of Social Density on Word of Mouth. *Journal of Consumer Research*, 45(3), 511-528.

Etkin, J., & Sela, A. (2016). How experience variety shapes postpurchase product evaluation. *Journal of Marketing Research*, 53(1), 77-90.

French, J., Raven B., & Cartwright, D. (1959). The Bases of Social Power. in *Studies in Social Power*, ed. Dorin Cartwright, Ann Arbor, MI: Institute for Social Research, 150–67.

Garbinsky, E. N., Klesse, A. K., & Aaker, J. (2014). Money in the bank: Feeling powerful increases saving. *Journal of Consumer Research*, 41(3), 610-623.

Gourville, J. T., & Soman, D. (2005). Overchoice and assortment type: When and why variety backfires. *Marketing Science*, 24(3), 382–395.

Guinote, A. (2017). How power affects people: activating, wanting, and goal seeking. *Annual Review of Psychology*, *68*, 353-381.

Inesi, M. E., Botti, S., Dubois, D., Rucker, D. D., & Galinsky, A. D. (2011). Power and Choice: Their Dynamic Interplay in Quenching the Thirst for Personal Control. *Psychological Science*, 22 (8), 1042–48.

Iyengar, S. S., & Lepper, M. R. (1999). Rethinking the value of choice: a cultural perspective on intrinsic motivation. *Journal of Personality and Social Psychology*, 76(3), 349.

Kim, H. S., & Drolet, A. (2003). Choice and self-expression: A cultural analysis of variety-seeking. *Journal of Personality and Social Psychology*, *85*(2), 373-386.

Levav, J., & Zhu, R. (2009). Seeking freedom through variety. *Journal of Consumer Research*, *36*(4), 600-610.

Magee, J. C., & Galinsky, A. D. (2008). Social hierarchy: The self-reinforcing nature of power and status. *The Academy of Management Annals*, *2*(1), 351–398.

Rucker, D. D., & Galinsky, A. D. (2008). Desire to acquire: Powerlessness and compensatory consumption. *Journal of Consumer Research*, *35*(2), 257-267.

Rucker, D. D., Hu, M., & Galinsky, A. D. (2014). The experience versus the expectations of power: A recipe for altering the effects of power on behavior. *Journal of Consumer Research*, 41(2), 381-396.

Matching Rewards with Backers: The Differential Impact
of Rewards Types on Contributions in Crowdfunding

Anna Bernard, UCP - Católica Lisbon School of Business & Economics, Portugal
Rita Coelho do Vale, UCP - Católica Lisbon School of Business & Economics, Portugal

EXTENDED ABSTRACT

Crowdfunding has been constantly growing since its first development in 2008 (Beck et al. 2016) and is likely to raise more than $300 billion by 2025 (Massolution, 2015). The reward-based model, used by popular websites like Kickstarter.com or Indiegogo.com, has become commonly adopted throughout time, especially in the case of creative projects (Boeuf, Darveau, and Legoux 2014). In reward-based crowdfunding, entrepreneurs bypass the traditional fundraising by collecting funds among a large number of individuals. Instead of providing monetary returns, project owners frequently offer rewards in return of consumer contributions, which can be of various types, from highly tangible and material (e.g., a copy of an album, a t-shirt) to pure tokens of gratitude (e.g., thank-you note) (Thürridl and Kamleitner 2016). Practitioners and researchers seem to believe that these rewards play a vital role in crowdfunding behaviors (Gerber, Hui, and Kuo 2012; Thürridl and Kamleitner 2016).

Crowdfunding campaigns' success relies on a composite pool of backers, who are often heterogeneous regarding their motivation or their experience with the platforms. Some contributors are driven by early access to novel products (Belleflamme, Lambert, and Schwienbacher 2013) while others may be driven by altruistic motivations (Gerber et al. 2012). The different tiers of rewards enable endogeneous price discrimination (Hu, Li, and Shi 2015) and backers self-select in the type of rewards they are interested into. Most of the research in crowdfunding has focused on categorizing backers according to their motivation (Ryu and Kim 2016) or on building a typology of rewards (Thürridl and Kamleitner 2016).

In the present research, we aim to study the role of rewards on participants' likelihood of contributing and on amount given to projects. Specifically, we aim to understand which type of rewards (from pre-orders to tokens of gratitude) attracts different types of backers (non-users, unique backers, serial backers).

In Study 1, ninety undergraduate students from a South European University (females = 53%, M_{age} = 24.01, SD = 1.20), who declared they never participated in crowdfunding, were exposed to a fictional crowdfunding campaign to produce a music album. In exchange of their monetary contribution, participants were either not rewarded (*No Reward* condition, N = 30), rewarded with a copy of the album (*Product-type Reward* condition, N = 30) or with a thank-you note (*Grateful Reward* condition, N = 30). We further assessed their contribution likelihood and contributed amount. We found a statistically and marginally significant difference in average contributed amount according to reward type (F(2,87) = 2.78, p =.068) but not on the contribution likelihood (F(2,87) = 0.63, p = .536). Post hoc comparisons (Tukey) of the three groups indicate that participants in the *Grateful Reward* condition (M_{SR}=18.50, SD_{SR}=18.62) were willing to contribute more on average than those in the *Product-type Reward* condition (M_{TR}=1 1.00, SD_{TR}=9.16, p_{TRvsSR} = .087), while no statistical difference were found for the other comparisons with the *No Reward* condition (M_{NR} = 11.77, SD_{NR} = 10.98, p_{TRvsNR} = .138 and p_{SRvsNR} = .973).

Study 2 used the same scenario as Study 1, yet we modified the manipulation of the rewards. This study followed a 2(reward tangibility: digital, physical) x 2(reward gratitude: low, high) between-subjects design. Tangibility included two levels (low and high: digital album or physical album) and gratitude included 2 levels (low

and high: thank-you note, thank-you note + special song). We obtain a sample composed of participants who already participated in crowdfunding (the "users") and other who did not (the "non-users") using Amazon MTurk. MTurkers (206 US citizens, 47.57% women) were asked to report how likely they would contribute as well as by how much. For the "users" (N = 112), an ANOVA with contribution amount as the dependent variable revealed a significant effect of high tangibility (F(1, 100) = 3.44, p = .066). Participants expressed a lower contribution amount when the reward was in a digital version than when it was in a physical version ($M_{digital}$ = 34.48, $SD_{digital}$ = 29.20 vs $M_{physical}$ = 42.68, $SD_{physical}$ = 34.90). There was no significant simple effect of gratitude or significant interaction between the effects of tangibility and gratitude level on contribution amount. The same ANOVA ran on contribution likelihood revealed no significant main or interaction effects. A two-way ANOVA ran on the sample of 94 "non-users" to examine the effect of tangibility and gratitude levels on contribution amounts and on contribution likelihood revealed no significant main or interaction effects. A Probit regression on the likelihood of giving strictly more than 10€ (i.e. the reward value) revealed that non-users are more likely to overcontribute if the reward yields a high level of gratitude (52.92% vs. 47.58%, p = .084).

In a third study, we study this phenomenon using real contribution behavior for project observed on a French crowdfunding platform specialized in creative projects. When a contribution reaches a given threshold, it gives access to a reward composed of one or more items. Data was coded by two French-speaking coders who evaluated each item (N = 1029) composing the rewards (N = 761) selected by 746 contributors. For each item, coders had to state whether they agree with the following statements (1 = Definitely disagree; 7 = Definitely agree): "If I was receiving the reward, I would have the impression that the project owner express his/her gratitude towards me" (GRATITUDE); "The reward corresponds to the end product the project owner wishes to realize" (PRODUCT-RELATED). We regress the average scores over the items composing the reward with a dummy variable "Serial backer" (= 1 when a contributor support at least two projects), controlling for the number of items and the reward value and using clustered standard errors at the individual level. Results show that the expected average score for "PRODUCT RELATED" is significantly higher for serial backers (,). We do not find statistically significant effect of serial backers "GRATITUDE".

In sum, the present research contributes to a better understanding of the role of reward type on crowdfunding. We show that while rewards type does not impact the likelihood of contribution, it has an impact on the contribution amount. More specifically, non-users and occasional contributors tend to be attracted by grateful rewards, while serial backers wish to be rewarded with product-related items.

REFERENCES

Beck, Ralf, Dennis Brüntje, Ali Dardour, Oliver Gajda, Dan Marom, Ivana Pais, and Andreas Will (2016), "Introduction," in *Crowdfunding in Europe: State of the Art in Theory and Practice*, ed. Dennis Brüntje and Oliver Gajda, Cham: Springer International Publishing, 1–4.

Belleflamme, Paul, Thomas Lambert, and Armin Schwienbacher (2013), "Individual Crowdfunding Practices," *Venture Capital*, 15(4), 313–33.

Boeuf, Benjamin, Jessica Darveau, and Renaud Legoux (2014), "Financing Creativity: Crowdfunding as a New Approach for Theatre Projects," *International Journal of Arts Management*, 16(3), 33–48.

Gerber, Elizabeth M, Julie S Hui, and Pei-Yi Kuo (2012), "Crowdfunding: Why People Are Motivated to Post and Fund Projects on Crowdfunding Platforms."

Hu, Ming, Xi Li, and Mengze Shi (2015), "Product and Pricing Decisions in Crowdfunding," *Marketing Science*, 34(3), 331–45.

Massolution (2015), *2015CF The Crowdfunding Industry Report.*, Los Angeles: Los Angeles: Massolution.

Ryu, Sunghan and Young-Gul Kim (2016), "A Typology of Crowdfunding Sponsors: Birds of a Feather Flock Together?," *Electronic Commerce Research and Applications*, 16, 43–54.

Thürridl, Carina and Bernadette Kamleitner (2016), "What Goes around Comes Around? Rewards as Strategic Assets in Crowdfunding," *California Management Review*, 58(2), 88–110.

Cultural Differences in Consumer Responses to Celebrities Acting Immorally

In-Hye Kang, University of North Carolina at Greensboro, USA
Taehoon Park, Florida Gulf Coast University, USA

EXTENDED ABSTRACT

Scandals involving celebrities' moral misconduct are common in both Western and Eastern cultures. Prior literature examined consumer responses to these scandals in Western countries (e.g., Bhattacharjee et al., 2013; Lee & Kwak, 2016) while paying little attention to Eastern countries. We examine the cross-cultural differences in consumers' responses to celebrities engaged in moral transgressions and the brands they endorse.

We propose that Eastern (vs. Western) consumers show lower support for celebrities who have acted immorally. Different cultures promote different styles of thinking (e.g., Nisbett et al., 2001), such that Westerners tend to view the world as consisting of independent, isolated objects (analytic thinking), whereas Easterners tend to view the world as composed of interconnected objects and events (holistic thinking). Building on this prior work, we argue that Eastern (vs. Western) consumers would have a stronger belief that different traits within an individual (i.e., competence and morality in our context) are inherently connected. Because of this belief in the association, we expect that Eastern (vs. Western) consumers will engage in less moral decoupling—separating the judgments about celebrities' morality from judgments about their competence in the professional domain (Bhattacharjee et al., 2013). This difference in moral decoupling will, in turn, lead to lower consumer support for celebrity transgressors in Eastern (vs. Western) culture.

Building on the proposed process, we identify a moderating variable: transgression relevance. When a transgression is relevant (vs. not relevant) to the domain of competence, consumers in the U.S. find it more difficult to engage in moral decoupling (Bhattacharjee et al., 2013). However, if Eastern consumers have a belief that one's competence and morality are interconnected as we propose, they should not engage in moral decoupling regardless of high versus low transgression relevance. Hence, we expect that the high (vs. low) transgression relevance would reduce moral decoupling and consumer support for Western consumers, not for Eastern consumers. Looking at the other way, we expect that the effect of Eastern (vs. Western) cultures on lowering moral decoupling and consumer support will be attenuated when transgression relevance is high.

In the studies, we examined two countries, the U.S. and South Korea, to represent cultures with high analytic versus holistic thinking styles, respectively (Choi et al., 2007). We first ran a pretest to identify moral transgressions that were perceived as equally immoral in the two countries to use in the main studies (extramarital affair, intoxicated driving, and taking steroids).

In Study 1, participants read a scenario about a popular actress who had been confirmed to engage in an extramarital affair. As predicted, Korean (vs. U.S.) participants showed lower support for the actress ($p < .001$) and less moral decoupling ($p < .001$). Moral decoupling significantly mediated the effect of culture on consumer support.

Study 2 tested the multi-step mechanism that the cultural effect on consumer support is mediated by consumers' belief in the association between morality and competence and subsequent moral decoupling. Participants read a scenario in which a famous baseball player was confirmed to drive while intoxicated. Korean (vs. U.S.) participants showed lower support for the baseball player ($p < .001$) and less moral decoupling ($p < .001$). Korean (vs. U.S.) participants reported a greater belief in the association between morality and competence ($p < .001$). A proposed serial mediation path was significant.

Study 3 tested the moderating role of transgression relevance. The procedure was identical to Study 2 except for the transgression relevance manipulation. In the [low / high] relevance condition, participants read that a baseball player [drove while intoxicated / took steroids]. We found a significant interaction between culture and transgression relevance on consumer support ($p = .015$). In the low relevance condition, Korean (vs. American) participants showed lower support for the baseball player ($p < .001$). In the high relevance condition, although still significant, the effect of culture on consumer support was significantly reduced ($p < .001$). Moreover, as expected, U.S. participants showed lower support when the transgression relevance was low (vs. high; $p = .006$). Korean participants did not show any difference in their support based on the transgression relevance ($p = .57$). The same pattern of results emerged for moral decoupling. A moderated mediation analysis revealed a significant higher-order interaction, suggesting that the indirect effect of moral decoupling was significantly attenuated in the high (vs. low) relevance condition.

Study 4 examined whether the cultural effect on celebrity support would extend to consumer support for the endorsed brand. We predicted that if an endorsed brand decides to retain the celebrity endorser, Eastern (vs. Western) consumers would indicate a lower brand attitude. In contrast, we predicted that if an endorsed brand dismisses the celebrity endorser, the negative effect of Eastern (vs. Western) cultures on brand attitude would be attenuated.

Participants read a scenario that a competent basketball player, who had been an active brand endorser of a sports drink brand, engaged in an extramarital affair. In the [retain / dismiss] condition, the company decided to [keep / end] its brand endorsement contract with the basketball player. As predicted, there was a significant interaction between culture and the brand's decision on brand attitude ($p < .001$). Korean (vs. American) participants showed a less favorable brand attitude in the retain condition ($p < .001$), but not in the dismiss condition ($p = .18$). With regards to support for the basketball player, as expected, only the main effect of culture was significant ($p < .001$), such that Korean (vs. U.S.) participants showed lower support. A moderated mediation analysis revealed that celebrity support significantly mediated the cultural effect on brand attitude when the company retained the celebrity, but not when the company dismissed the celebrity.

Across the studies, we ruled out several alternative explanations, including moral rationalization, deontology, consequentialism, perceived importance of morality over other traits, and perceived responsibility of celebrities. Theoretically, our findings contribute to the literature on consumer moral judgment and styles of thinking. Managerially, our findings provide brand managers with practical guidance regarding culturally specific risk management strategies in the use of celebrity endorsers.

REFERENCES

Bhattacharjee, Amit, Jonathan Z. Berman, and Americus Reed (2013), "Tip of the Hat, Wag of the Finger: How Moral Decoupling Enables Consumers to Admire and Admonish," *Journal of Consumer Research*, 39 (6), 1167–84.

Choi, Incheol, Minkyung Koo, and Jong An Choi (2007), "Individual Differences in Analytic Versus Holistic Thinking," *Personality and Social Psychology Bulletin*, 33 (5), 691–705.

Lee, Joon Sung, and Dae Hee Kwak (2016), "Consumers' Responses to Public Figures' Transgression: Moral Reasoning Strategies and Implications for Endorsed Brands," *Journal of Business Ethics*, 137 (1), 101–13.

Nisbett, Richard E., Kaiping Peng, Incheol Choi, and Ara Norenzayan (2001), "Culture and Systems of Thought: Holistic Versus Analytic Cognition," *Psychological Review*, 108 (2), 291–310.

Kawaii Women: Empowered, or, Entrapped?

Aparna Kansal, Indian Institute of Management Calcutta, India
Krishanu Rakshit, Indian Institute of Management Calcutta, India

EXTENDED ABSTRACT

Marxist philosopher Gramsci pointed out that societies are, in general, realm of consent, and Althusser (1970) extended this understanding by defining basic institutions of society as sites of control and power. As subcultures attempt to forge resistances to these established power structures, they ironically seem to reinstate the power structures. This paper focuses on the *Kawaii* subculture in Japan and how it impacts its main participants, Japanese women who attempted to break the power hierarchy in society. The paper also attempts to draw common grounds with the teenybopper subculture.

It is impossible to escape the intense cuteness that embodies the Japanese society. The prevalent soft objectification of young women; known as '*Kawaii*'; is frequently equated to 'cute' in the western world. However, *Kawaii* is a much more multilayered and gendered concept. "*Kawaii* means childlike; it celebrates sweet, adorable, innocent, pure, simple, genuine, gentle, vulnerable, weak, and inexperienced social behavior and physical appearances" (Kinsella,1995). In a way, *Kawaii* has saturated Japanese culture to make it a "standard aesthetic of everyday life" (McVeigh, 2000) but it is more readily applicable to women. The ideals of Japanese femininity are associated with the notion of *Kawaii* and it is a quality that is a prerequisite for a woman to have a place in the society (Mcveigh,1996). The official meaning of *Kawaii* from the 2000 edition of *Nihon Kokugo Daijiten* (Nittono, 2016):

"…. Kawaii (adjective) (1) looks miserable and raises sympathy. pitiable. pathetic. piteous. (2) attractive. Cannot be neglected. cherished. beloved. (3) has a sweet nature. lovely. (a) (of faces and figures of young women and children) adorable. attractive. (b) (like children) innocent. obedient. touching. (4) (of things and shapes) attractively small. small and beautiful. (5) trivial. pitiful. (used with slight disdain)."

Nittono (2016) points out, these "somewhat contradictory meanings" reflect the word's subjectivity, context-dependency, and situation-specificity, with which Japanese people today use and understand *Kawaii*. Nittono (2016) in his two-layered model of *Kawaii* argues that the basis of *Kawaii* stems from a protective nature towards babies, however, suggests that the understanding has a much broader psychological space- not just connected to babies. The other view presents a more darker aspect. It suggests that *Kawaii* draws people in through the pitiable nature (Ngai, 2012). Ngai asserts that cuteness has a sadistic element, crude aestheticization of powerlessness ("what we love because it submits to us").

Kawaii symbolizes the rebellion of of young teenage girls against the patriarchy and their expected role in the society. Japan's post-war success in reconstruction had been attributed to the dedication and the hard work of workforce; men picturized as hard-working salarymen and women as homemakers and child bearers. Women were expected to work only till marriage; leading young girls to adopt cuteness as an antithesis to adulthood (Hinton,2014). Kinsella (1995) highlights the craze of "fake child writing" using rounded/stylized characters gaining ground among young adults out the craze for cute. It was followed by the rise of infantile slang words, as when "sex" was referred to as *nyan nyan suru (*"to meow meow"). This led to the invention of other cute commodities in the market such as the Hello Kitty by Sanrio, which, incidentally, has no mouth and therefore appears non-threatening and vulnerable.

However, this very attempt to challenge the patriarchy through *Kawaii* did not succeed. Rather, it reinstated it further- leading to Japanese women having to embrace *Kawaii* to the very thing that started out to counter patriarchy has reinstated it even more, so much so, that today women in Japan have to be *Kawaii* to be accepted easily. This demonstrates the negative effect and unforeseen impact of *Kawaii* on the power hierarchy in the existing patriarchy. To illustrate the negative nature of *Kawaii*, this paper focuses on the portrayal of women in *Manga* and their acceptability among women readers to demonstrate how 'aestheticization of powerlessness' and its portrayal in media once again re-established the very power structure that women had tried to subvert by engaging in the *Kawaii* culture. Young girls displaying *Kawaii* characteristics are extremely common objects of sexual fantasies in a whole gamut of mainstream *animes* and *Mangas*. Pornography has also acquired many of aspects of the *Kawaii* aesthetic: "wholesome and innocent schoolgirls in sailor suits…have appeared in novels, erotic *Manga*, illustrations, photo magazines, and videos, and on internet sites" (Kinsella, 2002). The male onlooker gained authority through the position of experience. Women became "sexy" without being overtly sexualized, as if her sexuality was but imposed upon her by the male onlooker. *Kawaii* was so pervasive in Japan that it became a feminine ideal (Walker, 1995)- a new normal for the women to internalize. A subculture, which began as a "free choice" soon became a symbol of subordination to their male counterpart.

The teenybopper subculture rose to prominence in the mainstream media in the seventies and has become a mainstay ever since. On the surface, these two subcultures do not have much in common, but they are in fact, quite similar. Firstly, both are highly gendered and are ascribed mostly to female. Secondly, they provided a means for the female population to set themselves apart from their adult counterparts Whiteley (2000). The teenybopper culture gained popularity among the young females because it gave them an entity, which were the teen idols, whom they could fantasize about from the comfort of their room and engage in a "quasi-sexual ritual" (Hall & Jefferson,1976) and as resistance to the contemporary, strict sexual boundaries placed on the female gender. Both these subcultures started out resisting existing power hierarchy but in the end at best furthered the disparity across genders. Once again, the youth subculture that was started by the female as a resistance to the patriarchy re-established the existing normative. Similarly, *Kawaii* strips its object of any power and places the control in the hands of the subject. The effect of *Kawaii* is so damaging that the object, that is the woman, began to shift its identity to mold to the desires of the subject to continue to hold relevance.

REFERENCES

Althusser, L. (1970) "Ideology and Ideological State Apparatuses", in L. Althusser Lenin and Philosophy and Other Essays (New York: Monthly Review Press).

Hall, S., & Jefferson, T. (1976). Resistance through rituals: Youth subcultures in post-war Britain. London: Hutchinson.

Kinsella, S. (1995). Cuties in Japan. In L. Skov and B. Moeran Women, media and consumption in Japan, 220-255. Honolulu: University of Hawai'i Press.

Kinsella, S. (2002). What's Behind the Fetishism of Japanese School Uniforms?. Fashion Theory: The Journal of Dress, Body & Culture. 6. 215-237.

Mcveigh, B. (1996). Cultivating "Femininity" and "Internationalism": Rituals and Routine at a Japanese Women's Junior College. Ethos, 24(2), 314-349.

McVeigh, B. J. (2000). Wearing ideology: State, schooling and self-presentation in Japan. Oxford: Berg.

Ngai, S. (2012). Our Aesthetic Categories: Zany, Cute, Interesting. Harvard University Press.

Nittono, H. (2016): The two-layer model of "*kawaii*": a behavioural science framework for understanding *kawaii* and cuteness. East Asian J. Popul. Cult. 2(1), 79–95.

Walker, J. (1995). Liberalism, Consent, and the Problem of Adaptive Preferences. Social Theory and Practice, 21(3), 457-471.

Whiteley, S. (2000). Women and popular music: Sexuality, identity, and subjectivity. London i.e. Abington, Oxon: Routledge.

Online Reviewers: Approaches to Online Reviewing, Narrative Voices And Emergent Market Interactions

Gwarlann de Kerviler, IESEG School of Management and LEM-CNRS 9221, France
Catherine Demangeot, IESEG School of Management and LEM-CNRS 9221, France

EXTENDED ABSTRACT

Having just finished reading a book, one might want to write an online review of it. The 'voice' may lean towards a personal, experiential perspective, such as: *"Having Type 1 diabetes, I felt different, as no family member has every had* [sic] *it in history. It helped me not feel alone, and that something so heartbreaking makes you stronger"*; a more descriptive and evaluative angle as in: *"This is a story of a young boy who is left with his undesirous extended family after his father and mother die. This book was full of adventure, mystery, and entertainment that pulls the reader into the story"*; or a more authoritative, contextualized viewpoint, as in *"If your children are in an 'Accelerated Reader' program at school and looking for books to keep them interested while improving their AR level ... look no more. The Harry Potter series is exactly what you'll need".* The above are extracts from actual reviews of the same book ("Harry Potter and the Sorcerer's Stone"), collected online (Amazon.com 2020), which all have the same star rating. Such variety in the texts reporting an experience is intriguing, yet limited attention has been given to what shapes reviewing. What might account for these widely different voices found in reviews about the same experience? What do the different voices say about the perspective of the authors of these reviews? Answers to these questions are of theoretical and practical importance, and the current research addresses them both. The vast literature around online reviewing acknowledges that reviews can be written differently but focuses on the effects on readers as opposed to explaining this heterogeneity.

Our research connects reviewing voice with the perceptions that reviewers form of the online reviewing activity. We draw from relational models theory (Fiske 1991, 1992), which stipulates that individuals develop mental models of social systems within which they interact in order to answer the questions: *"Who am I in relation to the other(s)"?* and *"What is appropriate behavior for myself and the other in this social interaction?"*, and further articulates that individuals draw from forms of sociality to function in all social systems. Our findings indicate that reviewers construct mental models of the online reviewing activity to develop representations of the online reviewing system (ORS) and know what role they have, as reviewers, in relation to other actors within that system. In turn, these mental models inform their reviewing voice. We conceptualize four interconnected dimensions of consumer participation to online reviewing systems, that we label 'the 4Rs': **R**epresentation of ORS, perceived **R**ole within ORS, **R**eviewing voice, and evolving **R**apport with market actors. These four Rs then serve to characterize three different reviewer profiles that have emerged from the analysis; they mirror Fiske's (1991) relational models (communal sharing, equality matching and market pricing) and have corresponding writing behaviors and interactions with market actors.

This research contributes to research on consumer-centric systems by uncovering mental models shaping their participation in ORSs. It adds to knowledge on consumers' participation in consumer-centric systems by identifying three distinct reviewer profiles (*communal sharers, conscientious contributors, and aspiring experts),* which co-exist within the same platforms. Third, it complements research on eWOM/online reviews by showing how a reviewing voice manifests its author's mental model of online reviewing.

Our data consists of 50 depth interviews conducted with online reviewers who also shared some of their reviews with us (610 reviews in total, 12.2 reviews per participant); 409 reviews collected on TripAdvisor about three regional tourist attractions; and 480 reviews collected on Amazon and authored by 96 reviewers (5 reviews per reviewer). The interviews covered participants' reviewing activity, perception of their role, stance towards other market actors in ORS and approach to review writing. We sought variance among participants in terms of age, gender, occupation, and reviewing experience; and among reviews collected in various platforms about different types of consumption experiences.

Data analysis proceeded in two stages. First, we used structural narrative analysis (e.g., Riessman 2005) to code 409 TripAdvisor reviews and 480 Amazon reviews authored by 96 reviewers, proceeding from an intra-review, to an intra-reviewer, then a cross-reviewer perspective, to ascertain that narrative voices remain consistent across platforms and across reviews authored by the same reviewer. Second, we analyzed the 50 interview transcripts using the constant comparative method. Three approaches to reviewing emerged from interviews. We then, independently, categorized the 610 reviews provided by participants into one of the three narrative voices identified in the first stage. Finally, we triangulated participants' approach to reviewing and their reviews' narrative voices.

Our rigorous process across two steps and the triangulation of respondents' own perspective gathered through interviews with their actual reviews enabled the emergence and validation of three distinct approaches to reviewing:

1) *The Communal sharing* views the ORS audience as an 'in-group' of other consumers, sharing similar pursuit of making the most from their consumption choices. They provide like-minded people with access to great consumption options, and protection from unfair or low-value options.

2) *The Equality matching* approach to reviewing views the ORS audience as connected by a mutual interest in improving market offers and experiences. Equality matching underlines a sense of obligation: by contributing versus just reading reviews, reviewers satisfy their need for equality.

3) *The Market pricing* approach views the ORS as a system offering a rewarding new market role. They gain status through their intensifying contributions, satisfying a need for achievement. They define themselves at the personal level as independent entities.

Using Fiske's (1991; 1992) relational models theory, we delineate three distinct stances towards reviewing, manifested in different reviewing voices, and in emergent forms of interaction with market actors. The communal sharing approach shows similarities with sharing (Belk 2010); the equality matching approach shows similarities with reciprocal gift giving (Giesler 2006); and the market pricing approach shows similarities with emergent social media influence activities (Kozinets et al. 2010; Scaraboto and Fischer 2013). Using relational models theory enables a consolidated comprehensive view of the nature of reviewers' participation.

Findings suggest that reviewers tend to consistently adopt one approach, across reviews and platforms, with market pricing as more emergent. Our results provide practitioners with insights on how ob-

servable reviews' narrative voice informs how reviewers perceive their role and the other market actors, enabling marketers to decide how best to respond online, adjust their offer, or communicate offline.

REFERENCES

Belk, Russell W. (2010). Sharing. *Journal of consumer research*, 36 (5), 715-734.

Bridoux, Flore, & Stoelhorst, J. W. (2016). Stakeholder relationships and social welfare: A behavioral theory of contributions to joint value creation. *Academy of Management Review*, *41*(2), 229-251.

Fiske, Alan P. (1991). *Structures of social life: The four elementary forms of human relations: Communal sharing, authority ranking, equality matching, market pricing*. New York: Free Press.

Fiske, Alan P. (1992), "The Four Elementary Forms of Sociality: Framework for a Unified Theory of Social Relations," *Psychological Review*, 99 (4), 689-723.

Giesler, Markus (2006). Consumer gift systems. *Journal of consumer research*, *33*(2), 283-290.

Kozinets, Robert V., Kirsten de Valck, Andrea C. Wojnicki, and Sarah J.S. Wilner (2010), "Networked Narratives: Understanding Word-of-Mouth Marketing in Online Communities," *Journal of Marketing*, 74 (2), 71-89.

Riessman, Catherine Kohler (2005), "Narrative Analysis," in Narrative, Memory & Everyday Life, Huddersfield: University of Huddersfield.

Scaraboto, Daiane, & Fischer, Eileen (2013). Frustrated fatshionistas: An institutional theory perspective on consumer quests for greater choice in mainstream markets. *Journal of Consumer Research*, *39*(6), 1234-1257.

Managing Customer Response to Service Failure Through Exposure to Order

Jamel Khenfer, Zayed University, UAE
Olivier Trendel, Grenoble Ecole de Management, France

EXTENDED ABSTRACT

Although service organizations often aspire to deliver outstanding customer service, most—if not all—of them have had moments where they find themselves unable to meet a customer's expectations. These discrepancies constitute service failures (McCollough et al., 2000). When such failures are non-customer related, customers can react quite negatively, going as far as questioning their loyalty to the brand (McCollough et al., 2000; Vaerenberg et al., 2014).

According to attribution theory (Folkes, 1984), customers cope with the discrepancy between actual performance and expected performance by engaging in a process of causal reasoning whereby they attempt to determine why the service failed, and in doing so, attribute responsibility for the negative outcome. Customers do so by considering three factors: locus (i.e., whether the cause is customer- or firm-related), stability (i.e., whether the cause is temporary or fairly permanent), and controllability (i.e., whether the cause is under volitional control or constrained).

Prior works have investigated a wide range of post hoc solutions on how companies may deal with service failures such as recovery efforts (e.g., prompt handling, compensation) (McCollough et al., 2000; Vaerenberg et al., 2014). But dealing with service failure in hindsight means waiting for customers to develop negativity toward the brand. How then could service organizations influence the attribution process, before customers formulate attribution judgments, to keep brand approach at levels similar to the absence of service failure?

In this research, we propose that introducing order and predictability in the customer's environment as the service experience occurs may boost brand approach in contexts of service failure because exposure to order lowers people's willingness to attribute responsibility. When customers experience a service failure, causal reasoning is triggered not by the episode per se, but by the episode as a deviation from the expected (McGill, 1989). In other words, they start the process of attributing responsibility because their social and physical environments no longer appear orderly and predictable, but chaotic and unpredictable.

Supporting studies shows that activating sources of order boosts feelings of control, and as such, promotes willingness to invest effort in the pursuit of outcomes associated with important personal goals. For example, people exposed to subtle reminders of orderly patterns in the natural environment reported a greater willingness to take actions (Kay et al., 2014). Likewise, portraying corporations as interventionist agents that bring order in people's lives reversed the loss of motivation that normally occurs when the path toward the desired outcome seems overly confusing (Khenfer et al., 2017). In support of the unique power of orderly patterns, this effect disappeared when corporations were portrayed as merely benevolent.

Thus, we expected that exposure to order would lower attribution of responsibility following a service failure because it would elicit a sense that the world is an orderly, clear place where everything is predictable and understandable. In doing so, exposure to order should help keep brand approach to levels similar to situations where customers did not experience a service failure. Put differently, we hypothesized that exposure to order (vs. baseline or disorder) would increase brand approach in contexts of service failure.

We ran four online and lab experiments to test this hypothesis and examine boundary conditions.

Study 1 (N=424) used a 2-condition (service failure: no failure vs. failure) between-subjects design and established a relationship between people's chronic preference for orderly environments and brand approach in contexts of service failure. Specifically, the more individuals had a need to perceive the world as orderly and predictable, the less they were likely to purchase again a brand involved in a service failure.

Study 2 (N=238) used a 2 (service failure: no failure vs. failure) × 2 (exposure to order: baseline vs. order) × 2 (brand's involvement in failure: involved vs. non-involved) mixed design. While we found support for our hypothesis, we also identified locus of the cause of failure as a boundary condition. Following a service failure, exposure to order increased brand approach for the provider but not for third parties. We argued that, under such circumstances, consumers considered brands not ostensibly involved in service failure as disconnected from the chain of events that introduced chaos into their lives and therefore irrelevant in the attribution process.

Study 3 (N=403) used a 3 (service failure: no failure vs. unstable failure vs. stable failure) × 2 (exposure to order: disorder vs. order) between-subjects design. We sought to test our hypothesis and another boundary condition, that is, stability of the cause of failure. We predicted that our effect should disappear when failure appeared to have been predictable all along, that is, stable over time. While we found that exposure to order increased willingness to pay withdrawal charges despite an unexpected failure from the credit card company, we found no difference between participants who were exposed to order and those who were not when said failure was presented as a repeating event.

Study 4 (N=484) used a 4 (service failure: no failure vs. failure under constrained causes vs. failure under confounded causes vs. failure under volitional causes) × 2 (exposure to order: baseline vs. order) between-subjects design. Study 4 explored mechanism and tested a third boundary condition, that is, the perceived controllability of the cause of service failure. Specifically, we found that exposure to order lost its effect on brand approach following a service failure when the provider appeared in controlled of the causes that led to said failure.

This research demonstrates that reminders of orderly patterns can facilitate brand approach in contexts of service failure because exposure to order lowers customers' willingness to attribute responsibility. Yet, exposure to order should not be viewed as a magic wand. Its effect on brand approach is contingent on three factors: the locus, stability, and controllability of the causes of service failure. Overall, our work suggests that putting forth orderly patterns using the service environment can be a cost-effective method to help firms optimize damage control in contexts of non-customer-related failure.

REFERENCES

Folkes, Valerie S. (1984), "Consumer Reactions to Product Failure: An Attributional Approach," *Journal of Consumer Research*, 10 (4), 398-409.

Kay, Aaron C., Kristin Laurin, Gráinne M. Fitzsimons, and Mark J. Landau (2014), "A Functional Basis for Structure-Seeking: Exposure to Structure Promotes Willingness to Engage in Motivated Action," *Journal of Experimental Psychology: General*, 143 (2), 486-491.

Khenfer, Jamel, Kristin Laurin, Eric Tafani, Elyette Roux, and Aaron C. Kay (2017) "Interventionist External Agents Make Specific Advice Less Demotivating," *Journal of Experimental Social Psychology*, 73, 189-196.

McCollough, Michael A., Leonard L. Berry, and Manjit S. Yadav (2000), "An Empirical Investigation of Customer Satisfaction After Service Failure and Recovery," *Journal of Service Research*, 3 (2), 121-137.

McGill, Ann L. (1989), "Context Effects in Judgments of Causation," *Journal of Personality and Social Psychology*, 57 (2), 189-200.

Van Vaerenbergh, Yves, Chiara Orsingher, Iris Vermeir, and Bart Larivière (2014), "A Meta-Analysis of Relationships Linking Service Failure Attributions to Customer Outcomes," *Journal of Service Research*, 17 (4), 381-398.

A Relational Account of Powerlessness: The Role of the Attachment System in Consumer Inaction

Junha Kim, The Ohio State University, USA
Jieun Pai, University of California Los Angeles, USA
Jennifer Whitson, University of California Los Angeles, USA
Sujin Lee, KAIST, South Korea

EXTENDED ABSTRACT

Power is the basis of hierarchical differentiation and inherently relational (Magee and Galinsky 2008; Rucker, Galinsky, and Dubois 2012). Given the pyramid-shaped nature of hierarchies, most consumers will report to someone who has power over them, thus putting them in the position of low-power. The experience of low power can create challenges for consumers by inhibiting self-initiated exploratory actions (Anderson and Galinsky 2006; Galinsky, Gruenfeld, and Magee 2003). With the lion's share of people less prone to act, the impact of negative downstream consequences from powerlessness is substantial.

A recent review (Schaerer et al. 2018) suggests that unique phenomena come into play only during the experience of low power. Investigating the experience of low-power individuals provides a relational perspective through which to interpret and predict their behaviors. In the current work, we propose and test relational mechanism of powerlessness and inaction link. We propose that consumers are less likely to act (e.g., risk-taking and counter-offer in negotiations) because of the activation of anxious attachment and that this link would be weaken or even eliminated with the presence of secure attachment figures.

While attachment anxiety may not be the sole driver of inaction among low-power individuals, one way to illustrate that attachment anxiety is indeed an important factor in the powerlessness-inaction link is to examine whether how-power consumers also increase inaction when they experience state attachment anxiety. Making unpredictable and variable others temporarily salient will activate state attachment anxiety and put consumers to state attachment anxiety, deactivating their exploration system and inhibiting the powerful from taking exploratory action.

We present three studies that provide evidence that experiencing low power activates attachment anxiety which in turn decrease exploratory behaviors. We also demonstrate that activating attachment anxiety reduce the exploratory behaviors of the powerful consumers.

Study 1 (N = 102 Mturkers) was a one-factor (power: high vs. low) between-subject design. We instructed participants in the high-power (low-power) condition to recall and write about an experience in which they had power over others (in which someone else had power over them; Galinsky et al., 2003). After completing the power recall task, participants reported their state attachment anxiety and state attachment avoidance (Wei et al. 2007) with regard to how they felt "at the moment". Low-power participants reported greater state attachment anxiety ($M = 3.72$) than did high-power participants ($M = 3.17$, $p = .028$). There was no significant difference in state attachment avoidance between low-power participants ($M = 2.56$) and high-power participants ($M = 2.28$, $p = .198$). These results support that consumers with low power experience greater state attachment anxiety than those with high power.

Study 2 (N = 75 Mturkers) tested the consequences of heightened state attachment anxiety, using a blackjack game to measure inaction (Galinsky et al. 2003). We used the same recall task as in Study 1, then measured their state attachment anxiety and avoidance using State Adult Attachment Measure (SAAM; Gillath et al. 2009) on a 7-point scale. Finally, they decided whether to take a card or not in a game of blackjack. Participants in the low-power condition had greater state attachment anxiety ($M = 5.04$) than did those in the high-power condition ($M = 4.22$, $p = .013$). The effect of power on state attachment avoidance was not significant ($M = 2.91$ vs. $M = 2.52$, $p = .135$). Further, there was a significant indirect effect of low power on inaction via attachment anxiety, 95% CI = [.04, .91].

Study 3 (N = 97 Mturkers) examined the attachment anxiety mechanism by process of moderation approach (Spencer, Zanna, and Fong 2005). We used the propensity to negotiate as a measure of inhibited action (Magee, Galinsky, and Gruenfeld 2007). The study was a 2 (power: high vs. low) x 2 (attachment: anxiety vs. control). We used the same recall task to manipulate power. Participants in the attachment anxiety condition were asked to recall a situation in which they were anxious because they believed that focal person was reluctant to be as close as they would have wanted, but the participant still felt uncomfortable being without a close relationship and worried that the partner did not value them as much as they valued the partner (Baldwin et al. 1996; Mikulincer, Gillath, and Shaver 2002). We used a simple buyer-seller negotiation scenario as an indirect measure of approach/inhibition (Magee et al. 2007). Participants rated their likelihood to negotiate for a specific item ("You are buying a new car. How likely would you be to negotiate the price?") on a 7-point scale, where a lower likelihood indicates greater inhibition. The interaction between power and attachment on propensity to negotiation was significant, $p = .042$. Without attachment manipulation, participants in the low-power condition showed lower propensity to negotiate ($M = 5.42$) than those in the high-power condition ($M = 6.32$, $p = .045$). However, with attachment anxiety manipulation, both high- and low-power participants showed low level of negotiation propensity ($M_{\text{high-power}} = 5.04$ vs. $M_{\text{low-power}} = 5.42$, $p = .385$). These results further provide evidence that the direction of the effect is based on low power's increase in attachment anxiety, rather than high power's reduction in attachment anxiety.

In three studies we demonstrate that consumers who experience low power are less likely to take risk and show exploratory behaviors because of the activation of attachment anxiety. Our research contributes to the literature on consumer power. Prior research on consumer power has predominantly theorized based on control and compensatory motivation (see Rucker et al. 2012 for a review). However, the current research highlights a new consequence of powerlessness: attachment anxiety. Power is a relational construct existing only within social relationships (Emerson 1962; Fiske 1993; Salancik and Pfeffer 1974; Thibaut and Kelley 1959). In spite of its grounding in interpersonal connections, there has been a lack of systematic examination of how power, especially low power, is interlaced with mental representations of relationships.

REFERENCES

Anderson, Cameron and A. D. Galinsky (2006), "Power, Optimism and Risk-Taking," *European Journal of Social Psychology*, 36, 511-36.

Baldwin, M. W., J. P. R. Keelan, B. Fehr, V. Enns, and E. Koh-Rangarajoo (1996), "Social-Cognitive Conceptualization of Attachment Working Models: Availability and Accessibility Effects," *Journal of Personality and Social Psychology*, 71, 94-109.

Emerson, Richard M. (1962), "Power-Dependence Relations," *American Sociological Review*, 27 (1), 31-41.

Fiske, Susan T. (1993), "Controlling Other People: The Impact of Power on Stereotyping," *American Psychologist*, 48 (6), 621-28.

Galinsky, A. D., Deborah H Gruenfeld, and J. C. Magee (2003), "From Power to Action," *Journal of Personality and Social Psychology*, 85 (3), 453-66.

Gillath, Omri, Joshua Hart, Erik E. Noftle, and Gary D. Stockdale (2009), "Development and Validation of a State Adult Attachment Measure (Saam)," *Journal of Research in personality*, 43 (3), 362-73.

Magee, J. C. and A. D. Galinsky (2008), "Social Hierarchy: The Self-Reinforcing Nature of Power and Status," *The Academy of Management Annals*, 2 (1), 351-98.

Magee, Joe C., Adam D. Galinsky, and Deborah H. Gruenfeld (2007), "Power, Propensity to Negotiate, and Moving First in Competitive Interactions," *Personality and Social Psychology Bulletin*, 33 (2), 200-12.

Mikulincer, Mario, Omri Gillath, and Phillip R. Shaver (2002), "Activation of the Attachment System in Adulthood: Threat-Related Primes Increase the Accessibility of Mental Representations of Attachment Figures," *Journal of Personality and Social Psychology*, 83 (4), 881-95.

Rucker, Derek D., Adam D. Galinsky, and David Dubois (2012), "Power and Consumer Behavior: How Power Shapes Who and What Consumers Value," *Journal of Consumer Psychology*, 22 (3), 352-68.

Salancik, Gerald R. and Jeffrey Pfeffer (1974), "The Bases and Use of Power in Organizational Decision Making: The Case of a University," *Administrative Science Quarterly*, 19 (4), 453-73.

Schaerer, Michael, Christilene du Plessis, Andy J. Yap, and Stefan Thau (2018), "Low Power Individuals in Social Power Research: A Quantitative Review, Theoretical Framework, and Empirical Test," *Organizational Behavior and Human Decision Processes*, 149, 73-96.

Spencer, Steven J., Mark P. Zanna, and Geoffrey T. Fong (2005), "Establishing a Causal Chain: Why Experiments Are Often More Effective Than Mediational Analyses in Examining Psychological Processes," *Journal of Personality and Social Psychology*, 89 (6), 845-51.

Thibaut, John W. and Harold H. Kelley (1959), *The Social Psychology of Groups*, New York: Wiley.

Wei, M., D. W. Russell, B. Mallinckrodt, and D. L. Vogel (2007), "The Experiences in Close Relationship Scale (Ecr)-Short Form: Reliability, Validity, and Factor Structure," *Journal of Personality Assessment*, 88, 187-204.

The Influence of Store Spaciousness on Salience of Product Quality Versus Price During Product Evaluations

Yenee Kim, EDHEC Business School, France
Richard G. McFarland, ESSEC Business School, France

EXTENDED ABSTRACT

This research examines the complex structure of retail spaciousness and customer purchase behavior. Specifically, we examine how store layouts influence customers' product evaluations through feeling of confinement. How does the feeling of confinement induced through the retail environment impact the salience of product quality versus product price when consumers are evaluating products? We explore this question across five studies operationalizing feeling of confinement in diverse ways. The findings of this research reveal that feeling of confinement can lead to higher purchase intentions for products salient in quality compared to price. This shift can be explained by compensatory consumption theory as feeling of confinement can be perceived as a self-threat (Levav and Zhu 2008) and consumers are motivated to react to eliminate this threat through consumption (e.g., Rucker and Glinsky 2008; Cutright and Samper 2014). Specifically, product quality can be associated with self-worth (Truong and McColl 2011), whereas lower product price can be associated with lower self-worth and the inability to purchase higher quality products which can reinforce lack of freedom and lower self-worth.

Further, this research shows that perceived control which is the belief that one is in control of his/her outcomes in life and environment (White 1959) mediates the relationship between feeling of confinement and salience on product quality. In detail, feeling of confinement can decrease an individual's perceived control of the environment (Hui and Bateson 1991; Xu, Shen and Wyer 2011) which leads to higher purchase intentions on high quality products compared to low priced products in order to restore perceived control by creating a sense of power.

Across five studies, we examine the impact of feeling of confinement on purchase intentions and actual behavioral choices for products salient on quality vs. price. In Study 1, participants wrote about an experience when they felt confined or unconfined and then indicated purchase intentions for chocolate with a "Best Quality" or "Best Price" sign. Results revealed a significant interaction between feeling of confinement and product salience (p <.001). Specifically, consistent with our prediction, confined participants had higher purchase intentions for chocolate salient in quality than chocolate salient in price (p <.001). By contrast, unconfined participants did not differ in purchase intentions for chocolate salient in quality and price (p =.720).

Study 2 used articles and pictures of actual retail settings to prime feeling of confinement. Participants read a short article on retail stores with small vs. large layouts with photoshopped pictures and imagined their shopping experience in the store. Afterwards, participants indicated purchase intentions for a portable charger with a "Best Price" sign or "Best Quality". Results showed a significant interaction between feeling of confinement and product salience (p <.05). Further, confined participants had higher purchase intentions for portable chargers salient in quality than price (p =.052). On the other hand, non-confined participants did not have differences in purchase intentions between the two portable chargers (p =.37).

Study 3 replicated the results of the previous studies and ruled out mood as a potential alternative explanation. Participants saw a photo of an electronics store with wide vs. narrow aisles that were photoshopped and imagined their shopping experience in the store.

After, they indicated purchase intentions for a radio with a "Best Price" sign or "Best Quality". Then, they completed the PANAS (Watson, Clark, and Tellegen 1988) to measure current mood. Results revealed a significant interaction between feeling of confinement and product salience (p <.001). In detail, confined participants had higher purchase intentions for radios salient in quality than radios salient in price (p =.001). Whereas, there were no differences for purchase intentions between ratios salient in quality and price for non-confined participants (p =3.03). Further, there were no differences in positive and negative mood across the two conditions of confinement and non-confinement (p_{PA}=.216; p_{NA}=.713).

The objectives of Study 4a and Study 4b were to test the mediation of perceived control through an experimental-causal-chain design. Accordingly, we expect Study 4a to show that feeling of confinement leads to lower perceived control and Study 4b to show that lower perceived control leads to higher preference for products salient on quality versus products salient on price.

In Study 4a, participants wrote about a situation when they felt confined or unconfined and then rated their perceptions of perceived control (Lachman and Weaver 1998). As predicted, participants in the confinement condition reported lower levels of perceived control compared to participants in the non-confinement condition (p < .05).

In Study 4b, participants wrote about a personal experience on when they felt a heightened sense of control or loss of control and then indicated purchase intentions for a doormat with a "Best Quality" or "Best Price" sign. Results revealed a significant interaction between feeling of confinement and product salience (p< .05). Specifically, participants in the low perceived control condition had higher purchase intentions for doormats salient in quality than price (p< .05) whereas, there were no differences for purchase intentions between doormats salient in quality and price for participants in the high perceived control condition (p= .596).

The objective of Study 5 was to replicate the results of previous studies with behavioral choices using wide vs. narrow aisles. Participants walked through a narrow or wide aisle (narrow: 3 feet wide by 15 feet long; wide: 7 feet wide by 15 feet long) and either chose a chocolate package with a "Best Price" sign or "Best Quality" at the end of the aisle. Analyses revealed that participants in the narrow aisle condition significantly chose the "Best Quality" chocolate more than the participants in the wide aisle condition (p= .063).

Overall, this research contributes to theory as we develop a theoretical framework that integrates feeling of confinement and purchase intentions for product quality versus product price to advance our understanding of compensatory consumption. Further, we add to research examining how store atmospherics (Kotler 1973) and environmental psychology such as feeling of confinement affect decision making in the retail setting.

REFERENCES

Cutright, K. M., & Samper, A. (2014). Doing it the hard way: How low control drives preferences for high-effort products and services. *Journal of Consumer Research*, *41*(3), 730-745.

Hui, M. K., & Bateson, J. E. (1991). Perceived control and the effects of crowding and consumer choice on the service experience. *Journal of consumer research*, *18*(2), 174-184.

Kotler, P. (1973). Atmospherics as a marketing tool. *Journal of retailing*, *49*(4), 48-64.

Lachman, M. E., & Weaver, S. L. (1998). The sense of control as a moderator of social class differences in health and well-being. *Journal of personality and social psychology*, *74*(3), 763.

Levav, J., & Zhu, R. (2009). Seeking freedom through variety. *Journal of Consumer Research*, *36*(4), 600-610.

Rucker, D. (2009). Compensatory consumption: How threat directs consumers' product preferences. *Advances in Consumer Research*, *36*, 131-134.

Truong, Y., & McColl, R. (2011). Intrinsic motivations, self-esteem, and luxury goods consumption. *Journal of Retailing and Consumer Services*, *18*(6), 555-561.

Watson, D., Clark, L. A., & Tellegen, A. (1988). Development and validation of brief measures of positive and negative affect: the PANAS scales. *Journal of personality and social psychology*, *54*(6), 1063.

White, R. W. (1959). Motivation reconsidered: The concept of competence. *Psychological review*, *66*(5), 297.

Xu, J., Shen, H., & Wyer Jr, R. S. (2012). Does the distance between us matter? Influences of physical proximity to others on consumer choice. *Journal of Consumer Psychology*, *22*(3), 418-423.

Mere Exposure to Unhealthy Smell Demotivates Health Behavior

Kyeongheui Kim, Sungkyunkwan University, South Korea
Suyeon Jung, University of Wisconsin-Madison, USA

EXTENDED ABSTRACT

Obesity has become a public health crisis. More than 1.9 billion adults are overweight and over 650 million of these are obese (WHO 2018). Past research on the effect of scent on food consumption has shown that prolonged exposure to an indulgent food-related scent (e.g., popcorn) led to decreased consumption of the food cued and other similar indulgent foods (Biswas and Szocs 2019; Biswas et al. 2014; Inman 2001; Rolls and Rolls 1997). These findings imply that smelling the scent of unhealthy foods can be helpful for a healthy consumption. However, no research has explored how the scent of unhealthy foods affects healthy behavior in *nonfood* context such as exercising.

In the present research, we propose that the scent of unhealthy foods (i.e., unhealthy scent), which motivates people to eat healthier foods, actually demotivates people from engaging in healthy behavior in nonfood context. Specifically, we argue that people who are exposed to an unhealthy scent are less motivated to exercise, more tempted to engage in hedonic behavior, and less satisfied with health-related behavior than those exposed to a relatively healthy scent or no scent.

Prior research has shown that smelling a scent can activate semantic associations of the scent (Holland, Hendriks and Aarts 2005) and an exposure to an appetitive odor or temptation prompts people to seek anything rewarding and pleasing, activating heightened hedonic thoughts and goals (Van Dillen, Papies, and Hofmann 2013; Wadhwa, Shiv and Nowlis 2008). The activated hedonic goal further can be used as an input for a subsequent behavior in an assimilative way, suppressing a competing health goal (Laran and Janiszewski 2009; Van Osselaer and Janiszewski 2012). Building on this literature, we hypothesize that unhealthy scent can demotivate people's engaging in healthy behavior, which is driven by the activation of a hedonic goal.

In **Study 1**, 120 participants smelled either a caramel scent or a peppermint scent before entering a gym to exercise. We recorded the time when participants entered the gym and the time when they finished exercising to measure the duration of exercise. We also measured their average exercise time at a gym. As predicted, participants who smelled the caramel scent ($M = 69.40$ minutes, $SD = 29.16$) took less time for exercising than those who smelled the peppermint scent ($M = 77.22$ minutes, $SD = 30.85$, $F(1,117) = 4.562$, $p = .035$, $\eta^2 = .04$). In addition, participants who smelled the caramel scent exercised much less than their average exercise time ($M = -10.27$ minutes, $SD = 30.75$), whereas those exposed to the peppermint scent exercised as usual ($M = 1.47$ minutes, $SD = 24.45$, $F(1,118) = 5.352$, $p = .022$, $\eta^2 = .04$).

In **Study 2,** we tested whether an unhealthy (vs. healthy) scent demotivates people's healthy behavior by measuring their exercise intensity given the same time duration. 130 undergraduates wearing a pedometer freely walked in a caramel- or a peppermint-scented room for four minutes. As predicted, participants exposed to the caramel scent ($M = 410$ steps, $SD = 134.46$) walked fewer steps than those exposed to the peppermint scent ($M = 489$ steps, $SD = 142.25$; $t(128) = 3.259$, $p = .001$, $d = .57$).

Study 3 used a 3 (scent: unhealthy vs. healthy vs. control) between-subjects design. 154 undergraduates were exposed to a caramel scent, a peppermint scent or no scent. Then, they indicated their preference between one-time coupon of a free personal training and a movie ticket and chose which one they would like to receive. Participants in the caramel scent condition less preferred the coupon for PT ($M = 1.04$, $SD = 1.65$) than those in the peppermint scent condition ($M = 2.23$, $SD = 2.20$, $F(1,102) = 9.650$, $p = .002$, $\eta^2 = .09$) or those in the control condition ($M = 2.30$, $SD = 2.60$, $F(1,99) = 8.482$, $p = .004$, $\eta^2 = .08$). In addition, fewer participants in the caramel scent condition (7 out of 51; 13.7%) chose the coupon for PT than those in the peppermint condition (18 out of 53; 34.0%, $\chi^2(1) = 5.829$, $p = .016$) or those in the control condition (20 out of 50; 40.0%, $\chi^2(1) = 8.899$, $p = .003$).

In **Study 4**, we tested whether the activation of a hedonic goal mediated the effect. 98 undergraduates smelled either a caramel scent or a peppermint scent and played a word search puzzle. After that, they watched a workout tutorial video and indicated how they evaluated the video. As predicted, the number of hedonic goal-related words found mediated the demotivating effect of the unhealthy scent on the evaluation of the workout video (indirect effect =.086, $SE = .055$, $CI_{95\%} = [.0089, .2342]$).

In **Study 5**, we predicted that when hedonic behavior is *nonfood-related*, unhealthy scent tempts people to engage in unhealthy behavior (i.e., demotivates healthy behavior) and thus increases their satisfaction with such behavior. On the other hand, as Biswas and Szocs (2019) suggested, when hedonic behavior is *food-related* (i.e., eating), unhealthy scent should demotivate people's engaging in unhealthy behavior and thus decrease their satisfaction with such behavior. This study employed a 2 (scent: unhealthy vs. healthy) x 2 (hedonic behavior: nonfood vs. food) between-subjects design. 208 undergraduates smelled either a caramel scent or a peppermint scent and played game (in the nonfood condition) or ate cookies (in the food condition). After that, they indicated satisfaction and perceived temptation to continue the activity. As predicted, there was a two-way interaction between scent and behavior on temptation ($F(1, 204) = 7.452$, $p = .007$, $\eta^2 = .04$) and on satisfaction ($F(1, 204) = 7.750$, $p = .006$, $\eta^2 = .04$). Participants who smelled the caramel (vs. peppermint) scent were *more* tempted to play game and more satisfied with it, whereas they were *less* tempted to eat cookies and less satisfied with cookies.

In sum, the current research provides novel findings that unlike in the context of food-related hedonic behavior, in nonfood-related behavioral context, unhealthy (vs. healthy) scent demotivates consumers' engaging in healthy behavior.

REFERENCES

Biswas, Dipayan, Lauren Labrecque, Donald Lehmann, and Ereni Markos (2014), "Making Choices While Smelling, Tasting, and Listening: The Role of Sensory (Dis)similarity When Sequentially Sampling Products," *Journal of Marketing*, 78 (1), 112–26.

Biswas Dipayan, Szocs Courtney (2019), "The Smell of Healthy Choices: Cross-Modal Sensory Compensation Effects of Ambient Scent on Food Purchases," *Journal of Marketing Research*, 56 1, 123–41.

Holland, Rob W., Merel Hendriks, and Henk Aarts (2005), "Smells Like Clean Spirit: Nonconscious Effects of Scent on Cognition and Behavior," *Psychological Science*, 16 (9), 689–93.

Inman, J. Jeffrey (2001), "The Role of Sensory Specific Satiety in Attribute-Level Variety Seeking," *Journal of Consumer Research*, 28 (1), 105–20.

Laran Juliano Janiszewski Chris (2009), "Behavioral Consistency and Inconsistency in the Resolution of Goal Conflict," *Journal of Consumer Research*, 35 (April), 967–84.

Rolls, Edmund T., and J.H. Rolls (1997), "Olfactory Sensory-Specific Satiety in Humans," *Physiology & Behavior*, 61 (3) 461–73.

Van Dillen, Lotte F., Esther K. Papies, and Wilhelm Hofmann. "Turning a blind eye to temptation: How cognitive load can facilitate self-regulation." *Journal of Personality and Social Psychology* 104.3 (2013): 427.

Van Osselaer, Stijn, and Chris Janiszewski (2012), "A Goal-Based Model of Product Evaluation and Choice," *Journal of Consumer Research*, 39 (August), 260–92.

Wadhwa, Monica, Baba Shiv, and Stephen M. Nowlis (2008). A bite to whet the reward appetite: The influence of sampling on reward-seeking behaviors. *Journal of Marketing Research*, *45*(4), 403-413.

WHO (2018), "Obesity and overweight," (accessed 16 February, 2019), [available at https://www.who.int/news-room/fact-sheets/detail/obesity-and-overweight].

The "Achilles Heel" of Established Brands: The Effect of Brand Age on Consumers' Brand Choices

Yaeeun Kim, Temple University, USA
Joydeep Srivastava, Temple University, USA

EXTENDED ABSTRACT

Firms often focus on extrinsic attributes to create and shape brand associations that make up brand image (Keller 1993, 2003). One extrinsic attribute that firms often advertise is their age or year of establishment (YOE). Examples include both relatively established brands like Lindt ("Master Chocolatier Since 1845") and younger ones like Honey and Babies ("Est. 2014").

Although there is a large literature on the effects of extrinsic cues (Jiang et al. 2016), little research has been done on the effects of brand age on consumers (Desai, Kalra, and Murthi 2008). We examine the link between brand age and impressions of brand personality (Aaker 1997; Aggarwal and McGill 2007) to identify the conditions under which a more established or a younger brand is preferred. We hypothesize that there is a positive relationship between perception of product category innovativeness and preference for a younger brand (hypothesis 1); that this relationship is mediated by impressions of brand personality based on age stereotypes (hypothesis 2); and that it is attenuated when brands provide information that is inconsistent with age stereotypes (hypothesis 3).

In Study 1, participants (n = 211) were asked to choose between two brands in each of thirteen product categories; for example, "If you were shopping for a box of chocolates, which brand would you choose to purchase? Brand A, Since 1942, or Brand B, Since 2011?" The orders of product categories and brands were randomized. For each category, participants' perceptions of product category innovativeness were measured by averaging their responses to three seven-point items ($\alpha = .94$) adapted from Lee and O'Connor (2003).

A repeated-measures logistic regression revealed a significant effect of perceptions of product category innovativeness (= 0.37, SE = .07, Wald χ^2 = 32.12, Exp (= 1.45, $p < .001$) with no effects of order or two-way interaction (all p's > .159). Perceptions of product category innovativeness varied from 3.9 (table runner) to 5.9 (home security camera). Preferences for the established brand dropped from almost 74% (table runner) to 29% (home security camera) as perceptions of innovativeness increased. These findings support hypothesis 1.

In Study 2, participants (n = 325) were randomly assigned to one of four conditions in a 2 (product category: virtual reality headset and chocolates) × 2 (presentation order: Brand A established and Brand A young) between-subjects design. We generated a set of 90 potentially age-relevant traits (Aaker 1997; Rosen and Jerdee 1976) and asked participants to rate the extent on seven-point scales.

A logistic regression revealed a significant effect of product category (= 1.05, SE = .33, Wald χ^2 = 10.30, Exp (= 2.86, $p = .001$). No other effects were significant (all p's > .250). Principal component factor analyses (40 traits were retained) revealed a three-factor structure accounting for 66% of the total variance. The three factors were labeled "stableness" (22 traits, $\alpha = .97$), "dynamism" (14 traits, $\alpha = .96$), and "irrelevant" (4 traits, $\alpha = .90$).

Hayes' (2017) parallel multiple mediator test (PROCESS 4) showed that the indirect effect of product category innovativeness on brand choice was significant through stableness (indirect effect: = 0.86, SE = .27, CI 95% = [.444, 1.484]) and dynamism (indirect effect: = –0.35, SE = .16, CI 95% = [–.708, –.099]), but not the irrelevant dimension (indirect effect: = 0.10, SE = .09, CI 95% = [–.056, .309]). These findings support hypotheses 1 and 2.

Study 3 tested hypothesis 3 and explored the extent to which implicit theories of the self, or consumers' beliefs about the malleability of personality traits, affected the use of age stereotypes in the formation of brand personality impressions. Participants (n = 664) were randomly assigned to one condition in a 2 (product category: dried tea leaves and home security camera) × 2 (implicit theory salience: entity and incremental) × 2 (brand tagline: none and stereotype inconsistent) × 2 (presentation order: Brand A established first and Brand A young first) between-subjects design.

After reading a paragraph of a research article supporting either entity theory (i.e., personality traits are fixed) or incremental theory (i.e., traits can be changed; Chiu, Hong, and Dweck 1997), participants chose between an established brand and a young brand. We also measured participants' impressions of brand personality dimensions.

A logistic regression revealed a significant effect of product category as preference for the younger (vs. established) brand was significantly higher in the home security camera category (45.5%) than in the dried tea leaves category (16.8%; = 1.73, SE = .34, Wald χ^2 = 26.17, Exp (= 5.61, $p < .001$). Although no other effects were significant (all p's > .159), a two-way interaction between product category and brand tagline was significant (= –1.20, SE = .52, Wald χ^2 = 5.47, Exp (= 0.30, $p = .019$). Preferences for the younger brand in both the home security camera (60.1%) and dried tea leaves (16.4%) categories were more polarized when there was no tagline relative to the preferences for the younger brand (30.9% for home security cameras, 17.3% for dried tea leaves) when the tagline was stereotype inconsistent.

Hayes' (2017) parallel multiple moderated mediation test (PROCESS 7) showed that the indirect effect of product category on brand choice was significant through the stableness dimension when there was no brand tagline (= 1.02, SE = .28, CI 95% = [.540, 1.659]), but not when the brand tagline was stereotype inconsistent (CI 95% = [−.573, .326]). The indirect effect of product category on brand choice through the irrelevant dimension showed a similar pattern.

This research contributes to our understanding of how brand attributes shape brand impressions and thereby influence brand preferences. First, we demonstrate that consumer preferences for a relatively young brand increase with their perceptions of product category innovativeness. Second, we shed insight into the underlying process. Third, we highlight the malleability of brand impressions using stereotype inconsistent information. From a managerial perspective, our research identifies conditions under which an established brand or a younger brand will be preferred.

REFERENCES

Aaker, Jennifer L. (1997), "Dimensions of Brand Personality," *Journal of Marketing Research*, 34 (3), 347-56.

Aggarwal, Pankaj and Ann L. McGill (2007), "Is That Car Smiling at Me? Schema Congruity as a Basis for Evaluating Anthropomorphized Products," *Journal of Consumer Research*, 34 (4), 468-79.

Chiu, Chi-yue, Ying-yi Hong, and Carol S. Dweck (1997), "Lay Dispositionism and Implicit Theories of Personality," *Journal of Personality and Social Psychology*, 73 (1), 19-30.

Desai, Preyas S., Ajay Kalra, and B.P.S. Murthi (2008), "When Old Is Gold: The Role of Business Longevity in Risky Situations," *Journal of Marketing*, 72 (1), 95-107.

Hayes, Andrew F. (2017), *Introduction to Mediation, Moderation, and Conditional Process Analysis: A Regression-Based Approach*, New York: Guilford.

Jiang, Yuwei, Gerald J. Gorn, Maria Galli, and Amitava Chattopadhyay (2016), "Does Your Company Have the Right Logo? How and Why Circular-and Angular-Logo Shapes Influence Brand Attribute Judgments," *Journal of Consumer Research*, 42 (5), 709-26.

Keller, Kevin Lane (1993), "Conceptualizing, Measuring, and Managing Customer-Based Brand Equity," *Journal of Marketing*, 57 (1), 1-22.

--- (2003), "Brand Synthesis: The Multidimensionality of Brand Knowledge," *Journal of Consumer Research*, 29 (4), 595-600.

Lee, Yikuan and Gina Colarelli O'Connor (2003), "The Impact of Communication Strategy on Launching New Products: The Moderating Role of Product Innovativeness," *Journal of Product Innovation Management*, 20 (1), 4-21.

Rosen, Benson and Thomas H. Jerdee (1976), "The Influence of Age Stereotypes on Managerial Decisions," *Journal of Applied Psychology*, 61 (4), 428-32.

Positioning High- and Low-Status Brands in Social Media:
The Potential of Communication Style

Kristina Kleinlercher, University of St.Gallen, Switzerland
Tim M. Boettger, IESEG School of Management, France
Thomas Rudolph, University of St.Gallen, Switzerland

EXTENDED ABSTRACT

Social media (SM) have disrupted marketing communication by enabling brands to communicate with their customers in a very personal way (Labrecque 2014). While high-status brands may use SM to reach a broader and younger customer base and to be the topic of conversation, the free-for anybody claim on SM may jeopardize their exclusive brand image (Quach and Thaichon 2017). In the physical world, luxury brands preserve their exclusive image, for instance, by closing their front doors and keeping them guarded by well-dressed doormen (Dion and Arnould 2011). With no such ways available in SM, luxury brands are challenged to find new ways to make their brand exclusive in this "available for everyone" medium. Our research proposes that luxury brands may use their communication style (CS) in SM, i.e., the way in which they communicate, in order to convey social distance and exclusivity to their customers. We use three studies including field data and two online experiments to show that a brand's communication style is an important but neglected brand positioning tool in SM (see Table 1).

As an important characteristic of someone's CS personal pronouns are a powerful linguistic device to communicate different levels of social distance (Sela et al. 2012). We hypothesize that brands from different status levels use different frequencies of personal pronouns in their SM communication and thus convey different levels of social distance to their customers. Insights drawn from linguistics concerning fingerprints in writing (e.g., Burrows 2007) yield that people may use CSs to recognize and classify brands in SM. Engaging in personal communication with a cordial tone of voice may not be equally beneficial to all brands in social media. High-status luxury brands may prefer a more distant CS to preserve their exclusive image (Dion and Arnould 2011). For instance, Ward and Dahl (2014) show that condescending behavior among sales personnel in a luxury store increases consumers' regard for and willingness to pay for a brand.

Hypothesis 1: In SM, high-status brands use a more socially distant CS as measured by a higher frequency of personal pronouns used compared with low-status brands.

Hypothesis 2: In SM, consumers infer a higher brand status from a socially distant CS than from a socially close CS.

Hypothesis 3: Brand status moderates the effect of a brand's CS on customers' intention to like the brand's message in SM in such a way that high-status brands benefit less from a socially close CS and more from a socially distant CS than low-status brands do.

In Study 1, we classified 67 luxury or non-luxury fashion brands with a pretest among 228 students and collected up to 1,000 tweets for each of them. We used Craig's Zeta formula (Craig and Kinney 2009) to calculate sets of marker words and anti-marker words between luxury and non-luxury tests by splitting them into equally sized sections and comparing the frequency of specific words in each section. We find that non-luxury brands use *you(r)*, *we*, and *our* substantially more often than do luxury brands. Luxury brands tend to use prepositions such as *from* or *by* more often, which indicates that they rather use their brand name (e.g., "the new dress by Chanel") than personal pronouns (e.g., "our new dress") when tweeting about their products/activities.

In Study 2 we manipulated socially close and distant versions of 12 sample tweets. We used the first version of the German translation of you – Du – to manipulate a socially close and the more formal Sie to manipulate a socially distant CS. This manipulation of communication styles in SM has already been used in research (e.g., Steinmann et al. 2015). Participants received the socially distant (Sie) or the socially close (Du) version of each tweet. The content was counter-balanced. For each tweet, we asked participants to indicate the perceived status of the fashion brand and to rate the CS used. We reached a total of 167 (participants) x 12 (tweets) = 2,004 responses to tweets. We used a mixed model approach that treats both participants and stimuli (i.e., tweets) as random. We find a significant main effect of CS on status inference $\chi^2(1)=4.67$, p = .031) such that tweets with a more distant CS were associated with a more luxurious brand status.

In Study 3 we used a 2 (socially close versus socially distant CS) x 2 (high vs. low brand status) between-subjects design and a fictitious fashion brand, named Acadu. We presented Acadu as a high (low)-status brand by using expressions associated with luxury (non-luxury). We used *you* and *we* several times in the socially close condition and replaced them with *from Acadu, by Acadu, the*, and infinitives in the distant condition. We showed participants 12 tweets and asked them to indicate their intention to like the tweet on Twitter and their status perception of Acadu. We reached 315 (participants) x 12 (tweets) = 3,780 responses to tweets. Results reveal a significant interaction effect of CS and the brand status on customers' intention to like a tweet ($\chi^2(1)=3.32$, p = .068). For low-status brands, tweets with a more close CS show higher like intentions ($M_{distant}$ = 3.08 vs. M_{close} = 3.20, z = 2.61, p = .009). Customers' intention to like a tweet did not vary among close and distant CSs for high-status brands ($M_{distant}$ = 2.79 vs. M_{close} = 2.79, z = .02, p = .98).

Our work extends research on brand linguistics (Carnevale, Luna, and Lerma 2017). We show that luxury and non-luxury brand communicate differently in SM. Given that customers recognize different CS in SM and associate them with different brand status levels, the CS is a powerful brand positioning tool in SM. Furthermore, we show that using a socially distant CS in a very close medium such as SM does not harm high-status brands. Thus, we critically reflect on the widely held belief that SM communication has to adhere to the norms of informal and personal communication and give insights to luxury brands on how to use SM without jeopardizing their image.

REFERENCES

Burrows, J. (2006). All the way through: testing for authorship in different frequency strata. *Literary and Linguistic Computing*, *22*(1), 27-47.

Carnevale, M., Luna, D., & Lerman, D. (2017). Brand linguistics: A theory-driven framework for the study of language in branding. International Journal of Research in Marketing, 34(2), 572-591.

Craig, H. and Kinney, A.F. (2009), *Shakespeare, computers, and the mystery of authorship*, Cambridge University Press, Cambridge, UK.

Dion, D., & Arnould, E. (2011). Retail luxury strategy: assembling charisma through art and magic. *Journal of Retailing*, *87*(4), 502-520.

Labrecque, L. I. (2014). Fostering consumer–brand relationships in social media environments: The role of parasocial interaction. *Journal of Interactive Marketing*, 28(2), 134-148.

Quach, S. & Thaichon, P. (2017). From connoisseur luxury to mass luxury: Value co-creation and co-destruction in the online environment. *Journal of Business Research*, 81, 163-172.

Sela, A., Wheeler, S. C., & Sarial-Abi, G. (2012). We are not the same as you and I: Causal effects of minor language variations on consumers' attitudes toward brands. *Journal of Consumer Research*, *39*(3), 644-661.

Steinmann, S., Mau, G., & Schramm-Klein, H. (2015). Brand communication success in online consumption communities: An experimental analysis of the effects of communication style and brand pictorial representation. Psychology & Marketing, 32(3), 356-371.

Ward, M. K., & Dahl, D. W. (2014). Should the devil sell Prada? Retail rejection increases aspiring consumers' desire for the brand. *Journal of Consumer Research*, *41*(3), 590-609.

Consumers Going Green Online: How Online Shopping Stimulates Sustainable Food Consumption

Svetlana Kolesova, Stockholm School of Economics, Sweden
Emelie Fröberg, Stockholm School of Economics, Sweden
Sara Rosengren, Stockholm School of Economics, Sweden

EXTENDED ABSTRACT

With the growing concerns about sustainability and the simultaneous growth of available sustainable alternatives, consumers frequently choose products with at least one environmental attribute even if they are not deliberately intending to purchase one (Tezer and Bodur 2019). Retailers and manufacturers are actively seeking new ways to engage consumers in sustainable consumption. However, even though sales of organic products are growing, the market share of sustainable products varies substantively across categories (Juhl et al. 2017). Considerably low demand for sustainable products and barriers for future growth might be partly explained by a large price premium over other products (Van Doorn and Verhoef 2015). There is also an attitude-behavior gap in the context of sustainable consumption, where ethical intentions are not aligned with actual behaviors (Carrington, Neville, and Whitwell 2014).

At the same time consumers in a search of more convenient and time-effective shopping have started to utilize online channels, even for their routine grocery shopping. Online shopping unlocks potential for consumers to benefit from shopping in several channels simultaneously and satisfy different consumer needs, but also generate more loyalty and profit to the retailers (Melis et al. 2016). With the switch between channels, consumers are likely to change their purchase behavior. Such, online grocery shopping is characterized by choosing fewer vices (Huyghe et al. 2016), more bulky and heavy (Chintagunta, Chu, and Cebollada 2014), less sensory products (Campo and Breulmans 2015) in consumer baskets, and by lower price sensitivity (Degeratu, Rangaswamy, and Wu 2000). Despite the extensive literature on sustainable consumption, previous research did not investigate if sustainable consumption could be enhanced when consumers switch from offline channel shopping to online or multichannel shopping.

We argue that sustainable consumption is driven by utilitarian goals since consumers are motivated to choose sustainable products due to their environmental and health benefits (Bezawada and Pauwels 2013, Van Doorn and Verhoef 2015). Online shopping also offers mainly utilitarian benefits such as search convenience, information availability, speed of delivery (Cervellon, Sylvie, and Ngobo 2015). We propose that the compatibility of goal orientation would impact consumer choices of sustainable products. Specifically, we thus argue that sustainable consumption is driven by utilitarian goals, which are more congruent with online shopping. If our proposal is accurate, actual online shopping behavior should be more sustainable than offline shopping behavior.

We use point-of-sales data from loyalty cards for a Nordic grocery retailer. The data come from one hypermarket in a mid-sized city and the online store of the same hypermarket. We use a period of two years in total (March 16, 2014 - March 15, 2016), where the online channel was introduced on March 16, 2015.

For the analysis, we use a difference-in-difference (DID) estimation approach combined with propensity score matching. Employing difference-in-difference approach allows us to isolate the effect of adding an online channel to the existing offline channel by using a quasi-experiment. Specifically, this approach employs a pre-period (before the online channel introduction) versus post-period (after the online channel introduction) and control versus treatment household groups, that allows excluding other explanation to differences in the shopping behavior such as that household who start purchasing online (further "online households") are different in various behavioral and social characteristics compared to those who shop only offline ("offline households"). We also conducted additional analysis employing propensity score matching, which is a common technique in consumer and marketing research to reduce the selection bias and address possible confounding (Wang, Malthouse, and Krishnamurthi 2015). We match 400 pairs of online and offline households based on Euclidean distances of propensity scores that we estimate using logistic regression with independent variables Recency, Frequency, Monetary values (cf. McCarty and Hastak 2007), Volume (cf. Hernant and Rosengren 2017), and Distance to offline store (cf. Pozzi 2013).

Comparing online and offline behavior, we observe that online consumers overall tend to buy relatively more sustainable grocery products ($\beta = 3.74$, $p < .01$). However, there is also a positive effect of online channel introduction on sustainable purchase behavior of online households (DID estimator) ($\beta = 2.38$, $p < .01$). Even after employing propensity score matching to analyze only similar online and offline household, the DID estimator is still positive and statistically significant, demonstrating that households when shopping online have 2.87% larger share of sustainable product in total sales ($\beta = 2.87$, $p < .05$) compared to matched offline households.

Our study shows that consumers who start shopping for groceries online from the same retailer they have shopped before, purchase a larger share of sustainable products compared to consumers who continue shopping only offline from the same retailer. This effect even holds when we address selection bias and analyze similar online and offline households, providing evidence that the online channel stimulates sustainable consumption among consumers. We suggest that this effect is explained by the compatibility of goal orientations. When consumers have more utilitarian goal orientation, they choose products that have more utilitarian benefits, such that when consumers shop online, they choose more sustainable products compared to when they shop offline.

The present study makes several research contributions. We extend the understanding of sustainable consumption by providing evidence that online shopping channel can be used effectively to stimulate sustainable consumption. Moreover, we contribute to the literature on multichannel retailing by demonstrating further differences in consumer behavior online and offline. Our data provide us with a natural experimental setting because we can trace precisely when the retailer introduced an online channel and consumers started purchasing online. Our results are important not only for the retailers and manufacturers but also for non-profit and governmental organizations because the study demonstrates that the digitalization of retailing stimulates sustainable consumption.

REFERENCES

Bezawada, Ram and Koen Pauwels (2013), "What Is Special about Marketing Organic Products? How Organic Assortment, Price, and Promotions Drive Retailer Performance," *Journal of Marketing*, 77 (1), 31–51.

Campo, Katia and Els Breugelmans (2015), "Buying Groceries in Brick and Click Stores: Category Allocation Decisions and the Moderating Effect of Online Buying Experience," *Journal of Interactive Marketing*, 31 (August), 63–78.

Carrington, Michal J., Benjamin A. Neville, and Gregory J. Whitwell (2014), "Lost in Translation: Exploring the Ethical Consumer Intention–Behavior Gap," *Journal of Business Research*, 67 (1), 2759–67.

Cervellon, Marie-Cécile, Jean Sylvie, and Paul-Valentin Ngobo (2015), "Shopping Orientations as Antecedents to Channel Choice in the French Grocery Multichannel Landscape," *Journal of Retailing and Consumer Services*, 27 (November), 31–51.

Chintagunta, Pradeep K., Junhong Chu, and Javier Cebollada (2012), "Quantifying Transaction Costs in Online/Off-Line Grocery Channel Choice," *Marketing Science*, 31 (1), 96–114.

Degeratu, Alexandru M., Arvind Rangaswamy, and Jianan Wu (2000), "Consumer Choice Behavior in Online and Traditional Supermarkets: The Effects of Brand Name, Price, and Other Search Attributes," *International Journal of Research in Marketing*, 17 (1), 55–78.

Hernant, Mikael and Sara Rosengren (2017), "Now What? Evaluating the Sales Effects of Introducing an Online Store," *Journal of Retailing and Consumer Services*, 39 (November), 305–13.

Huyghe, Elke, Julie Verstraeten, Maggie Geuens, and Anneleen Van Kerckhove (2017), "Clicks as a Healthy Alternative to Bricks: How Online Grocery Shopping Reduces Vice Purchases," *Journal of Marketing Research*, 54 (1), 61–74.

Juhl, Hans Jørn, Morten H. J. Fenger, and John Thøgersen (2017), "Will the Consistent Organic Food Consumer Step Forward? An Empirical Analysis," *Journal of Consumer Research*, 44 (3), 519–35.

McCarty, John A. and Manoj Hastak (2007), "Segmentation Approaches in Data-Mining: A Comparison of RFM, CHAID, and Logistic Regression," *Journal of Business Research*, 60 (6), 656–62.

Melis, Kristina, Katia Campo, Lien Lamey, and Els Breugelmans (2016), "A Bigger Slice of the Multichannel Grocery Pie: When Does Consumers' Online Channel Use Expand Retailers' Share of Wallet?," *Journal of Retailing*, 92 (3), 268–86.

Pozzi, Andrea (2013), "The Effect of Internet Distribution on Brick-and-Mortar Sales," *The RAND Journal of Economics*, 44 (3), John Wiley & Sons, Ltd, 569–83.

Tezer, Ali and H Onur Bodur (2019), "The Greenconsumption Effect: How Using Green Products Improves Consumption Experience," *Journal of Consumer Research*, 47 (1), 25-39.

Van Doorn, Jenny and Peter C. Verhoef (2015), "Drivers of and Barriers to Organic Purchase Behavior," *Journal of Retailing*, 91 (3), 436–50, doi:10.1016/j.jretai.2015.02.003.

Wang, Rebecca Jen-Hui, Edward C. Malthouse, and Lakshman Krishnamurthi (2015), "On the Go: How Mobile Shopping Affects Customer Purchase Behavior," *Journal of Retailing*, 91 (2), 217–34.

Familiar Foreigners? Collective Consumer Identity (De)Legitimation Dynamics in the Case of Repatriate Migrants

Sonja N. Kralj, University of Augsburg Michael Paul, University of Augsburg, Germany

EXTENDED ABSTRACT

Recently, countries all over the world have begun to invite emigrants to return to their home countries, motivated to counter shrinking populations, by labor shortage or the wish to reunite their people. Because of the favorable starting position vis-à-vis other migrants, one would expect that these returnees adapt easily to the consumer culture back home and will be seamlessly accepted. However, exploring the case of ethnic German repatriates from the former Soviet Union – in whose case consumption was operationalized as a legitimacy criterion –, we found out that their public collective consumer identity is rather negative instead. How did these Germans become Russians in the public view? In order to examine this phenomenon, we ask the following research questions. Which forces and dynamics are involved in the co-construction of the collective consumer identity of repatriates? What is the role of consumption and markets in this process? Addressing these questions, we illuminate the dynamic co-construction of migrants' collective consumer identity.

Most scholars have studied one-way, permanent migration from home to host country, much less is known about other migration patterns such as return migration and reacculturation in the homeland (Ndione, Rémy, and Bah 2017). Moreover, extant consumer acculturation literature has increasingly moved from investigating consumers' individual- level experiences and outcomes (Peñaloza 1994) to exploring relational (Luedicke 2015), structural (Üstüner and Holt 2007), and institutional influences (Veresiu and Giesler 2018).

The latter have been portrayed as internally conflict-free, patterning consumer experience (Üstüner and Holt 2007) or prescribing and enacting a consumer identity without granting migrants much influence in shaping it (Veresiu and Giesler 2018). Theoretically, we build on legitimation and delegitimation, the process of granting or withdrawing legitimacy (Suddaby, Bitektine, and Haack 2017). According to Berger and Luckmann (1966), legitimation entails both cognitive explanation and normative justification, and may be given regulatively through laws and regulations (Scott 2001). Delegitimation is not just the withdrawal of legitimacy, but may also be associated with stigmatization (Suddaby et al. 2017). Other than existing literature, we focus solely on the macro-level co-construction of collective consumer identity in a deeply history-laden case of initially highly legitimate migrants, and find out that institutional forces may actually be contradictory in their ways of co-constructing migrants' collective identity.

Our concrete context is the repatriate migration of ethnic Germans from the former Soviet Union, who lived in the diaspora for generations since 1763, returned from 1951 on and who nowadays constitute the second largest group of people with migration background in Germany (Federal Statistical Office 2019). Our ethnography contains triangulated interview, field, archival, and netnographic data. We conducted 56 interviews in total with repatriate and indigenous consumers as well as institutional representatives. Field data include 551 photographs and videos taken during observations in the marketplace and at events.

Archival data include 197 newspaper articles, 13 court judgments as well as 259 documents representing policy-making and repatriate istitutiojnal work, such as speeches. Netnographic data currently includes 12 YouTube videos with 1,330 comments. Data have been analyzed in an interative process, adhering to Thompson's (1997) principles.

The four key forces we identified are policy-making, market exchange, repatriate institutional work, and repatriate consumer practices. All of them both legitimize and delegitimize repatriate consumers in the collective identity co-constitution trajectory.

Delegitimation dominates these dynamics, as we found much evidence of stigmatization.

Thus, the broader societal identity ascribed to repatriates is polysemic at best, and outright negative at worst.

Policy-making has granted high regulative legitimacy to repatriates in the form of immediate German citizenship and various financial benefits. Remarkably, the state operationalized consumption as a legitimacy criterion: only in case Germans had consumed in a specific way in the former Soviet Union and its successor states (for instance cooking German meals and celebrating German traditions) and formulated these consumption habits during the application process, they counted as 'proof of Germanness' and the migrants were allowed to repatriate. At the same time, this legitimation was delegitimizing, since the state legitimized a version of German consumer culture from 250 years ago, as the consumer culture had not developed much over time in the German diaspora communities. In terms of market exchange, repatriate consumers were suddenly able to participate in the market (in contrast to the Soviet socialist system), but they lacked appropriate market skills. Because of this, they were exploited by sly salesmen, as insurance agent Fabian (40) confirms: "People exploited them, definitely. Cancellation policies and liabilities were different back then, and another sales mentality prevailed. There was a real gold-digger atmosphere in the industry." Repatriate institutional work takes both the form of legitimizing attempts at integration as well as delegitimizing fragmentation. One association's traveling exhibition "shows with which firmness and fidelity they maintained their faith, their customs and traditions" (Landsmannschaft der Deutschen aus Russland e.V. 2016, p. 3), in contrast, many associations were founded which already in their name convey a Russian or Russian-speaking orientation. Lastly, repatriates' consumption practices may legitimize the migrant group predominantly in an online environment, as they advanced a youth subculture celebrating a specific Russian-oriented aesthetic. In contrast, their consumption practices have conveyed traditional values, as former social planner Karl described them as "very modest, they meticulously spent as little money as possible for groceries, Aldi [a German discounter] made money out of them."

Our paper extends consumer acculturation literature. First, we study an underresearched migration pattern which incorporates an important historical dimension (Ger et al. 2018), as repatriates' migration history stretches over centuries. Second, similar to Veresiu and Giesler (2018), our forces create a consumer subject, but we acknowledge migrant consumer practices are important in shaping migrant consumer identity as well.

Furthermore, Veresiu and Giesler's (2018) forces only work in one direction, namely legitimizing the migrant as "other." In contrast, our forces work in both directions. This way we uncover that institutions are actually inconsistent. Therefore, we may be blunt and say that not just migrants, but also institutional forces may have a "shattered identity" (Üstüner and Holt 2007).

REFERENCES

Berger, Peter L. and Thomas Luckmann (1966), *The Social Construction of Reality. A Treatise in the Sociology of Knowledge.* New York, NY: Doubleday.

Federal Statistical Office (2019), Bevölkerung und Erwerbstätigkeit. *Bevölkerung mit Migrationshintergrund – Ergebnisse des Mikrozensus 2018*, Wiesbaden: Federal Statistical Office.

Ger, Güliz, Eminegül Karababa, Alev Kuruoğlu, Meltem Türe, Tuba Üstüner, and Baskin Yenicioğlu (2018), "Debunking the Myths of Global Consumer Culture Literature," in *The Sage Handbook of Consumer Culture*, ed. Olga Kravets, Pauline Maclaran, Steven Miles, and Alladi Venkatesh, Thousand Oaks, CA: Sage, 79–101.

Landsmannschaft der Deutschen aus Russland e.V. (2016), *Deutsche aus Russland. Gestern und heute*. Stuttgart: W. Kohlhammer.

Luedicke, Marius K. (2015), "Indigenes' Responses to Immigrants' Consumer Acculturation: A Relational Configuration Analysis," *Journal of Consumer Research*, 42 (1), 109-129.

Ndione, Louis C., Eric Rémy, E., and Thierno Bah (2017), "Ethnicity, Consumption and Return Visits to the Home Country: The Case of the Senegalese Venants," *Recherche et Applications en Marketing* (English Edition), 32 (4), 53-71.

Peñaloza, Lisa (1994), "Atravesando Fronteras/Border Crossings: A Critical Ethnographic Exploration of the Consumer Acculturation of Mexican Immigrants," *Journal of Consumer Research*, 21 (1), 32–54.

Scott, W. Richard (2001), *Institutions and Organizations*, Thousand Oaks, CA: Sage Publications, Inc.

Suddaby, Roy, Alex Bitektine, and Patrick Haack (2017), "Legitimacy," *Academy of Management Annals*, 11 (1), 451–478.

Thompson, Craig (1997), "Interpreting Consumers: A Hermeneutical Framework for Deriving Marketing Insights from the Texts of Consumers' Consumption Stories," *Journal of Marketing Research*, 34 (4), 438–455.

Üstüner, Tuba and Douglas B. Holt (2007), "Dominated Consumer Acculturation: The Social Construction of Poor Migrant Women's Consumer Identity Projects in a Turkish Squatter," *Journal of Consumer Research*, 34 (1), 41–56.

Veresiu, Ela and Markus Giesler (2018), "Beyond Acculturation: Multiculturalism and the Institutional Shaping of an Ethnic Consumer Subject," *Journal of Consumer Research*, 45 (3), 553–570.

iGoofed: How Consumers Assign Blame in Response to AI Accidents

Rebecca J. Krause-Galoni, Northwestern University, USA
Derek Rucker, Northwestern University, USA
Aparna A. Labroo, Northwestern University, USA

EXTENDED ABSTRACT

With the rise in viability of artificially intelligent (AI) technology, it is increasingly important to understand whether blame responses differ for AI agents versus humans. We demonstrate a "blame penalty:" people assign *more* blame to AI agents than humans for accidents due to differences in the counterfactuals consumers generate.

Blame assigned following an accident depends whether the agent *could have prevented* the accident (Alicke 2000). One signal of this is the generation of counterfactuals, or simulated versions of a past sequence of events in which some aspect of the sequence is altered, changing the outcome (Roese 1997). Generating a counterfactual about an agent can influence how blameworthy the agent seems (Creyer and Gürhan 1997; Wells and Gavanski 1989). For example, an individual who experiences a car accident might generate a counterfactual that it would have been avoided if the other driver had not been drunk, resulting in blame towards the drunk driver.

Consumers generate more counterfactuals when expected norms are violated (Byrne 2002; Roese 1997; Sanna and Turley 1996). Despite their recent growth, AI agents represent a departure from the norm. Therefore, we propose consumers generate more counterfactuals that an accident could have been avoided when it involves an AI agent than a human, and accordingly assign more blame.

Across four studies, including six weeks of Twitter data, we find evidence for the blame penalty of AI agents over humans after accidents due to counterfactuals. We also reveal when brands are instead blamed *less* for AI agent accidents. Specifically, when *perceived intent* (Alicke 2000; Malle, Guglielmo, and Monroe 2014) comes into play, humans are blamed more because AI agents are less capable of intention (Haslam 2006; Young and Monroe 2019).

Study 1

Method. Over 6 weeks, we scraped Twitter for posts related to accidents involving artificially intelligent (581 tweets) or human (7000 tweets) drivers and examined differences in blame-related language. We analyzed blame-related words in each Tweet based on a dictionary we created and validated (Humphreys 2010).

Results. Among the AI agent group, 53.5% of tweets contained blame-related content, compared to only 1.1% of non-AI tweets. A logistic regression revealed a significant effect of group on blame content: AI tweets were more likely to contain blame content than non-AI tweets ($B = 4.67$, $SE = 0.14$, $z = 32.68$, $p < .001$, 95% Confidence Interval (CI): [4.39, 4.95]).

Study 2

Method. In study 2 (N = 174 MTurkers, M_{age} = 35.2, 48.1% Female) participants read a mockup newspaper article that described a pedestrian killed in an accident with a [human/ AI/ not specified] Singlecorp truck driver. Participants answered the extent to which Singlecorp's driver was to blame for the accident and the level of punishment and punitive damages Singlecorp should receive (from Schkade, Sunstein, and Kahneman 2000).

Results. One-way ANOVAs revealed the AI was blamed more than the human or control condition agent ($F(2, 170) = 6.77$, $p = .001$, $\eta_p^2 = .074$); the AI agent's brand was punished more than the human or control agents' ($F(2, 171) = 11.53$, $p < .001$, $\eta_p^2 = .119$); and the AI agent's brand was charged more punitive damages than

the human or control agents' brands ($F(2, 125) = 5.00$, $p = .008$, $\eta_p^2 = .074$, see Table).

Study 3

Method. Study 3 (N=222 MTurkers, M_{age} = 35.4, 48.6% Female, preregistered on AsPredicted.org) tested for our proposed counterfactual generation process. Participants saw the same mockup news articles, answered the same questions about blame and punishment as in study 2, and listed their thoughts while making the decisions, rating these thoughts for counterfactual content.

Results. AI agents and their brands were blamed ($F(2, 218) = 3.95$, $p = .021$, $\eta_p^2 = .035$), punished ($F(2, 219) = 12.94$, $p < .001$, $\eta_p^2 = .106$), and charged ($F(2, 219) = 13.59$, $p < .001$, $\eta_p^2 = .110$) more than humans (see Table). A mediation analysis using the PROCESS macro (model 4) in SPSS with 5,000 bootstrapped samples (Hayes 2013) with agent type (AI vs. human) as the independent variable, standardized blame as the dependent variable, and standardized counterfactual rating as the mediator revealed a significant indirect effect (B = 0.14, SE = 0.06, 95% CI = [0.04, 0.28]) such that counterfactuals mediated the effects of agent on blame.

Study 4

Method. Study 4 (N = 177 MTurkers, M_{age} = 33.8, 47.5% Female, Preregistered on AsPredicted.org) tested whether AI agents would be blamed *less* than humans when intentions were ambiguous. Participants were told the family of a boy named Andy was suing a (human vs. AI) cleaning company after Andy sustained an injury. In all conditions, participants read the housekeeper sprayed cleaning fluid, which hit Andy in the eyes and caused his injuries. In the control condition, Andy pops up in front of the housekeeper's spray nozzle just as she/it is about to spray, leaving little ability to avoid the accident. In the ambiguous intent condition, Andy is being annoying and the woman [AI agent] turns and sprays him after a delay.

Results. Two-way ANOVAs showed significant interactions between agent condition (AI vs. human) and intent ambiguity condition (control vs. ambiguous) in predicting agent blame ($F(1, 172) = 29.66$, $p < .001$, $\eta_p^2 = .147$), brand punishment ($F(1, 172) = 11.01$, $p = .001$, $\eta_p^2 = .060$), and log-transformed punitive damages ($F(1, 170) = 8.33$, $p = .004$, $\eta_p^2 = .047$). AI agents were punished more in the control condition, but humans were punished more when intent was ambiguous (see Table).

Discussion

This research enriches the literature on blame, demonstrating when consumers blame AI agents differently than humans. AI agents suffer a "blame penalty" because they elicit certain counterfactuals from consumers. Our Twitter data show a real-world incidence of greater blame in tweets about accidents involving AI rather than human drivers. Understanding the psychology of the response to such accidents, and particularly interventions such as those explored in study 4 which can reverse the blame penalty for AI agents, can help brands manage the consumer response to AI.

REFERENCES

Alicke, Mark D. 2000. "Culpable Control and the Psychology of Blame." *Psychological Bulletin* 126 (4): 556–74. doi:10.1037/0033-2909.126.4.556.

Byrne, Ruth M.J. 2002. "Mental Models and Counterfactual Thoughts about What Might Have Been." *Trends in Cognitive Sciences* 6 (10): 426–31. file:///C:/Users/hhtan/AppData/Local/ Mendeley Ltd./Mendeley Desktop/Downloaded/Byrne - 2002 - Mental models and counterfactual thoughts about what might have been.pdf.

Castelo, Noah, Maarten W. Bos, and Donald R. Lehmann. 2019. "Task-Dependent Algorithm Aversion." *Journal of Marketing Research* 56 (5): 809–25. doi:10.1177/0022243719851788.

Creyer, Elizabeth H., and Zeynep Gürhan. 1997. "Who's to Blame? Counterfactual Reasoning and the Assignment of Blame." *Psychology and Marketing* 14 (3): 209–22. doi:10.1002/ (SICI)1520-6793(199705)14:3<209::AID-MAR1>3.0.CO;2-F.

Davies, Alex. 2018. "The WIRED Guide to Self-Driving Cars." *Wired*.

Haslam, Nick. 2006. "Dehumanization: An Integrative Review." *Personal and Social Psychology Review* 10 (214): 214–34. doi:10.1207/s15327957pspr1003.

Hayes, Andrew F. 2013. "Model Templates for PROCESS for SPSS and SAS."

Humphreys, Ashlee. 2010. "Megamarketing: The Creation of Markets as a Social Process." *Journal of Marketing* 74 (March): 1–19.

Krisher, Tom. 2018. "Self-Driving Uber Car Saw Pedestrian but Didn't Brake, Causing Fatal Accident: Report." *Global News*.

Levin, Sam. 2018. "'Uber Should Be Shut down': Friends of Self-Driving Car Crash Victim Seek Justice." *The Guardian*. https://www.theguardian.com/technology/2018/mar/20/uber-self-driving-car-crash-death-arizona-elaine-herzberg.

Longoni, Chiara, Andrea Bonezzi, and Carey K Morewedge. 2019. "Resistance to Medical Artificial Intelligence." *Journal of Consumer Research* 46. doi:10.1093/jcr/ucz013.

Malle, Bertram F., Steve Guglielmo, and Andrew E. Monroe. 2014. "A Theory of Blame." *Psychological Inquiry* 25 (2): 147–86. doi:10.1080/1047840X.2014.877340.

Malle, Bertram F., Matthias Scheutz, Thomas Arnold, John Voiklis, and Corey Cusimano. 2015. "Sacrifice One for the Good of Many?: People Apply Different Moral Norms to Human and Robot Agents." In *The Tenth Annual ACM/IEEE International Conference on Human-Robot Interaction,* 117–24. doi:10.1145/2696454.2696458.

Roese, Neal J. 1997. "Counterfactual Thinking." *Psychological Bulletin* 121 (1): 133–48. doi:10.1037/0033-2909.121.1.133.

Sanna, Lawrence J., and Kandi Jo Turley. 1996. "Antecedents to Spontaneous Counterfactual Thinking: Effects of Expectancy Violation and Outcome Valence." *Personality and Social Psychology Bulletin* 22 (9).

Schkade, David, Cass R. Sunstein, and Daniel Kahneman. 2000. "Deliberating about Dollars: The Severity Shift." *Columbia Law Review* 100 (4): 1150.

Wells, Gary L., and Igor Gavanski. 1989. "Mental Simulation of Causality." *Journal of Personality and Social Psychology* 56 (2): 161–69. doi:10.1037/0022-3514.56.2.161.

Young, April D., and Andrew E. Monroe. 2019. "Autonomous Morals: Inferences of Mind Predict Acceptance of AI Behavior in Sacrificial Moral Dilemmas." *Journal of Experimental Social Psychology* 85 (July). doi:10.1016/j.jesp.2019.103870.

Multi-Sensory Experiences in Retail Service Environments

Nina Krey, Rowan University, USA
Barry J. Babin, University of Mississippi, USA
Shuang Wu, Rowan University, USA
Karine Picot-Coupey, University of Rennes, France

EXTENDED ABSTRACT

The study of sensation in marketing contributes to the understanding of relationships between the intersection of consumer psychology, retail environments, and sensation in consumption (Bitner 1992; Krishna 2012). Sensations are inescapable in consumption and drive affective, cognitive, and physiological responses (e.g., Holbrook 1986). However, the explicit reference to the term "sensation" has become more aligned with *sensational* in the marketing literature. Thus, the literature lacks a way of accounting for consumers' varying sensitivities to sensations driven by retail or services environment. The contribution of this research is to explicate theoretically, and present a way operationally, to measure the construct of consumer need for sensation.

Within marketing studies, sensation appears loosely applied and consequently researchers incorporate diverse constructs under the sensation umbrella. In addition, common approaches focus on assessing sensory cues and stimulation of individual senses rather than sensation in unison (Spence et al. 2014). Yet a holistic consumer experience with multi-sensory inputs can create greater value for customers (Krishna, Cian, and Aydınoğlu 2017). Multiple studies support this holistic assessment of environments (e.g., Mattila and Wirtz 2001; Spence et al. 2014). However, while research acknowledges the importance of holistic perceptions of environments and products, the majority of studies still focus on individual senses or single sensory modalities (Coulter and Chowdhury 2006). Consequently, these theoretical underpinnings of multi-sensory research are also evident in sensation measures.

Existing instruments assessing sensational experiences remain closely related to risky behavior (Mehrabian and Russell 1974; Roth, Hammelstein, and Brahler 2007; Zuckerman 1990). While need for touch (NFT) does assess a person's preference for tactile information, it is limited to one sense (Peck and Childers 2003). While the Cross-Sensory Heterogeneity Index (CSHI) acknowledges different senses, its applicability is limited to sensory imagery. Lastly, the Sensory-Processing Sensitivity (SPS) tool captures neurological predispositions making it challenging to administer in survey research. Therefore, no current instrument captures sensation as the biochemical process of sensory stimulation. Furthermore, none of the scales appropriately reflect multi-sensory aspects of consumer sensation.

Therefore, this research follows well-established scale development procedures appropriate for multi-item measures including a comprehensive literature review and qualitative research (Churchill 1979; Gerbing and Anderson 1988). Study 1 generates preliminary scale items via focus group interviews on perceived sensitivity to sensory stimulation and importance of multi-sensory cues in environments (Zeithaml 1988). Results of the focus group interviews identify the importance of source of sensation, ambient scent, and crowding during consumption experiences. Multiple themes emerge about how sensations work in tandem, a focal sensation with supporting sensations, to help create a valuable consumer experience leading to a first pool of 70 initial scale items.

Study 2 first utilizes experts, who are marketing/sensory marketing academics, for item purification and then administers two online surveys for further item assessment. An examination of item distributions, item-total correlations, and communalities leaves a pool of 37 items. Study 3 assesses scale dimensionality of the 37 items with a US panel data (N = 224). Results confirm a two dimensional structure of Need for Sensation (NFS). Study 4 validates the dimensionality with confirmatory factor analysis (CFA) utilizing a new sample (N = 241). Results once again support the two-dimensional structure of NFS. Furthermore, nomological validity assessment confirms the relationship between NFS and established variables such as hedonic value, utilitarian value, and positive affect (Babin, Darden, and Griffin 1994; Hair et al. 2006; Mehrabian and Russell 1974).

This study takes on an exhaustive investigation of sensations contribution to value derived from consumption experiences. Multiple studies explore totality of sensation rather than sense-specific sensation. The key contribution of this research is the development of the NFS scale. NFS reflects an individual characteristic trait representing the tendency of consumers to utilize sensory stimulation to extract value from a consumption experience. The NFS scale encompasses two distinct dimension. Most importantly, instead of associating need for sensation with risky behavior, the new construct incorporates multi-sensory sensation experienced by consumers (e.g., Zuckerman 1990). As such, sensation is associated with incidental or every day sensation that individuals encounter during their daily routine. The new scale goes beyond the scope of traditional theoretical premises within marketing and psychology research by treating sensation holistically from all possible sources.

The present study provides an optimal starting point to further examine the impact of multi-sensory stimulation on consumer cognitive and behavioral responses. The NFS scale can be administered in future research to capture consumers' responses to multi-sensory cues in consumption environments and thus, contribute to the growing literature on multi-sensory marketing (Krishna, Cian, and Aydinoglu 2017). We lay out an agenda for future research involving the scale in understanding consumers' multisensory reactions to retail services environments.

REFERENCES

Babin, Barry J., William R. Darden, and Mitch Griffin (1994), "Work and/or Fun: Shopping Measuring Value Hedonic and Utilitarian," *Journal of Consumer Research*, 20 (4), 644–56.

Bitner, Mary Jo (1992), "Servicescapes: The Impact of Physical Surroundings on Customers and Employees," *Journal of Marketing*, 56 (2), 57–71.

Churchill, Gilbert A. (1979), "A Paradigm for Developing Better Measures of Marketing Constructs," *Journal of Marketing Research*, 16 (1), 64-73.

Coulter, Robin A. and Tilottama G. Chowdhury (2006), "Sensory Metaphor and Meanings: Development of a Cross-Sensory Heterogeneity Index.," *Advances in Consumer Research*, 33 (1), 453-54.

Gerbing, David W. and James C. Anderson (1988), "An Updated Paradigm for Scale Development Incorporating Unidimensionality and Its Assessment," *Journal of Marketing Research*, 25 (2), 186–92.

Hair, Joseph F., William C. Black, Barry J. Babin, and Rolph E. Anderson (2006), *Multivariate Data Analysis,* (6th ed.), Upper Saddle River, NJ: Prentice Hall.

Holbrook, Morris B. (1986), Emotion in the Consumption Experience: Toward a New Model of the Human Consumer, in *The Role of Affect in Consumer Behavior: Emerging Theories and Applications*, (ed.) Robert A. Peterson et al., Lexington, MA: Heath, 17-52.

Kaplan, Rachel and Stephen Kaplan (1989), *The Experience of Nature: A Psychological Perspective*, *Cambridge University Press*, (1ˢᵗ ed), New York, NY: Cambridge University Press.

Krishna, Aradhna (2012), "An Integrative Review of Sensory Marketing: Engaging the Senses to Affect Perception, Judgment and Behavior," *Journal of Consumer Psychology*, 22 (3), 332–51.

Krishna, Aradhna, Luca Cian, and Nilüfer Z. Aydınoğlu (2017), "Sensory Aspects of Package Design," *Journal of Retailing*, 93 (1), 43–54.

Mattila, Anna S. and Jochen Wirtz (2001), "Congruency of Scent and Music as a Driver of In-Store Evaluations and Behavior," *Journal of Retailing*, 77 (3), 273–89.

Mehrabian, Albert and James A Russell (1974), *An Approach to Environmental Psychology*, Cambridge, MA: Massachusetts Institute of Technology.

Peck, Joann and Terry L. Childers (2003), "Individual Differences in Haptic Information Processing: The 'Need for Touch' Scale," *Journal of Consumer Research*, 30 (3), 430–42.

Roth, Marcus, Philipp Hammelstein, and Elmar Brähler (2007), "Beyond a Youthful Behavior Style - Age and Sex Differences in Sensation Seeking Based on Need Theory," *Personality and Individual Differences*, 43 (7), 1839–50.

Spence, Charles, Nancy M. Puccinelli, Dhruv Grewal, and Anne L. Roggeveen (2014), "Store Atmospherics: A Multisensory Perspective," *Psychology and Marketing*, 31 (7), 472–88.

Zuckerman, Marvin (1990), "The Psychophysiology of Sensation Seeking," *Journal of Personality*, 58 (1), 314–45.

Zeithaml, Valarie A. (1988), "Consumer Perceptions of Price, Quality, and Value: A Means-End Model and Synthesis of Evidence," *Journal of Marketing*, 52 (3), 2–22.

The Future is Fleeting: How Ephemeral Brand Messages Impact Viewing Behavior

Aradhna Krishna, University of Michigan, USA
Ryan Elder, Brigham Young University, USA
Yeonjin Sung, University of Michigan, USA

EXTENDED ABSTRACT

Ephemeral messaging service, such as Snapchat and Instagram stories, allows consumers to send messages that disappear within a specified time after they are opened (Bayer et al. 2016). Our research arises from the observation that ephemerality introduces a new type of time limit. The traditional notion of a time limitation is through a deadline which refers to "until when one can avail of something"; in the messaging context, it means till one can avail of or read the message. Ephemeral messages break up the traditional time limitation into two phases: phase 1 ("opening time")—which is the time from receiving the message to opening it, and phase 2 ("seeing time")—which is the time from opening the message to the time one stops seeing it.

Phase 1 could have a time limit, but this is typically very long for ephemeral messages; phase 2, by definition, has a time limit (or ephemerality) where the ephemeral message is self-destroyed, and this is generally quite short. For example, while the maximum duration Snapchat allows for the viewing time of its disappearing messages is 10 seconds (phase 2 time limit or ephemerality), the messages can remain on the server for up to 30 days if they are not opened (phase 1 time limit; Snapchat Support 2018).

Despite the orthogonality of phase 1 ("opening time") and phase 2 ("seeing time"), we propose that ephemerality ("seeing time limit") impacts consumer decisions about "opening time", such that consumers choose to open more-ephemeral, faster disappearing, messages earlier than less-ephemeral, slower disappearing messages—behaving as if ephemeral messages have a shorter deadline for being opened when in fact they do not. Furthermore, we propose that this effect of the "seeing time limit" impacting "opening time" (ephemerality-urgency effect) is just an operationalization of the sense of urgency that "seeing time limit" (or ephemerality) creates.

Research on time limitation focuses on the traditional notion of deadlines. This type of time restriction has been shown to provide benefits to the marketers as it drives action towards their offerings. Inman, Peter, and Raghubir (1997) show, for example, that time restrictions on a deal tend to signal good value and thus increase purchase likelihood because of scarcity. In a similar vein, the immediacy of anticipatory regret prompts consumers to redeem a coupon as a coupon's expiration date (or time limit) approaches (Inman and McAlister 1994).

Time limits are closely linked to time pressure since time limits can induce time pressure if they lead to a feeling of stress in the individual (Ordonez and Benson 1997). Within a decision-making context, time pressure can cause individuals to more quickly and selectively process information (Payne, Bettman, and Johnson 1988). Individuals under time pressure are also more likely to choose versus defer choice (Dhar and Nowlis 1999).

Perception of time, however, is malleable, and people can feel more time pressure or urgency if they perceive themselves to have less time. Tu and Soman (2014) showed that when participants were asked to complete a task in 5 days ending in the present month, or 5 days ending in the next month, those in the former group initiated the task earlier. The results can be explained by participants in the "present month" feeling more time pressure, even though rationally the time was the same—the urgency was created through calendar categorization. A different mere urgency effect has been shown by

Zhu, Yang, and Hsee (2018), who demonstrate that people prefer to work on low-payoff tasks over high-payoff tasks when the former are perceived to be spuriously urgent whereas the latter are not.

Since ephemeral messaging is fairly recent (Snapchat started in 2011, Instagram in 2016, and Facebook in 2017), there is scant academic literature on ephemerality. Prior research has shown that ephemeral (vs. permanent) messaging increases immersion in the present experiences by anchoring recipient's attention to the present context (He and Kivetz 2015). Furthermore, ephemerality (vs. permanence) can lead to greater disclosure risks by reducing privacy concerns of the sender (Hofstetter et al. 2017). These findings show the consequences of ephemerality on behavior and decision making. They focus on ephemeral versus permanent (i.e. non-ephemeral) messages. We extend these findings on the consequences of ephemerality to ad viewing behavior, and to low versus high ephemerality (i.e., changing the phase 2 time limit to be long versus short; in permanent ads phase 2 is limitless). We examine if the time limit of phase 2, the "seeing time" (i.e., the level of ephemerality), impacts ad viewing behavior, specifically if it can impact phase 1 ("opening time").

We propose that ads that will disappear faster (higher ephemerality) will be opened earlier than ads that disappear more slowly (lower ephemerality). Although the opening time and seeing time are orthogonal to one another, and one should not influence the other, we propose that the urgency created by higher ephemerality in phase 2 will create a feeling of urgency and lead to earlier opening of the ad in phase 1. Our mere urgency effect is similar to prior research on mere urgency that we have discussed—where calendar categorization of time duration to do a task can impact perceived urgency and task initiation (Tu and Soman 2014), and where spurious urgency through irrelevant expiration dates can move people to work on less important tasks over more important ones (Zhu et al. 2018). We propose the following ephemerality-urgency effect:

Hypothesis 1: *Higher ephemerality will lead to greater urgency.*

We also show a boundary condition for the ephemerality-urgency effect by examining perceived control and liquid consumption. Liquid consumption refers to temporary and dematerialized access to products, while solid consumption refers to permanent and tangible ownership of products (Bardhi and Eckhardt 2017). Atasoy and Morewedge (2018) demonstrate that people value physical goods over digital goods because they feel greater psychological ownership to the former, which stems from greater perceived control. In the ephemerality context too, the same process could be at work. Qualitative reports suggest that ephemeral (vs. permanent) messaging also reduces control on the recipient's side—since the recipient cannot possess or control the disappearing messages—while restoring feelings of control on the sender's side (Billings et al. 2017; Hofstetter et al. 2017).

In our context, people receive rather than send ephemeral messages and therefore feel lower control the more ephemeral the messages are. We also know that a lower feeling of control results in greater approach motivation because this is a means of coping by regaining control (Greenaway et al. 2015). In an ephemeral advertising context, approach motivation would be manifested in a sense of

urgency. Thus, higher ephemerality would result in lower perceived control and thereby higher urgency. If indeed this is the process for our ephemerality-urgency effect, the effect should be weaker for those who feel less control and thus are already inclined to approach and open the ads earlier.

Hypothesis 2:   The ephemerality-urgency effect will be attenuated for people who have less perceived control.

We test these hypotheses in eight studies. Study 1a tests the ephemerality-urgency effect using ad opening time as the dependent variable. Study 1b replicates the effect of study 1a, with a comprehension check for ephemerality. Study 2 tests the ephemerality-urgency effect using eye-tracking to capture initial attention. Study 3 uses stated perceived urgency as the dependent variable. Study 4 directly manipulates urgency to show a process through moderation. Study 5 tests for a boundary condition by exploring the role of perceived control on the ephemerality- urgency effect. Studies 6a and 6b test the ephemerality-urgency effect using choice as the dependent variable.

We start by looking at ephemeral ads presented in an online news website setting. Building on the notion that advertising is a form of message that firms send to their consumers, we examine whether consumers choose to see an advertisement earlier if it is more versus less ephemeral. From studies 1a to 5, participants were presented with a fictitious news website that had a banner advertisement. They were told to read the news and to click and view the advertisement. They read "Once you click on the advertisement, it will be available to view for 10 seconds (10 minutes) and then will disappear", in the high (low) ephemerality condition. When they clicked on the banner, participants could view the advertisement as long as they wanted, but within the maximum viewing time. After they finished seeing the ad, they could resume reading news articles. For time data in all studies, we analyze log-latencies (Robinson 2007) but report mean values in seconds to increase interpretability. We report results for only those who were correct on our manipulation check ("What was the maximum time you could view the advertisement?" Participants chose their response from the two options: 10 seconds or 10 minutes). Analyses including all participants did not change the direction and significance of all our results.

Study 1a (N=148) found that people in the high (vs. low) ephemerality condition clicked on the advertisement earlier (M_{High}=23.77 vs. M_{Low}=40.00; t(146)=−2.28, p=.024), supporting our hypothesis (H1). From study 1b on, we gave comprehension check questions before participants could see the website to ensure that participants understood the nuanced concept of ephemerality. Again, study 1b (N=180) found that people in the high (vs. low) ephemerality condition clicked on the advertisement earlier (M_{High}=42.12 vs. M_{Low}=66.98; t(178)=−3.12, p=.002).

Study 2 (N=185) employed an eye-tracking technology to provide additional support that ephemeral ads attract earlier attention. Supporting our hypothesis, participants in the high (vs. low) ephemerality condition fixated on the advertisement earlier (M_{High}=13.714 vs. M_{Low}=18.627; t(183)=−2.06, p=.041).

Study 3 (N=180) sought to directly measure felt urgency by using seven items of perceived urgency (α=.93; e.g. "I would feel pressed for time while I am browsing the website"; Suri and Monroe (2003)). In this study, we also include a permanent condition, in which participants were told, "Once you click on the advertisement, it will be available to view for as long as you wish." After participants read the instructions on news articles and advertisements, they responded to the perceived urgency scale. The main effect of ephemerality on perceived urgency (F(2,177)=23.44, p<.001) was significant. Specifically, high ephemerality led to greater perceived urgency than both the low ephemerality (M_{High}=4.58 vs. M_{Low}=3.15; t(177)=4.20, p<.001) and permanent conditions (M_{High}=4.58 vs. $M_{Permanent}$=2.27; t(177)=6.75, p<.001). Low ephemerality also led to greater perceived urgency than the permanent condition (M_{Low}=3.15 vs. $M_{Permanent}$=2.27; t(177)=2.50, p<.05).

Study 4 (N=383) manipulated urgency directly in the advertisement by changing the year of the event that was advertised in the ad. In the high (low) urgency condition, the banner ad showed that the event would take place in 2020 (2023), which is the year that this experiment was run. If urgency indeed drives earlier opening times for messages with higher (vs. lower) ephemerality, then externally decreasing urgency should result in a moderation of the ephemerality-urgency effect. The main effect of ephemerality ($M_{HighEphemerality}$=43.98 vs. $M_{LowEphemerality}$=90.22; F(1,379)=25.05, p<.001) and the main effect of urgency ($M_{HighUrgency}$=55.42 vs. $M_{LowUrgency}$=78.79; F(1,379)=13.57, p<.001) on ad opening time were significant. The latter shows that our external manipulation of urgency worked. More importantly, the interaction between ephemerality and urgency on ad opening time was also significant (F(1,379)=30.20, p<.001). Specifically, when urgency was high, the ephemerality- urgency effect was significant ($M_{HighEphemerality}$=17.45 vs. $M_{LowEphemerality}$=93.38; t(379)=−7.36, p<.001). When urgency was low, the ephemerality-urgency effect was attenuated ($M_{HighEphemerality}$=70.51 vs. $M_{LowEphemerality}$=87.07; t(379)=.35, p=.272).

Study 5 (N=372) examined the role of perceived control (H2). Participants first responded to the measure of perceived control (e.g. "I am in control of my own life"; Ma and Kay 2017). Subsequent procedures were identical to those of study 1b. A regression on ad opening time revealed the main effect of ephemerality (M_{High}=81.84 vs. M_{Low}=129.66; b=−.47, t(368)=−3.57, p<.001). The main effect of perceived control indicated that lower perceived control was associated with earlier ad opening (b=.16, t(368)=2.74, p=.006), supporting our hypothesis that feelings of low control trigger approach motivation. Importantly, there was an interaction between ephemerality and control (b=−.21, t(368)=−2.60, p=.010; see figure 1).

People feeling high (+1SD) control opened the 10-second (vs. 10-minute) ad earlier (b=−.82, t(368)=−4.36, p<.001), but people feeling low (−1SD) control did not (b=−.13, t(368)=−.69, p=.493).

Studies 6a and 6b test for robustness of the ephemerality-urgency effect in a different experimental setting, and also moves beyond advertising to explore the impact of ephemerality in another domain where ephemerality is inherent in the product characteristics. Additionally, we provide a more externally valid manipulation of ephemerality, removing the need for comprehension checks, and explore the downstream consequences of ephemerality on choice.

Participants in studies 6a (N=200) and 6b (N=200) saw an online video streaming website and were asked which of two movies they would like to watch first. Note that rental videos are ephemeral in nature because they can be opened at will (phase 1 is limitless), but once opened need to be viewed within a time limit (phase 2 has a time limit). In study 6a, the movie choice was between a purchased (permanent or no-ephemerality) and rented (ephemeral) option. In study 6b, the movie choice was between 2 rented options with higher and lower ephemerality. In one condition, Movie A was ephemeral, while Movie B was not as ephemeral (counterbalanced by movie title). Movie A was more likely to be chosen when it was rented (vs. owned; 77.2% vs. 51.5%; χ2(1)=14.44, p<.001) in study 6a, and when it had 24 hours (vs. 72 hours) access as its rental period (i.e., "You have not yet started watching this movie. Once you start, you'll

have access for 24 (72) hours"; 79% vs. 65%; $\chi2(1)=4.86$, *p*=.027) in study 6b.

Our research contributes theoretically to literature on ephemerality, time perception, and mere urgency. We show that the time limitation introduced by the new ephemeral media induces novel time perceptions for consumers—even though the phase 2 limit (seeing time limit) is orthogonal to the phase 1 limit (opening time limit), it still impacts opening time—and does so, even when consumers understand the two phases. This result has added to the literature on ephemerality and on time perception/time limits. We add to ephemerality literature by showing that ephemerality positively affects earlier stages in information processing through enhanced attention towards the ad that is higher in ephemerality. Our research is also the first to focus on different degrees of ephemerality rather than just comparing ephemeral messages to permanent messages. We also contribute to mere urgency literature by showing that ephemerality can create urgency even when there is no rational reason for this urgency; and that this urgency is due to loss of perceived control.

We provide managerial implications by demonstrating the impact of ephemerality in marketing settings—various ads within websites, and online video purchase and rental sites, extending prior research which has focused solely on social media settings (He and Kivetz 2016; Hofstetter et al. 2017). By using two experimental settings that allow for consumer interaction with products or ads, we reveal that ephemerality can affect consumers' intention to approach firm offerings. Furthermore, by showing that ephemerality captures earlier attention, we suggest a possible competitive edge that firms can adopt in the attention economy.

REFERENCES

Atasoy, Ozgun and Carey K Morewedge (2017), "Digital Goods Are Valued Less Than Physical Goods," *Journal of Consumer Research*, 44 (6), 1343–57.

Bardhi, Fleura and Giana M Eckhardt (2017), "Liquid Consumption," *Journal of Consumer Research*, 44 (3), 582–97.

Bayer, Joseph B, Nicole B Ellison, Sarita Y Schoenebeck, and Emily B Falk (2016), "Sharing the Small Moments: Ephemeral Social Interaction on Snapchat," *Information, Communication & Society*, 19 (7), 956–77.

Billings, Andrew C., Fei Qiao, Lindsey Conlin, and Tie Nie (2017), "Permanently Desiring the Temporary? Snapchat, Social Media, and the Shifting Motivations of Sports Fans," *Communication & Sport*, 5 (1), 10–26.

Dhar, Ravi and Stephen M. Nowlis (1999), "The Effect of Time Pressure on Consumer Choice Deferral," *Journal of Consumer Research*, 25 (4), 369–84.

Greenaway, Katharine H., Katherine R. Storrs, Michael C. Philipp, Winnifred R. Louis, Matthew J. Hornsey, and Kathleen D. Vohs (2015), "Loss of Control Stimulates Approach Motivation," *Journal of Experimental Social Psychology*, 56, 235–41.

He, Daniel and Ran Kivetz (2015), "Blink and You'll Miss It: The Consequences of Ephemeral Messaging," *NA - Advances in Consumer Research*, 44, 470–71.

Hofstetter, Reto, Roland Rüppell, and Leslie K. John (2017), "Temporary Sharing Prompts Unrestrained Disclosures That Leave Lasting Negative Impressions," *Proceedings of the National Academy of Sciences*, 114 (45), 11902–07.

Inman, J. Jeffrey and Leigh McAlister (1994), "Do Coupon Expiration Dates Affect Consumer Behavior?," *Journal of Marketing Research*, 31 (3), 423–28.

Inman, J. Jeffrey, Anil C. Peter, and Priya Raghubir (1997), "Framing the Deal: The Role of Restrictions in Accentuating Deal Value," *Journal of Consumer Research*, 24 (1), 68–79.

Ma, Anyi and Aaron C. Kay (2017), "Compensatory Control and Ambiguity Intolerance," *Organizational Behavior and Human Decision Processes*, 140, 46–61.

Ordóñez, Lisa and Lehman Benson (1997), "Decisions under Time Pressure: How Time Constraint Affects Risky Decision Making," *Organizational Behavior and Human Decision Processes*, 71 (2), 121–40.

Payne, John W, James R Bettman, and Eric J Johnson (1988), "Adaptive Strategy Selection in Decision Making," *Journal of Experimental Psychology: Learning, Memory, and Cognition*, 14 (3), 534–52.

Robinson, Michael D. (2007), "Lives Lived in Milliseconds: Using Cognitive Methods in Personality Research," in *Handbook of Research Methods in Personality Psychology*, ed. Richard W. Robins, R. Chris Fraley, and Robert F. Krueger, New York: Guilford, 345– 59.

Snapchat Support (2018, August 15). "When Does Snapchat Delete Snaps and Chats?" *Snapchat*, Retrieved from https://support. snapchat.com/en-US/a/when-are-snaps-chats-deleted.

Suri, Rajneesh and Kent B. Monroe (2003), "The Effects of Time Constraints on Consumers' Judgments of Prices and Products," *Journal of Consumer Research*, 30 (1), 92–104.

Tu, Yanping and Dilip Soman (2014), "The Categorization of Time and Its Impact on Task Initiation," *Journal of Consumer Research*, 41 (3), 810–22.

Zhu, Meng, Yang Yang, and Christopher K Hsee (2018), "The Mere Urgency Effect," *Journal of Consumer Research*, 45 (3), 673–90.

To Delete or to Keep: Effects of Data Request Frames on Consumers' Willingness to Share Their Personal Information

Smriti Kumar, University of Massachusetts, USA
Elizabeth Miller, University of Massachusetts, USA
George R. Milne, University of Massachusetts, USA

EXTENDED ABSTRACT:

Companies are struggling to understand how to give consumers a way to manage their data. Recent legislative actions provide incomplete guidance on this issue as different countries have adopted different practices (e.g., GDPR recommends firms explicitly give consumers the right to deletion, while most US firms require consumers to actively seek this option out). Thus, in this research, we explore the impact of three different data request frames (provide vs. keep vs. delete) on consumers' willingness to share information and how such frames interact with sensitivity of information type and type of recipient (e.g., close friend, trusted marketer, unknown marketer). Building on reactance theory and cognitive evaluation theory, we propose that different frames lead to different levels of autonomy causing a threat to consumers' freedom and subsequent willingness to share information. Consistent with this theory, we find that consumers share the least information in the keep frame and that this framing effect occurs for low and medium sensitive information, but not information high in sensitivity.

Introduction

Consumers' personal data is one of the most important assets of companies these days. Marketers gather consumer's personal data to deliver targeted ads to the consumers based on their online behavior. As personally targeted ads are more relevant and more interesting to consumers, tools such as behavioral targeting/ retargeting (showing consumers ad specific to their behavior/ recently seen products) (Lambrecht and Tucker 2013), keyword based targeting (showing ads to consumers based on the terms searched in search engines) (Desai, Shin, and Staelin 2014; Sayedi, Jerath, and Srinivasan 2014; Yang, Lu, and Lu 2014), content based targeting (showing ads based on what consumer has read) (Zhang and Katona 2012) improve a firm's capacity to better reach and persuade consumers.

On the one hand marketers are benefitted by the personal data consumers share, on the other hand consumers trade their personal information in everyday market-based exchanges to gain relational benefits from firms. For example, in order to get competitive rates on a mortgage loan, individuals often share their social security number; in order to find a suitable life partner, individuals share their personal details such as their height, weight, race etc. on dating sites. However, there are risks associated with the benefits consumers get such as identity theft (Milne 2003), increased annoyance because of selling data to third parties (Culnan 1993), and threat to anonymity (Zwick and Dholakia 2004). Increased consumer data disclosure has heightened concerns for consumers and policy makers who are looking for ways to control their sensitive information while maintaining the relational benefits.

With increased concerns about data privacy, the General Data Protection Regulation (GDPR) aims to provide a set of provisions to consumers to govern the processing of their personal data. One of these provisions is the 'right to erasure' or 'right to be forgotten' which recommends that firms enable consumers to delete some or all of their personal information from the firm's databases permanently if desired (Palmer 2019). In the European Union, GDPR has recommended firms to explicitly give the right to delete to their consumers, however in the United States most firms have implemented a weak

form of transparency, i.e. making this option available to consumers only if they actively seek it out (Kim, Barasz and John 2019).

Companies are struggling to figure out how to give consumers options to control their data. Until now, companies have been using opt-in/ opt-out approach to give consumers an option to have some control over their data by choosing to voluntarily share or not share their data. Literature suggests that opt-in and opt-out leads to differences in the extent of information sharing (Krishnamurthy 2001). Johnson, Bellman and Lohse (2002) showed that consumers share more in an opt-out scenario than in an opt-in scenario. The other aspect of permission marketing is framing. The literature has not said much about framing (except for positive or negative) within the opt-in and opt-out approaches. Consumers share more in negative framing than in positive framing (Johnson, Bellman and Lohse 2002). Building on existing literature on framing effects, it seems likely that how companies frame the data request option to consumers will impact their decisions regarding what information to share. Therefore, we contribute to this stream of research by looking at framing effects within opt-in approach.

This paper investigates three different frames that firms can use to request consumer information (i.e. asking consumers to *provide* personal information vs. asking them to *keep* (already) collected information vs. asking them to *delete* (already) collected information) and how they affect consumers' willingness to share sensitive information. Because the privacy literature identifies contextual factors such as the information type and the recipient of the data as having an effect on consumers' willingness to share their personal information, in this paper, we include the role of sensitivity of information types and the recipient as potential moderators on the effect of framing on consumers' willingness to share different information types.

Building on reactance theory (Brehm 1966) and cognitive evaluation theory (Deci and Ryan 1985), we propose that framing of the information request (provide vs. keep vs. delete) affects consumers' willingness to share sensitive information. Specifically, we argue different frames lead to different levels of perceived autonomy and less/ shared autonomy with the firms then elicits a sense of threat to consumers' freedom of choice leading to differences in willingness to share the personal information. We also propose that this process of reactance is mediated by negative emotions and cognition effect. *Framing of the request* is an important factor that has not been explored before and is practically relevant in the context of deletion option. As data is important for the firms, the effect of framing on information sharing is important to understand.

This research contributes to the framing literature as well as privacy literature by exploring how different deletion framings impacts consumers' willingness to share information. It also adds to our understanding of the moderating roles of contextual factors such as sensitivity of information types and recipients on the relationship of framing and the extent of information sharing.

Literature Review

According to Brehm's (1966) reactance theory, reactance is an unpleasant motivational arousal that occurs when an individual experience a threat or loss to his free will to perform some behavior. State of reactance serves as a motivator to restore the threatened or lost

freedom (Steindl, Jonas, Sittenthaler, Mattausch, Greenberg 2015). When an individual engages in a particular behavior, some aspect of the context initiates or regulates the outcome behavior (Deci and Ryan 1987). Individuals give psychological meaning to the contextual factors which leads to certain types of behaviors (Deci and Ryan 1985). One of the contextual factors we are discussing in this paper is framing of the deletion request as either 'to provide' the data or 'to keep' the (already) collected data or 'to delete' the (already) collected data. We propose that different types of framing will be construed as either supporting the autonomy (i.e. encouraging individuals to make their own choice) or controlling the behavior (pressuring individuals towards certain outcomes). Autonomy being a theoretical concept denotes an inner endorsement of one's actions. Autonomy/ control is not a dichotomous construct but rather a spectrum ranging from full autonomy to least autonomy (control) (Brehm and Brehm 1981). We suggest that sense of autonomy cued by the relationship expectation from the firm will depend on contextual factor (Frame). Different data request frames could mean potential different relationship intentions from the firms, which leads to different levels of autonomy. Less autonomy could be perceived as a threat. For example, when a firm is asking a consumer to provide his personal information, the data request could cue that the firm is interested in maintaining a relationship with the consumer and so far consumer has full control over his information (as it lies with the consumer and not with the firm) which signals full autonomy. This sense of full autonomy over which data to share or not share with the firm will not be perceived as a threat and the consumer will be willing to share the information. In the situation where the firm already has the consumer data and asks consumer which data to delete, this data request could signal a firm is not interested in maintaining the relationship with the consumer and consumer can decide which data to delete from the firm's data base. This relational cue signals that the autonomy is mostly with the consumer and he has to decide. This autonomy level would be less than in the provide request but still autonomy lies with the consumer. There should be some perceived threat and the consumer should be less willing to share the data as compared to provide condition but will still share the data. Finally, in the case that the firm already has consumer data and it asks consumer which data to keep, this signals that firm is interested in maintaining the relationship and already has access to the consumer data. This data request could signal an autonomy that is shared between the firm and the consumer. This shared autonomy could be perceived as a major threat to consumer's free will to their data and thus to restore the freedom, they will share less data (i.e. they will voluntarily choose to not keep the data). The willingness to share the data would be least in the keep data request as the threat to autonomy is the highest. Thus, we predict (H1) that consumer willingness to share information will be less with a 'keep' frame compared to (a) provide and (b) delete frames.

According to reactance theory, reactance (i.e. threat to freedom) leads to restricted behavior through negative emotions and negative cognition (Dillard and Shen 2005; Jonas, Graupmann, Niesta, Zanna, Traut-Mattauscg and Frey 2009). We propose that in keep condition, due to high threat, consumers will experience greater negative emotions and cognitions than as compared to in delete or provide condition, which will further lead to less willingness to share personal information. Therefore, we expect the difference in willingness to share among different frames is driven by negative emotions and negative cognition (H2).

We also examine the moderating roles of perceived information sensitivity and the recipient of the information on the amount of sensitive information shared. Based on previous research, we propose that the effect of framing on willingness to share information will be observed (vs. not be observed) when consumers perceive information to be less (vs. more) sensitive (H3) and when the recipient of information is a trusted (vs. unknown) party (H4).

Study 1: Framing Effect and Moderation through Perceived Sensitivity and Recipient

Our study tests our proposed framing effect i.e. information request in terms of providing vs. keeping vs. deleting leads consumers to share different extent of information (H1). We also test whether framing effect is moderated by the level of perceived sensitivity and the recipient of the information (H3 and H4).

Method

We implemented provide condition as when firm asks consumers' willingness to provide information; keep condition as when firm already has information and asks consumers' willingness to keep the information; and delete condition as when firm already has the information and asks consumers' willingness to delete the information. We use a list of 36 information types from Markoes, Milne and Peltier (2017). We ask participants to indicate their willingness to provide/keep/delete this information and to rate perceived sensitivity of each of these 36 information types. We also manipulated the scenario for the recipient of the information (a close friend vs. a trusted marketer vs. an unknown marketer).

Amazon Mechanical Turk (MTurk) workers (n= 511, Mage = 35-44 years, 51.2% females) completed this survey for a nominal payment. Participants were randomly assigned to one of the 9 conditions in a 3 Frame (provide vs. keep vs. delete) X 3 Recipient (friend vs. trusted marketer vs. unknown marketer) between subjects design. Perceived sensitivity was a within study factor. All the participants were asked to imagine that they created a new account on a social media app.

In friend condition, participants were asked to name one of their close friends. In trusted marketer condition, they were asked to name a social media app that they had a positive experience with and in unknown marketer condition, we told them that they have created an account on a new social media app InstaSocial which is similar to Instagram, Facebook and Snapchat. All participants were given a list of 36 information types. In the provide condition, they were asked "How willing would you be to provide each type of information to [close friend / trusted marketer/ InstaSocial]"? on a scale of (1- Definitely not willing to provide – 7- Definitely willing to provide). In the keep condition, they were told that social media app already populated their information taken from different online sources. "For each of the following types of information, please indicate whether you want to keep this information on the app to be shared with [close friend/ trusted marketer/ InstaSocial]"? on a scale of (1- Definitely do not want to keep – 7- Definitely want to keep). In delete condition, they were told the same story as in keep condition and were asked, "For each of the following types of information, please indicate whether you want to delete this information from [social media app/ trusted marketer/ InstaSocial]?" on a scale of (1- Definitely do not want to delete – 7- Definitely want to delete) [R].

Participants then reported their perceived sensitivity for each of the 36 information types by answering "How sensitive would you consider each of the following types of information?" on a scale of (1- Not Sensitive – 7 – Very Sensitive).

Results

Manipulation Check: We asked participants "In the task earlier in the survey, you were asked to _____ the information on the social media app" and participants had to select provide, keep,

or delete. Participants who didn't provide the correct response were eliminated, final N=511.

Repeated Measure ANOVA Analysis: We created three levels of sensitivity at -1SD (low), between -1SD to +1SD (medium) and above +1SD (high). Accordingly, we created three variables of willingness to share (WTS) at low, medium and high sensitivity levels. We ran a repeated measures ANOVA with 3 WTS dependent variables.

The repeated measure ANOVA revealed a significant main effect of framing ($F_{(2,502)} = 11.77$, p <0.01) on the willingness to share. Consistent with H1, participants in the keep condition were significantly less willing to share information ($M_{keep} = 2.51$, SD = 0.09) than in provide ($M_{provide} = 3.00$, SD = 0.08, p <0.001) and in delete ($M_{delete} = 3.09$, SD = 0.09, p <0.001) conditions. There was no significant difference in willingness to share in delete and provide (p > 0.05) conditions. Consistent with prior findings, there is a significant main effect of recipient of the information ($F_{(2,502)} = 59.41$, p <0.01) on the participant's willingness to share; participants in the close friend condition shared significantly more ($M_{friend} = 3.65$, SD = 0.09) than participants in trusted marketer ($M_{TM} = 2.52$, SD = 0.09, p<0.01) or unknown marketer ($M_{UM} = 2.43$, SD = 0.08 p<0.01) conditions. Interestingly, there was no difference in the willingness to share the information for the trusted and unknown marketer (p>0.05), which is different from what Markos, Labrecque, Milne (2018) found in their paper (partial support for H4). The analysis also showed a significant interaction between frame and sensitivity, Wilk's Lambda =0.92, ($F_{(4,1002)} = 10.99$, p <0.001). The framing effect persisted in low and medium sensitivity but mitigated for highly sensitive information types (see Table 1a) providing support for H3. For low and medium sensitive information, there was no difference between the provide ($M_{provide, low} = 4.2$; $M_{provide, medium} = 3.32$) and delete ($M_{delete, low} = 4.37$; $M_{delete, medium} = 3.25$, p>0.05; p>0.05) conditions. Confirming previous findings, there is a significant interaction between recipient and sensitivity, Wilk's Lambda = 0.93, ($F_{(4,1002)} = 8.67$, p<0.001). Participants share significantly more information with a close friend than a trusted marketer and unknown marketer and the extent of sharing decreases as sensitivity of information increases from low to high (see Table 1b). There is also a significant 3-way interaction between frame, sensitivity and recipient, Wilk's Lambda = 0.95 ($F_{(8,1002)} = 3.44$, p=< 0.001). Frame effect is strongest in the close friend condition and with increasing sensitivity, the extent of information sharing is decreasing (Table 1c). Figure 1 shows the willingness to share information for 36 information types with different perceived sensitivity for each of the recipient types.

Discussion

Our study shows that different frames affect the willingness to share the information. More specifically, consumers share significantly less in the keep condition as compared to provide and delete conditions. Overall, there was no difference in delete and provide conditions in the extent of information sharing. Framing effect was evident for low and medium sensitive information types but not for high, which was expected considering the risk of sharing information such as your SSN, passport id, credit card numbers etc. We also replicated the effect of recipient on willingness to share the information previously found in the literature. Extent of information sharing reduces as sensitivity of the information increases and trust in recipient decreases.

A second study will explore the mechanism (H2) underlying the observed framing effect using a 3(frame: provide, keep, delete) x 3(sensitivity: low, medium, high) design and including measures of negative emotions and negative cognition(time latencies and thoughts generated).

Implications

With the implementation of the General Data Protection Regulation (GDPR) and the California Consumer Privacy Act (CCPA), the consumer data privacy landscape is changing. Both laws include provisions for consumers to have data erased (GDPR) or deleted (CCPA), but the implications of how the ability to delete data will impact consumers and their data sharing has not been explored. In particular, while both laws assert that consumers have the right to request removal of their information, guidelines regarding how this option should be communicated to consumers have not been provided. Given existing work on framing effects in the consumer decision making literature, it seems likely that how this request is framed will impact consumer responses. Thus, in this research, we explore the implications of asking consumers to keep or delete information and compare this with the more traditional situation of consumers providing information. Our findings indicate that the framing of the request does indeed impact consumers' likelihood of sharing personal information, with consumers least likely to share information in the keep frame. Surprisingly, we do not observe differences in the amount of information shared between the delete and provide frames. An additional planned study will investigate the mechanism underlying these effects.

Together, these findings have practical implications for policy and for marketers by highlighting situations in which consumers may be more or less likely to share personal information. Further, by shedding light on the mechanism underlying these effects, this research contributes to the consumer literature on framing by highlighting new pathways by which linguistic frames impact decision-making. Finally, this research also contributes to the privacy literature by providing an increased understanding of how the option to delete information impacts sharing behavior and factors which moderate these effects.

REFERENCES

Brehm, J. W. (1966). "A theory of psychological reactance".

Brehm, J. W., & Brehm, S. S. (1981). "Psychological reactance – a theory of freedom and control". NewYork,NY: Academic Press.

Culnan, M. J. (1993). "How did they get my name?: an exploratory investigation of consumer attitudes toward secondary information use". MIS Quarterly, September, 341–361.

Deci, E. L., & Ryan, R. M. (1985). "The general causality orientations scale: Self-determination in personality". *Journal of research in personality*, *19*(2), 109-134.

Deci, E. L., & Ryan, R. M. (1987). "The support of autonomy and the control of behavior" . *Journal of personality and social psychology*, *53*(6), 1024.

Desai, Preyas S., Woochoel Shin, and Richard Staelin (2014), "The Company That You Keep: When to Buy a Competitor's Keyword," Marketing Science, 33 (4), 485–508.

Dillard, J. P., & Shen, L. (2005). "On the nature of reactance and its role in persuasive health communication". Communication

Jonas, E., Graupmann, V., Niesta Kayser, D., Zanna, M., Traut-Mattausch, E., & Frey, D. (2009). "Culture, self, and the emergence of reactance: Is there a "universal" freedom?" Journal of Experimental Social Psychology, 45, 1068–1080. doi: 10.1016/j.jesp.2009.06.005

Johnson, E. J., Bellman, S., & Lohse, G. L. (2002). "Defaults, framing and privacy: Why opting in-opting out". *Marketing Letters*, *13*(1), 5-15.

Kim, Tami, Kate Barasz, and Leslie K. John (2019). "Why am I seeing this ad? The effect of ad transparency on ad effectiveness." *Journal of Consumer Research* 45, no. 5: 906-932.

Krishnamurthy, Sandeep. "A comprehensive analysis of permission marketing." *Journal of Computer-Mediated Communication* 6, no. 2 (2001): JCMC623.

Lambrecht, Anja and Catherine Tucker (2013), "When Does Retargeting Work? Information Specificity in Online Advertising," Journal of Marketing Research, 50 (5), 561–76.

Markos, Ereni, George R. Milne, and James W. Peltier (2017). "Information sensitivity and willingness to provide continua: a comparative privacy study of the United States and Brazil." *Journal of Public Policy & Marketing* 36, no. 1: 79-96.

Markos, Ereni, Lauren I. Labrecque, and George R. Milne (2018). "A new information lens: The self-concept and exchange context as a means to understand information sensitivity of anonymous and personal identifying information." *Journal of Interactive Marketing* 42: 46-62.

Milne, G. R. (2003). "How well do consumers protect themselves from identity theft?" Journal of Consumer Affairs, 37.

Palmer (2019). "What is GDPR? Everything you need to know about the new general data protection regulations." https://www.zdnet.com/article/gdpr-an-executive-guide-to-what-you-need-to-know/

Sayedi, Amin, Kinshuk Jerath, and Kannan Srinivasan (2014), "Competitive Poaching in Sponsored Search Advertising and Its Strategic Impact on Traditional Advertising," Marketing Science, 33 (4), 586–608.

Steindl, C., Jonas, E., Sittenthaler, S., Traut-Mattausch, E., & Greenberg, J. (2015). "Understanding psychological reactance". *Zeitschrift für Psychologie*.

Yang, Sha, Shijie Lu, and Xianghua Lu (2014), "Modeling Competition and Its Impact on Paid-Search Advertising," Marketing Science, 33 (1), 134–53.

Zhang, Kaifu and Zsolt Katona (2012), "Contextual Advertising," Marketing Science, 31 (6), 980–94. 932

Zwick, D., & Dholakia, N. (2004). "Whose identity is it anyway? Consumer representation in the age of database marketing". Journal of Macromarketing, 24, 31–43.

Price Based Evaluation of Eco-Friendly Products: The Mediating Role of Perceived Investment by the Firm

Amogh Kumbargeri, Indian Institute of Management Ahmedabad, India
Sanjeev Tripathi, Indian Institute of Management Indore, India

EXTENDED ABSTRACT

In this research, we propose a novel lay belief – consumers believe that firms invest significantly more resources to develop and manufacture eco-friendly products as compared to conventional products. Lay theories or lay beliefs reflect people's common sense understanding of how the world works (Furnham 1988; Haws, Reczek, and Sample 2016. Research shows that firms primarily price their products either based on the cost of manufacturing or on the basis of the perceived value of the products (Liozu et al. 2012). In the case of eco-friendly products, green firms and popular media typically highlight a cost-based approach as the justification for the higher prices (Kathy 2019; "Why are eco-friendly products so damn expensive?", 2019). Common arguments include higher prices of sustainable raw materials, increased manufacturing cost due to small scale inefficient processes, and increased emphasis on fair wages (Kathy 2019). We argue that frequent exposure to high prices of eco-friendly products and such justifications for the high prices act as the source of the proposed belief.

If consumers hold such a lay belief, we expect consumers' green perception of the product (Gershoff and Frels, 2015), to be positively correlated with their perception of the resources invested by the firm in developing the product. Further, driven by the belief that green products need higher investment by the firm, we predict that consumers will perceive higher-priced products to be eco-friendlier as compared to lower-priced products, and this effect is mediated by the perceived investment of the firm in manufacturing the product. Formally stated,

Hypothesis 1:   *Green perception of an eco-friendly product is positively correlated with the perceived investment by the firm in developing and manufacturing the product*

Hypothesis 2:   *Consumers perceive higher-priced green products to be eco-friendlier as compared to lower priced green products*

Hypothesis 3:   *The effect of price on the green perception of eco-friendly products is mediated by the perceived investment by the firm in manufacturing the product*

Trust plays a very important role in the evaluation of eco-friendly products as the 'green' claims of such products are tough to verify and have to be accepted at face value (Darby and Karni 1973; Nelson 1970). When consumers do not trust green claims of the products, perceived investment by the firm will have no impact on the green perception of the product. Hence, we expect the perceived investment by the firm to mediate the effect of price on the green perception only when consumers trust the green claims. Formally,

Hypothesis 4:   *The mediation by perceived investment is moderated by the trust in the green claims*

In Study 1, all participants (N=106) saw the images and attribute details for two backpacks. One backpack was manipulated to be eco-friendlier than the other using product attributes and eco-certi-

fication. Participants comparatively evaluated the perceived investment and green perception for both backpacks. Results indicated that the green perception is significantly and positively correlated with the perceived investment, r=0.639, n=106, $p < .001$ (H1).

The objective of Study 2 was to test the predicted effect of the price of green perception (H2). Students (N = 151) from a large B-School volunteered to participate in this study. The study employed one factor (Price-level: High/Low) between-subjects design such that only the price of the target eco-friendly backpack differed in both the conditions. Results showed that participants in the high price-level condition ($M = 4.91$, $SD = 1.22$) rated the eco-friendly backpack significantly higher than those in low price-level ($M = 4.50$, $SD = .20$) condition, $t (1,149) = 2.051$, $p = .042$).

The goal of Study 3 (N = 51) was to rule out the perceived-quality based alternative account. This study employed a 2(Price-level: High/Low) x 2(Perceived Quality: High/Low) mixed design wherein the price-level is manipulated within-subjects, and perceived quality is manipulated between subjects. Participants were asked to evaluate the green perception of both high and low-priced backpacks in high as well as low-quality conditions. Results revealed that the price level has a significant main effect on green perception ($M_{High} = 4.726$, $M_{Low} = 4.386$; Wilks' Lambda = 0.863, $F (1, 49) = 7.808$, $p = .007$) and perceived quality has no significant main effect ($F (1, 49) = 1.686$, $p = .20$), moreover there is no significant interaction ($F (1, 49) = .539$, $p = .466$ between price-levels and perceived quality.

Study 4 (N = 134) aimed to test the proposed moderated mediation model (H3 and H4). This study employed a 2(Price level: High/Low) x 2(Trust in green claims: High/Low) between-subjects design. Results revealed a significant indirect effect for price on green perception through perceived investment (b = .63, SE = .24, 95% CI [.17, 1.12]). Further, a moderated-mediation analysis (Hayes process model 14) revealed a significant moderated mediation index (b = .70, SE = .37, 95% CI [.02, 1.46]).

Finally, in Study 5 (N=136), we aimed to demonstrate how the proposed lay belief can lead to biased evaluation of greenness. This study used a 3-condition (inconsistent vs. consistent vs. control) between-subjects design. In the inconsistent condition high-eco-friendly backpack was priced lower than the low-eco-friendly backpack and vice versa in the consistent condition. No price information was provided in the control condition. The results revealed that the green perception scores for the high-eco-friendly backpack in the inconsistent condition ($M = 5.23$, $SD = 1.34$) were significantly lower than in the control ($M = 5.82$, $SD = 0.62$; $t (68) = -2.308$, $p = .024$) and consistent ($M = 5.71$, $SD = 0.72$; $t (79) = -2.043$, $p = .044$) conditions.

Our findings make two important contributions. First, we extend the understanding of how consumers evaluate the greenness of eco-friendly products (Gershoff and Frels 2015; Pancer et al. 2017; Lee et al. 2017) by identifying the role of price. Second, we build over the existing literature on consumer lay theories (Raghunathan et al. 2006; Haws et al. 2016) by identifying a novel lay theory and testing its causal impact on information processing and consumer judgment.

REFERENCES

Darby, M. R., & Karni, E. (1973). Free competition and the optimal amount of fraud. The Journal of law and economics, 16(1), 67-88.

Furnham, A. (1988). Lay theories: Everyday understanding of problems in the social sciences. Pergamon Press.

Gershoff, A. D., & Frels, J. K. (2015). What makes it green? The role of centrality of green attributes in evaluations of the greenness of products. Journal of Marketing, 79(1), 97-110.

Haws, K. L., Reczek, R. W., & Sample, K. L. (2016). Healthy diets make empty wallets: The healthy= expensive intuition. Journal of Consumer Research, 43(6), 992-1007.

Kathy. (2019, January 7). Why are eco-friendly products more expensive? [Web log post] Retrieved from http://clarifygreen.com/eco-friendly-products-cost-more/

Lee, J., Bhatt, S., & Suri, R. (2018). When consumers penalize not so green products. Psychology & Marketing, 35(1), 36-46.

Liozu, S. M., Hinterhuber, A., Boland, R., & Perelli, S. (2012). The conceptualization of value-based pricing in industrial firms. Journal of Revenue and Pricing Management, 11(1), 12-34.

Nelson, P. (1970). Information and consumer behavior. Journal of political economy, 78(2), 311-329.

Pancer, E., McShane, L., & Noseworthy, T. J. (2017). Isolated environmental cues and product efficacy penalties: The color green and eco-labels. Journal of Business Ethics, 143(1), 159-177.

Raghunathan, R., Naylor, R. W., & Hoyer, W. D. (2006). The unhealthy= tasty intuition and its effects on taste inferences, enjoyment, and choice of food products. Journal of Marketing, 70(4), 170-184.

Why are eco-friendly products so damn expensive? (2019, June 26). Retrieved from https://www.seastainable.co/blogs/seastainable-blog/why-are-eco-friendly-products-so-damn-expensive

Picture or Text Superiority? The Two Forces
of Element Size on Communication Effectiveness

Canice M. C. Kwan, The Open University of Hong Kong, Hong Kong, China
Chu (Ivy) Dang, The University of Hong Kong, Hong Kong, China
Yang Shi, Shenzhen University, China

EXTENDED ABSTRACT

Conventional wisdom suggests that a picture is worth a thousand words. Despite the large number of studies supporting this picture superiority notion, emerging evidence shows that enlarging pictures may sometimes hurt communication effectiveness (e.g., Kwan et al. 2017). Current understandings are however surprisingly limited regarding the allocation of surface size between pictures and text (i.e., element size). To reconcile the mixed effects concerning picture versus text superiority, this research provides a theoretical lens that disambiguates the element size effects along two routes—*impression formation* and *message persuasion*. We propose that these routes work in opposite directions in determining communication effectiveness. Depending on *product involvement* and *brand positioning*, the relative importance of impression and persuasion varies and leads one route to override the other.

Advertising research shows that pictures can create a holistic impression by evoking self-relevant narratives (Adaval and Wyer 1998) and emotion-laden responses (Miniard et al. 1991). Pictures also convey abstract qualities such as prestige (Pracejus et al. 2006). Rather than attempting to impress, however, many communications are designed to persuade (e.g., illustrating scientific findings). In these cases, the presence of pictures may shift attention away from text and interfere with the comprehension of verbal arguments (Wyer et al. 2008). Moreover, element size can serve as an indication of emphasis: the larger the text, the stronger the conviction it carries (Kwan et al. 2017). These findings suggest that enlarging pictures (relative to text) can facilitate impression formation while dampening message persuasion, producing opposing effects on communication.

So, when should practitioners allocate more space to pictures or to text? The answer concerns marketing objectives—if the goal is to *impress* or to *persuade*. We reason that enlarging pictures promotes the cognitive processes underlying impression formation while impeding the processes underlying message persuasion, and vice versa. As a result, pictorial size has a net positive effect in contexts weighted toward impression, and a net negative effect in more persuasive contexts. Concerning the relative importance of these marketing objectives, we find that product categories and brands vary systematically. This enables us to validate our reasoning by examining the moderating role of product involvement and brand positioning. Assuming that impression is likely emphasized over persuasion for high-involvement products and high-end brands, we predict that enlarging pictures produces more favorable responses for these products and brands.

We first identified a diversity of products across categories with established indicators of involvement (Laurent and Kapferer 1985). Then we determined a list of brands for each product category that includes high and low-end brands based on public rankings and industry reports. In later analyses, each brand was assigned a corresponding level of brand positioning and product involvement (high vs. low). This assignment was verified by judges who were unaware of the research purposes. Based on the list, we sampled posts from the Facebook business pages of the brands. We focused on Facebook cover photos because they are an essential component of all business pages, are under full control of managers, and are used strategically to convey a designated image and/or message to target audiences. From 114 pages across regions pertaining to 69 brands in 9 categories, we collected a total of 4,383 cover photos along with the number of likes for each post and other information about the pages. To measure element size, we leveraged EAST (Efficient and Accuracy Scene Text detector, Zhou et al. 2017), a deep learning-based computer vision technique. This technique automatically detects text elements in multiple colors, irregular fonts, and complex layout, and isolates them from backgrounds so that we can estimate the ratio of picture size to text size (i.e., size ratio; Pieters and Wedel 2004). Finally, we obtained an augmented dataset with all necessary statistics about the cover photos and business pages, the size ratio, and a list of products and brands coded with respect to the relative importance of the two marketing objectives.

In a series of multivariate regressions, we investigated the relationship between the size ratio and communication effectiveness (measured by the number of likes) by analyzing the moderation effect of product involvement and brand positioning. In addition, we controlled for the effect of relevant factors including the presence of text content and human faces, aspect ratio, visual complexity, and post duration. We also included random coefficients in the models to capture the effects of unobserved factors at the brand level and the product category level. Specifically, we first built a null model (model 1) with the size ratio and all control variables as predictors. Its results fit with the notion that enlarging pictures enhances communication effectiveness (i.e., the picture superiority notion). When we entered involvement (positioning) and its interaction with the size ratio in model 2 (model 3), however, we found that both involvement and positioning significantly moderated the size effect while the effect of all control variables remained as in the null model. As predicted, enlarging pictures was beneficial to high-end brands and detrimental to low-involvement products. We obtained significant effects of similar size and direction when entering both moderators and their interaction with the size ratio simultaneously (model 4). Results support the idea of coexistence between the effects suggested by the notions of picture and text superiority: enlarging pictures enhances (hinders) communication effectiveness when impression (persuasion) weighs more in the context.

Theoretically, this research sets out a lens to understand the differential effects of element size and shows that their dominance depends on *the objectives to impress and to persuade*. Managerially, our findings highlight the importance that to maximize effectiveness, practitioners should adjust element size strategically and without necessarily following conventional wisdom. It is possible that enlarging pictures can produce a negative effect when Tesla (a high-end brand) attempts to convey a persuasive message, and a positive effect when Crest (a low-involvement product) relates itself to upper strata. Practically, our present application of deep learning-based computer vision technique guides future endeavors to explore visual effects and generate insights from real-world big data sets on visual optimization and content customization.

REFERENCE

Adaval, Rashmi and Robert S. Wyer (1998), "The Role of Narratives in Consumer Information Processing," *Journal of Consumer Psychology*, 7 (3), 207–45.

Kwan, Canice M., Xianchi Dai, and Robert S. Wyer (2017), "Contextual influences on message persuasion: The effect of empty space," *Journal of Consumer Research*, *44* (2), 448-64.

Laurent, Gilles, and Jean-Noel Kapferer (1985), "Measuring consumer involvement profiles," *Journal of Marketing Research,* 22 (1), 41-53.

Miniard, Paul W., Sunil Bhatla, Kenneth R. Lord, Peter R. Dickson, and H. Rao Unnava (1991), "Picture-based persuasion processes and the moderating role of involvement," *Journal of Consumer Research*, 18(1), 92-107.

Pieters, Rik and Michel Wedel (2004), "Attention Capture and Transfer in Advertising: Brand, Pictorial, and Text-Size Effects," *Journal of Marketing*, 68 (April), 36–50.

Pracejus, John W., G. Douglas Olsen, and Thomas C. O'Guinn (2006), "How Nothing Became Something: White Space, Rhetoric, History, and Meaning," *Journal of Consumer Research*, 33 (1), 82–90.

Wyer, Robert S., Iris W. Hung, and Yuwei Jiang (2008), "Visual and Verbal Processing Strategies in Comprehension and Judgment," *Journal of Consumer Psychology*, 18, 244-57.

Zhou, Xinyu, Cong Yao, He Wen, Yuzhi Wang, Shuchang Zhou, Weiran He, and Jiajun Liang (2017), "EAST: an efficient and accurate scene text detector," in *Proceedings of the IEEE conference on Computer Vision and Pattern Recognition*, 5551-60.

A Commons Approach to Consumer Ethics

Mikko Laamanen, Emlyon Business School, France
Giana M. Eckhardt, Royal Holloway University of London, UK

EXTENDED ABSTRACT

Within consumer research, an understanding of consumer ethics has tended to focus on individual consumer's action in the marketplace: how and why consumers make decisions to buy ethically, how and why there is an attitude-behavior gap between what consumers say they care about and what their actual purchasing behavior looks like, and which mechanisms can be utilized to push consumers to more ethical purchasing (Devinney et al., 2010). The consumer ethics literature is premised on the notion of consumer responsibilization (see Giesler and Veresiu, 2014). Dominant market forces ascribe the consumer an obligation to address social and environmental issues through their consumption, reducing consumer agency to their capacity to make 'correct' choices in the marketplace. This literature has demonstrated the limitations of consumers acting on their ethical beliefs in the marketplace: to a large extent, the ethical consumer is a myth (Devinney et al., 2010). Miller (1998) points out that expecting the consumer to make an ethical choice, for instance, one good for the environment, often puts them at odds with another moral choice, such as doing the best thing for one's family. Thus, there is a need to think about other ways in which consumers can enact their agency to bring about change beyond their individual purchasing choices. Indeed, consumers resist being responsibilized (Eckhardt and Dobscha 2019), and there is evidence that they can turn to broader forms of action to address social issues, e.g. with political consumption (Dubuisson-Quellier, 2013; Micheletti, 2003).

Recent consumer research has brought forth a variety of 'alternative' structures–the sharing economy (Belk et al. 2019), access-based consumption (Bardhi and Eckhardt 2012) and collaborative consumption (Wahlen and Laamanen, 2017)–highlighting consumer-led exchange of goods, services and ideas mediated by reciprocal relations and technological platforms. Resource circulation can be connected to principles of sharing (Belk, 2010), mutuality (Arnould and Rose 2016) and householding (Laamanen et al., 2018; Sahakian, 2017). Configurations of interactions, responsibilities and infrastructures among consumers suggest a more collective approach for engaging in ethical consumption. That is, rather than being focused on individual choice in the marketplace, and individualized collective political action, such as whether to participate in a boycott or not, collective systems themselves can make a difference. Yet, sharing and access systems has been shown to not have resulted in expected societal benefits (e.g. Schor 2020) and rather have facilitated negative reciprocities and exclusion (e.g. Bardhi and Eckhardt 2012; Ladegaard, 2018).

To advance theorizing on how collective resource systems can create collectivized ethical action, we put forward a commons-based view. Commons are proposed as a cultural shift and a means for a more sustainable future (e.g. Helfrich and Bollier, 2019). This construct has yet to be fully explored in the consumer research literature. What has been explored to date dialogues with Hardin's (1968) "tragedy of the commons". In relation to consumption, the tragedy is framed as that when consumers don't feel a sense of ownership (and subsequent responsibility) or when actors in resources-sharing systems are not morally aligned to take care of shared resources (see Bardhi and Eckhardt 2012; Duffy et al., 2017; Shultz and Holbrook 1999). Ways to overcome the tragedy, as Shultz and Holbrook (1999) suggest, are increasing control through privatization, fees, partnerships and dialogue to manage individual engagement with common resources. Commons are, however, not merely pools of resources. Importantly, commons incorporate relational stewardship of governing the resource(s) in question as well as the commoners' relations with one another. This is known as the practice of commoning.

In contrast to Hardin, Elinor Ostrom (2010) suggests that the vitality of commons does not result from further enclosures but from a polycentric governance. Polycentric governance creates a process of rulemaking to allow citizen-led and democratic participation (see also Laamanen et al., 2020). This calls for the creation of citizen-based institutions to govern the commons, their resources and practices of engagement. The ensuing commons are self-sufficient and free from an external ruling authority; open, yet ideological, spaces for economic and solidaristic experimentation. In this paper, we propose a commons-based consumer ethics, which is founded on norms, practices and institutions (see table 1) as the basis for resources and relations in the commons.

We see this framework as providing a path forward for the consumer ethics literature which can go beyond the attitude behavior gap, for example, by highlighting infrastructures and other systemic aspects of consumption. For example, Laamanen and his coauthors (2018) demonstrate how commons communities create normative moral justifications for collective action. First, they contribute to social good and sustainability by increasing ability to participate in social interaction and sharing around common resources in the local setting. Second, their practice establishes an alternative valuation that allows participants to evaluate, value and trust each other's contributions to the community (e.g. receiving from the community as based on their need and giving back according to capacity). Third, local institutions build grassroots capacity where the community does not have to rely on established institutional governance models but create and rely on their norms and rules (supporting Ostrom's thesis). Finally, community norms and practice aim to reform the neoliberal subjectivity and institutions by engaging with and redefining the way in which individuals see themselves as economic actors and how they may collaborate with existing institutional forces (cf. Luedicke et al., 2010),

An introduction of a commons-based perspective to consumer ethics can redress the limits of the sustained focus on individual decision-making in consumption. Our approach can guide future empirical research examining consumers as the constructors of moral order and managers of shared resources and relations–commons and commoning–within their collectives.

REFERENCES

Arnould, Eric J. and Alexander S. Rose (2016), "Mutuality: Critique and substitute for Belk's "sharing"," *Marketing Theory*, 16(1), 75–99.

Belk, Russell (2010), "Sharing," *Journal of Consumer Research*, 36(5), 715-34.

Belk, Russell, Giana M. Eckhardt and Fleura Bardhi, eds. (2019), *Handbook of the Sharing Economy*, London: Edward Elgar.

Bardhi, F. and Giana M. Eckhardt (2012), "Access-based consumption: the case of car sharing", *Journal of Consumer Research*, 39(4), 881–98.

Devinney, Timothy M., Pat Auger, P. and Giana M. Eckhardt (2010), *The Myth of the Ethical Consumer*, Cambridge: Cambridge University Press.

Dubuisson-Quellier, Sophie (2013) *Ethical Consumption*. Winnipeg: Fernwood Publishing.

Duffy, Sarah, Roger Layton and Larry Dwyer (2017), "When the commons call "enough", does marketing have an answer?", *Journal of Macromarketing*, 37(3), 268–85.

Eckhardt, Giana M. and Susan Dobscha (2019), "The Consumer Experience of Responsibilization: The Case of Panera Cares", *Journal of Business Ethics*, 159, 651–63.

Giesler, Markus and Ela Veresiu (2014), "Creating the Responsible Consumer: Moralistic Governance Regimes and Consumer Subjectivity", *Journal of Consumer Research*, 41(3), 840–57.

Hardin, Garrett (1968), "The Tragedy of the Commons", *Science* (New Series), 162(3859), 1243–48.

Helfrich, Silke and David Bollier (2019), *Frei, fair und lebendig – Die Macht der Commons* [Free, fair and living – The power of the commons]. Bielefeld: transcript.

Laamanen, Mikko, Stefan Wahlen and Sylvia Lorek (2018), "A moral householding perspective on the sharing economy", *Journal of Cleaner Production*, 202, 1220–27.

Laamanen, Mikko, Christine Moser, Sanne Bor and Frank den Hond (2020), "A partial organization approach to the dynamics of social order in social movement organizing", *Current Sociology*, 68(4), 520–545.

Ladegaard, Isak (2018), "Hosting the comfortably exotic: Cosmopolitan aspirations in the sharing economy", *The Sociological Review*, 66(2), 381–400.

Luedicke, Marius K., Craig J. Thompson and Markus Giesler (2010), "Consumer Identity Work as Moral Protagonism: How Myth and Ideology Animate a Brand-Mediated Moral Conflict", Journal of Consumer Research, 36(6), 1016–32.

Micheletti, Michele (2003), *Political Virtue and Shopping*. New York, NY: Palgrave Macmillan.

Miller, Daniel (1998), *A Theory of Shopping.* Ithaca, NY: Cornell University Press.

Ostrom, Elinor (2010), "Beyond Markets and States: Polycentric Governance of Complex Economic Systems", *The American Economic Review*, 100 (3), 641–72.

Sahakian, Marlyne (2017), "Toward a more solidaristic sharing economy: Examples from Switzerland," in *Social change and the coming of post-consumer society: Theoretical advances and policy implications*, eds. Maurie J. Cohen, Halina Szejnwald Brown and Philip J. Vergragt, Abingdon: Routledge, 43–60.

Schor, Juliet (2020), *After the Gig*. Berkeley, CA: University of California Press.

Shultz, Clifford J., II and Morris B Holbrook (1999), "Marketing and the Tragedy of the Commons: A Synthesis, Commentary and Analysis for Action", *Journal of Public Policy and Marketing*, 18(2), 218–29.

Wahlen, Stefan and Mikko Laamanen (2017), "Collaborative consumption and sharing economies", in *Routledge Handbook on Consumption*, eds. Margit Keller, Bente Halkier, Terhi-Anna Wilska and Monica Truninger, Oxford: Routledge, 94–105.

Measuring Evidence For Causal Mediation When the Mediator is Not Directly Observed

Arash Laghaie, Goethe University Frankfurt, Germany
Thomas Otter, Goethe University Frankfurt, Germany

EXTENDED ABSTRACT

Mediation analysis is a tool to corroborate hypotheses about the process by which the experimental treatment brings about its effect on the dependent variable. Establishing mediation is fundamental to scientific research that seeks to understand "how the world works" in situationswhere the process connecting a manipulation to an outcome of interest is not directly observable. A finer process understanding itself is particularly important in situations where the manipulation under investigation brings about an effect one would like to control in the absence of direct control over the manipulation, e.g., the exposure to a virus, or in situations where the manipulation is required for other reasons, e.g., surgery. Knowledge of how to block the causal path from virus exposure to a disease through immunization helps avoid the negative consequences from the potential exposure to a virus, which cannot be directly controlled. Knowledge of how to block the transmission of nerve signals activated by a surgical incision makes it possible to conduct necessary surgery without the patient experiencing pain.

Finally, mediation is at the heart of a structural understanding of the world that would otherwise require a new theory for every manipulation studied. For example, the observation that color contrast (Thompson and Ince, 2013), typicality (Landwehr et al., 2011, 2013), exposure (Ferraroet al., 2008; Landwehr et al., 2017), or pronounceability (Alter and Oppenheimer, 2008; Song and Schwarz, 2009) manipulations all bring about effects on a variety of dependent variable mediated by processing fluency, parsimoniously structures our causal understanding of the world (Graf et al., 2018 . Relatedly, mediation defines subsets of variables that can be validly studied in isolation. For example, the understanding that the effect of variable production costs on demand is fully mediated by retail price allows for the exclusion of variable production costs from the price-demand model (and makes variable production costs a potential instrumental variable for price).

In the context of corroborating hypotheses about unobserved processes such as mediation, it is useful to distinguish between uncertainty about the strength of unobserved connections that are beyond questioning per se, and uncertainty about the connective structure itself. Empirical testing of the strength of connections in a given, undisputed model is a standard statistical exercise that may require sophistication nevertheless. Resolving uncertainty about the connective structure, and ideally establishing a unique causal interpretation of the connective structure supported by the data, is usually more difficult and often beyond reach in the context of observed data.

The goal of mediation analysis in practice squarely falls in the latter class of problems. When conducting mediation analysis, researchers do not ask for measures of coefficients in a model they know a priori. Instead, researchers ask what model generated the data. To this end, this paper provides tools and a procedure aimed at measuring data-based evidence for mediation. Our contribution is the synthesis of i) the causal identifiability of full mediation from observed variables (Glymour, 2001; Pearl, 2009), ii) Bayes factors as a measure of empirical evidence supporting full mediation (Nuijten et al., 2015), and iii) explicit models of measurement error (Holmbeck, 1997; Bolger, 1998; Hoyle and Kenny, 1999; Cole and Maxwell, 2003; MacKinnon, 2012). Our synthesis results in a procedure that can firmly establish the intended causal meaning of mediation analysis in so called measurement-of-mediation designs, or reveal that the causal interpretation of estimated coefficients, i.e., conclusions about the presence of mediation, depend on prior assumptions about the data generating mechanism. Importantly, our procedure distinguishes between measurement error as a reason for (causally) inconclusive results and other reasons.

We apply the proposed approach to mediation studies with open-data badge published in *Psychological Science* between January 2015 and September 2018. We compare our results to those from using Preacher and Hayes's bootstrapping approach. The proposed method offers three improvements in these studies: First, it measures the evidence in favor of full mediation through Bayes factor and distinguishes evidence for full mediation as the underlying causal structure from insufficient statistical information about a potential direct effect. Second, it affirms full mediation at the causal theory level, when the implied conditional independence relationship is obfuscated by measurement error or categorization. Third, in cases where even after accounting for potential measurement biases conditional independence is rejected, the proposed approach improves inference for indirect effect estimates, if one is willing to assume mediation as the causal model a priori.

REFERENCES

Alter, A. L., & Oppenheimer, D. M. (2008). Effects of fluency on psychological distance and mental construal (or why New York is a large city, but New York is a civilized jungle). *Psychological Science*, *19*(2), 161-167.

Bolger, N. I. A. L. L. (1998). Data analysis in social psychology. *Handbook of social psychology*, *1*, 233-65.

Cole, D. A., & Maxwell, S. E. (2003). Testing mediational models with longitudinal data: questions and tips in the use of structural equation modeling. *Journal of abnormal psychology*, *112*(4), 558.

Ferraro, R., Bettman, J. R., & Chartrand, T. L. (2009). The power of strangers: The effect of incidental consumer brand encounters on brand choice. *Journal of Consumer Research*, *35*(5), 729-741.

Glymour, C. N. (2001). *The mind's arrows: Bayes nets and graphical causal models in psychology*. MIT press.

Graf, L. K., Mayer, S., & Landwehr, J. R. (2018). Measuring processing fluency: One versus five items. *Journal of Consumer Psychology*, *28*(3), 393-411.

Holmbeck, G. N. (1997). Toward terminological, conceptual, and statistical clarity in the study of mediators and moderators: Examples from the child-clinical and pediatric psychology literatures. *Journal of consulting and clinical psychology*, *65*(4), 599.

Hoyle, R. H., & Kenny, D. A. (1999). Statistical power and tests of mediation. *Statistical strategies for small sample research*, 195-222.

Landwehr, J. R., Labroo, A. A., & Herrmann, A. (2011). Gut liking for the ordinary: Incorporating design fluency improves automobile sales forecasts. *Marketing Science*, *30*(3), 416-429.

Landwehr, J. R., Wentzel, D., & Herrmann, A. (2013). Product design for the long run: Consumer responses to typical and atypical designs at different stages of exposure. *Journal of Marketing*, *77*(5), 92-107.

Landwehr, J. R., Golla, B., & Reber, R. (2017). Processing fluency: An inevitable side effect of evaluative conditioning. *Journal of Experimental Social Psychology*, *70*, 124-128.

MacKinnon, D. P. (2008). *Introduction to statistical mediation analysis*. Routledge.

Nuijten, M. B., Wetzels, R., Matzke, D., Dolan, C. V., & Wagenmakers, E. J. (2015). A default Bayesian hypothesis test for mediation. *Behavior research methods*, *47*(1), 85-97.

Pearl, J. (2009). *Causality*. Cambridge university press.

Preacher, K. J., & Hayes, A. F. (2004). SPSS and SAS procedures for estimating indirect effects in simple mediation models. *Behavior research methods, instruments, & computers*, *36*(4), 717-731.

Song, H., & Schwarz, N. (2009). If it's difficult to pronounce, it must be risky: Fluency, familiarity, and risk perception. *Psychological Science*, *20*(2), 135-138.

Thompson, D. V., & Ince, E. C. (2013). When disfluency signals competence: The effect of processing difficulty on perceptions of service agents. *Journal of Marketing Research*, *50*(2), 228-240.

Doing More for Less: The Easy Addendum Effect in Goal Pursuit

Edward Yuhang Lai, Virginia Tech, USA
Julio Sevilla, University of Georgia, USA
Mathew S. Isaac, Seattle University, USA
Rajesh Bagchi, Virginia Tech, USA

EXTENDED ABSTRACT

"Much of consumer behavior is goal-directed" where consumers try to complete tasks and achieve goals (Bagozzi and Dholakia 1999, p. 19). Often, multiple similar tasks are performed successively in the pursuit of a single goal. For example, a student may have to study different chapters in a book (one after the other) to prepare for an exam, while a professor may have to grade one exam after another sequentially. A key factor that affects goal setting and overall goal pursuit in such contexts is perceptions of goal attainability; indeed, people prefer goals that are easier to attain—thus, even at goal initiation, they adopt goals with a multiple-means structure (Huang and Zhang 2013) or with more varieties of means (Etkin and Ratner 2012). We propose a novel approach to reduce effort perceptions: adding easier tasks at the end of a sequence of difficult tasks can sometimes reduce effort perceptions of the overall task.

We draw from the literature on assimilation of affective experiences to explain how individuals might retrospectively judge effort investment in our contexts. Research suggests that when evaluating a set of affective experiences, such as pain, people use the peak-end rule; that is, people take the weighted average of the peak amount and the final amount of pain experienced to judge the overall level of pain experienced (Fredrickson and Kahneman 1993; Thomas, Olsen, and Murray 2018). Though these effects have been demonstrated in medical contexts (Redelmeier and Kahneman 1996; Redelmeier, Katz, and Kahneman 2003), they do not always emerge (Thomas et al. 2018; Tully and Meyvis 2016). Extending these effects to goal pursuit, we propose that a saliently different, albeit easier, ending will lower overall effort assessments. This effect is driven by perceptions of overall task difficulty (a difficulty-effort bias). Five experiments demonstrate this effect and provide evidence for the process.

In Study 1, 210 undergraduate students completed a typing task. In the control condition, participants typed 10 difficult codes, each comprising of 10 characters. In the easy addendum condition, we added three additional easy codes, each comprising of three characters. Participants then reported how much effort they spent on the task. Participants in the easy addendum condition believed they spent less effort, even though they had actually typed three extra codes.

In Study 2, 288 MTurk workers performed the same typing task as in Study 1. Participants in the easy addendum condition perceived that they exerted less effort than those in the control condition and felt the task was less difficult, which mediated our results.

In Study 3, we demonstrate how our effects influence a marketplace variable—pay. We presented 194 undergraduate students with an invisible slider that was anchored by 0 and 100. In the control condition, participants were given 10 numbers (sequentially; e.g., 5, 15) and were asked to identify the position of the numbers on the sliders. In the easy addendum condition, we appended three easy sliders at the end, each with 10 other numerical anchors between 0 and 100, making position identification easier. We added another "false easy addendum" condition, where only one (vs. three) easy slider task was appended at the end. In order for the "easy addendum" effect to emerge, it is important for the easy sliders to obfuscate the effects of the difficult tasks. This can only occur if the easy tasks are judged as a category. Results showed that participants in the "easy addendum" condition indicated that they deserved a lower pay than those in the other two conditions.

In Study 4, 291 undergraduate students from two large universities participated in the same task as in Study 3. We kept the same control and easy addendum conditions and added a new third condition—the "unrecognized easy addendum" condition. In the third condition, the three additional sliders looked the same as those in the control condition. However, we accepted a larger range of solutions. For example, participants did not have to find the exact position of 45 but merely hit any position in the 40-50 range. Therefore, these additional slider tasks looked identical to the other sliders but were easier. After completing the task, participants reported their effort and difficulty perceptions. Participants in the easy addendum condition felt they spent less effort and that the task was easier than those in the other two conditions. A multi-categorical mediation analysis using Process Model 4 (Hayes 2018) revealed that the perceived overall task difficulty only mediated the effect between the control and the easy addendum conditions.

In Study 5, we presented 255 undergraduate students with a hand grip dynamometer and asked them to apply pressure at a specified strength level for 10 seconds. In the control condition, they completed 9 difficult levels (varied by gender, based on pre-test). In the "easy addendum" condition, three easy levels were appended to the task. Then, participants indicated how much effort this task required and how difficult it was. We conducted a 2 (control vs. easy addendum) X 2 (gender) ANOVAs to control for gender effects. The interactions were not significant for either of the two measures. Participants in the easy addendum conditions thought they spent marginally less effort than those in the control condition. They also perceived the task as less difficult. More importantly, the mediation of perceived difficulty was significant.

More often than not we have little control on the nature of the tasks assigned to us. Employees may not be able to choose which tasks to do and which not to. Consumers cannot choose to bypass certain tasks when pursuing their loyalty program goals. Teachers cannot significantly lower the difficulty of an important assignment just to make students happy. However, we show that keeping difficulty constant, perceptions of difficulty associated to a task can be reduced by merely adding simple items at the end. Hence, the present findings may have a profound impact on how to structure a task, allocate workload at the workplace, as well as design an optimal consumer loyalty program to enhance engagement and well-being.

REFERENCES

Bagozzi, Richard P. and Utpal Dholakia (1999), "Goal Setting and Goal Striving in Consumer Behavior, " *Journal of Marketing*, 63(4, suppl. 1), 19-32.

Etkin, Jordan and Rebecca K. Ratner (2012), "The Dynamic Impact of Variety among Means on Motivation," *Journal of Consumer Research*, 38(6), 1076–92.

Fredrickson, Barbara L and Daniel Kahneman (1993), "Duration Neglect in Retrospective Evaluations of Affective Episodes," *Journal of Personality and Social Psychology*, 65(1), 45–55.

Hayes, Andrew F. (2018), *Introduction to Mediation, Moderation, and Conditional Process Analysis : A Regression-Based Approach*, 2nd ed., New York, NY: The Guilford Press.

Huang, Szu-chi and Ying Zhang (2013), "All Roads Lead to Rome: The Impact of Multiple Attainment Means on Motivation," *Journal of Personality and Social Psychology*, 104(2), 236–48.

Redelmeier, Donald A. and Daniel Kahneman (1996), "Patients' Memories of Painful Medical Treatments: Real-Time and Retrospective Evaluations of Two Minimally Invasive Procedures," *Pain*, 66(1), 3–8.

Redelmeier, Donald A., Joel Katz, and Daniel Kahneman (2003), "Memories of Colonoscopy: A Randomized Trial," *Pain*, 104(1–2), 187–94.

Thomas, Dominic, Douglas Olsen, and Kyle Murray (2018), "Evaluations of a Sequence of Affective Events Presented Simultaneously: An Investigation of the Peak-End Rule," *European Journal of Marketing*, 52(3–4), 866–81.

Tully, Stephanie and Tom Meyvis (2016), "Questioning the End Effect: Endings Are Not Inherently Over-Weighted in Restrospective Evaluations of Experiences," *Journal of Experimental Psychology: General*, 145(5), 630–42.

Understanding the Power of the Temporal Retention of e-Commerce Websites Thanks to the Stated Preferences Approach – a First Step

Dimitri Laroutis, EM Normandie Métis Lab, Le Havre, France
Philippe Boistel, ESC Amiens, Amiens, France
Yann Tournesac, ESC Amiens, Amiens, France

EXTENDED ABSTRACT

In 2018, Facebook announced a fall of 7% in the amount of time users spent on the website (around 2 minutes a day). In parallel, Facebook's share price fell 20% (about 100 billion dollars).

The time users spend on websites is called stickiness. For Zott *et al.* [1], stickiness "involves the ability of websites to draw and retain customers." This retention capacity appears as one of the keys to profitability [2]. While recent research [3] has underscored the importance of stickiness in acquiring a competitive advantage by retaining visitors, gaps remain in our understanding of this indicator. The explanatory factors regarding a website's stickiness remain indefinite, especially for e-commerce businesses.

The aim of this study is to identify the explanatory factors underlying the stickiness of French online retailer websites and to measure their respective importance. By adopting the stated preferences approach, a quantitative study was conducted with 245 online buyers.

Literature Review

No studies have focused on stickiness [4], many scholars on consumer and e-consumer purchasing behaviour have referred to both the importance of time spent on a website and the interest of certain factors that could influence this behaviour.

Lemoine [5] highlights factors linked to time spent lingering, including the visuals. Website aesthetics play a crucial role with regard to the amount of time visitors spend on a website. Reichheld and Scheffer [6] note that a website with good visuals influences the amount of time users stay on the site. Rayport and Svioka [7] suggest that a website's value is defined by the information given, the site format and the infrastructure providing the connection. Lippert and Wilder [8] argue that the intention to return is influenced by the perception of the website's value.

It is crucial to work on creating a strong affective relationship with the brand in order to prevent customers from migrating [9]. The more a customer trusts a website, the stronger the resulting stickiness, and the greater the purchasing intent [2]. Gefen *et al.* [10] however argue that trust needs time to develop and numerous exchanges and interactions that require significant budgets. Website's customers express requirements similar to those of traditional commerce: politeness, flattery and social identity [11].

The purchasing environment can impact on individuals' emotional and attitudinal responses [20]. For Volle and Florès [12], "the main factor which appears to trigger the intention to visit a site again is the quality of the online experience."

Methodology

The methodology adopted is the stated preferences approach. It was developed by two Nobel prize-winners ([13]) in order to understand the willingness of individuals to undertake action when faced with the challenges of the market. Individual willingness to stay on an e-commerce website is evaluated through the administration of a questionnaire and econometric modelling of the data. The questionnaire was pre-tested (11 persons). The questionnaire was designed in accordance with the directives of Arrow *et al.* [13] and Johnston *et al.* [14]. We adopted several existing measurement scales ([15], [16]). The questionnaire contained 56 questions and was given to 245 internet users.

Results

Use of the stated preferences method requires an econometric approach (Tobit type model - because of censored variable). Tables 2 and 3 present the significant variables of the Tobit model.

We confirm that a site with impressive visuals will encourage a user to stay longer. Individuals perceive aesthetics as a guarantee of quality, simultaneously arousing their curiosity and creating proximity with the company. Computation of the marginal effects enabled us to evaluate the impact on stickiness at 4 minutes.

Ergonomics and customer experience are significant factors. By calculating the marginal effects, we estimate the impact of ergonomics at 17 minutes.

We constate the importance of a social presence and the need for interaction between present and future customers. This search for objective relational information increases the presence of visitors by 5 minutes.

When browsing an e-commerce website is enjoyable, visitors will spend more time on it. A 'wellbeing' environment encourages positive emotions and behaviour (10 minutes more than other).

We identified two other significant variables: the price variable and the gender variable. Competitive price positioning encourages visitors to stay longer on the site (11 minutes). No other study has included the impact of price on stickiness. We showed that gender is a factor in the time spent on a website. Women generally spend longer (around 10 minutes) than men.

We can split the variables into 3 main groups (Table 4): a low impact (5 minutes), real impact (10 minutes), decisive impact (17 minutes). The complexity of stickiness is illustrated (Figure 1) by the presence of the violet areas.

Management implications

Ergonomics is the central variable keeping visitors on a website (17 minutes). The site's ergonomics must include customer feedback in a coherent way. Information about other customer reviews helps to increase stickiness from 4 to 5 minutes. We recommend incorporating 2 features for consumers: the possibility to rapidly consult the customer reviews; the possibility to post a message as soon as the product has been purchased or delivered.

Sites should highlight low prices to make their website stickier (a comparative table of prices would add value to the offer and reassure buyers). Highlighting the quality of a service with a score from the customers regarding the service will reinforce the site's stickiness.

Since we saw that gender has a strong impact on the desire to stay on a site, should websites develop different content for women and for men?

Conclusion

Use of the stated preferences approach enabled us to identify the willingness of individuals to linger on a website, defining the factors that help to enhance the stickiness. This method is flexible and helps to extend the scope of investigation. Concerning the theoretical

contribution, our study set out to define the concept by identifying its main factors. Our managerial contribution involved clarifying which factors influence the stickiness. Companies can now rank the actions it needs to implement as a priority.

Our study nonetheless has some limitations. We adopted an exploratory approach and our questionnaire was broad. Our approach is relatively novel. Finally, this study is just a first step in defining the stickiness concept.

REFERENCES

[1] Zott C., Amit R. & Donlevy J. (2000), Strategies for values creation in e-commerce: best practice in Europe, *European Management Journal,* N°18, p. 463-475.

[2] Bhatnagar A. & Ghose S. (2004), An analysis of frequency and duration of search on the Internet, *Journal of Business,* N° 77, p. 311-330.

[3] Lin Y.-H., Lee W.-H. & Giang C.M. (2016), The formation of Facebook stickiness: The perspectives of media richness theory, use & gratification theory and intimacy, PACIS 2016.

[4] Haiping W., Guona G.., Shihu A. & Guanchun Z. (2014), Understanding Online Consumer Stickiness in E-commerce Environment: A Relationship Formation Model, *International Journal of u- and e-service*, Vol. 7, N°3, p.151-162.

[5] Lemoine J.-F. (2008), Atmosphère des sites web marchands et réactions des internautes, *Revue Française du Marketing,* N°217, p. 45-61.

[6] Reichheld F.F. & Schefter F. (2000), E-loyalty: Your secret weapon on the web. *Harvard Business Review*, N°78, p.105-113.

[7] Rayport J. & Svioka J. (1994), Managing the marketspace. *Harvard Business Review* Nov-Dec, p.141-150.

[8] Lippert G. & Wilder R. (2001), Add stickiness to you site with an intuitive and user-friendly interface. *Inside the Internet*, pp. 8-11.

[9] Kapferer J.-N. (2002), Ce qui va changer dans les marques, Ed. Organisations, p. 202.

[10] Gefen D., Karahanna E., & Straub D.W. (2003), Trust and TAM in online shopping: an integrated model. *MIS Quarterly*, N°27, p. 51–90.

[11] Moon Y. (2000), Intimate exchanges: Using computers to elicit self-disclosure from consumers. *Journal of Consumer Research*, Vol 26, N°4, p. 323-339.

[12] Volle P. & Florès L. (2005), Potentiel relationnel et impact du site de marque sur la performance marketing, *Décisions Marketing,* N°40, p. 39-50.

[13] Arrow K., Solow R., Portney P.R., Leamer E.E., Radner R., & Schuman H. (1993). *Report of the NOAA Panel on Contingent Valuation*. NOAA. p. 67.

[14] Johnston R.J., Boyle K.J., Adamowicz W., Bennett J., Brouwer R., Cameron T.A., Hanemann W.M., Hanley N., Ryan M., Scarpa R., Tourangeau R. & Vossler C.A. (2017), Contemporary Guidance for Stated Preference Studies, *JAERE*, Vol 4, N°2, p. 319-403.

[15] Lacoeuilhe J. (2000). L'attachement à la marque : proposition d'une échelle de mesure. *Recherche et Applications en Marketing*, Vol. 5, N° 4, p.61-77.

[16] Hess J. (1995). Construction and assessment of a scale to measure consumer Trust. Conférence AMA Educators', Enhancing Knowledge Development in Marketing, éds B.B. Stern and G.M. Zinkhan, Vol. 6, pp. 20-25.

How Can Consumers Both Value and Resist Consumption? An Exploration of Consumer Relationships with Possessions in Their Pursuit of Happiness

Hsin-Hsuan Meg Lee, ESCP Business School, UK
Charlotte Gaston-Breton, ESCP Business School, Spain

EXTENDED ABSTRACT

Will mindful consumers ever find happiness? Alternatively, and maybe more realistically, will happy consumers ever be mindful? Creating happiness is often seen as the central idea of businesses to encourage consumption, which is inherently in contradiction with the movement of mindful consumption where the pursuance of happiness is built upon the reduction of consumption (Lee & Ahn, 2016). The incongruity perhaps lies in what types of happiness or unhappiness consumers attribute to their consumption and the relationships they have with their possessions.

While consumer happiness has been well investigated in the past, prior research tends to focus either on the acquisition, i.e., the moment of purchase (e.g., Nicolao, Irwin & Goodman, 2009), or dispossession, i.e., the moment of disposition (e.g., Donnelly et al., 2017). Much of our understanding of consumer relationships with objects is centered around these two momentary stages. Once an item is in our possession, we, however, form a long-term relationship with it. In this study, we argue that how consumers define and understand their subject-object relationships, and how they obtain happiness through possessions would eventually influence their decisions on dispositions and, in turn, on future consumption.

Prior research suggests that consumers may find happiness in thinking they are contributing to the greater good, which can be associated with eudaimonic wellbeing as it emphasizes on meaning and purpose in life (Ryan, Huta, & Deci, 2008). Alternatively, it may also come from the feeling of regaining control of oneself and reduced stress level that is related to the variety and the number of choices offered in the marketplace (Lee & Ahn, 2016). This wellbeing is indeed more individual and hedonic. A prior study found that egoistic motivations are more effective than altruistic ones in driving consumers' mindful consumption (Birch, Memery & Kanakaratne, 2018). This seems to create a paradox where the over-emphasis on hedonic and personal wellbeing may end up encouraging more consumption, albeit mindful. We argue that the difference in motivations and focuses of wellbeing could lead to distinct and sometimes opposite results in one's view on consumption.

Using the popular Marie Kondo's decluttering method (2014) as the backdrop, this study conducted a content analysis on 39 blog narratives of the KonMari converts (Yourgrau, 2015) to understand how consumer's relations with the objects enhance their individual and/or collective happiness to transform their consumption patterns. The blog transcripts, the verbal and visual content of the documentaries, were analyzed. An initial coding scheme was developed based on the steps identified in the KonMari method as well as the three critical stages in our study: motivations and reflections, dispossession and repossession, and consequences on future consumption. The analysis was built on continual comparisons between the data collected from different participants.

The results indicate that the KonMari method prompts people to revisit why they own what they own and how it contributes to their wellbeing. The mindfulness experienced while decluttering leads to reinforce or reduce the pursuit of either individual and/or collective wellbeing in future consumption. Contrary to popular belief that the method can encourage the pursuance of a sustainable lifestyle, most respondents reported feeling liberated. They seemed to find the excuse to prioritize their wellbeing, which justified the decisions of discarding usable items. In pursuing this individual wellbeing, societal and environmental wellbeing may be sacrificed. Under such conditions, a few, but still, reported a positive influence on their future sustainable behavior. This may result from their distinct motivations and aspects in subject-object relationships that they prioritize.

There is a distinct difference in how people view their possessions. Some saw their possessions as their extended selves. Respondents who support this view appeared to focus more on the momentary value of the possessions; the happiness came from the moment of consumption, which represented who they were. It also seems common to acknowledge the notion that people can change. The combined arguments make it easier to discard items. This emphasis on the present term, naturally, prohibits the long-term and sustainable view of consumption.

On the flip side, when the possessions are here to serve a need, and the respondents hire objects "to accomplish a job," this distance between the subject and object made it harder to discard an item. This is because such a relationship between subject and object has a likelihood to continue even though the participants may have changed. This sometimes intertwined with the view that possessions can provide happiness, and consumption can bring wellbeing. Those who can see the time value of items, be able to justify the future use or the continuous benefits an object can bring, they ended up having reinforced relationships with their possessions. This repossession can make them cherish the objects even more.

The practice of decluttering that focuses on wellbeing signifies the attribution of the source of happiness or unhappiness. One observable difference is that some people would attribute objects to be the source of their joy. Many participants who agreed with this line of arguments, albeit reporting being more mindful, did continue their consumption, only focusing more on items that would create hedonic happiness. The others who attribute objects to the source of their unhappiness, whether because of the volume or the value of the possessions, tend not to seek wellbeing through consumption. They would argue that happiness comes from their family, friends, and other pursuits in life. These are the people who would report mindful consumption that is more sustainable as well. Their quest for happiness would tend to be more eudaimonic.

In answering our research questions, we provide insights on how wellbeing can be enhanced throughout the relationships between subject and object(s) in order to drive mindful or sustainable consumption. We highlight the potential damage one can create by being sustainable-driven, as well as the potential benefits on societal wellbeing while focusing on personal wellbeing. Since we only focused on subject-object relationships under a particular backdrop, the motivations and the characteristics of the participants can be biased. Future research can include scenarios where people are relocating and examining their decision processes.

REFERENCES

Birch, D., Memery, J., & Kanakaratne, M. D. S. (2018). The mindful consumer: Balancing egoistic and altruistic motivations to purchase local food. *Journal of Retailing and Consumer Services*, *40*, 221-228.

Donnelly, G. E., Lamberton, C., Reczek, R. W., & Norton, M. I. (2017). Social Recycling Transforms Unwanted Goods into Happiness. *Journal of the Association for Consumer Research*, 2(1), 48–63.

Kondo, M. (2014). *The Life-Changing Magic of Tidying up: The Japanese Art of Decluttering and Organizing*. Ten Speed Press.

Lee, M. S., & Ahn, C. S. Y. (2016). Anti-consumption, materialism, and consumer wellbeing. *Journal of Consumer Affairs*, *50*(1), 18-47.

Nicolao, L., Irwin, J., & Goodman, J.K. (2009). Happiness for sale: Do experiential purchases make consumers happier than material purchases? *Journal of Consumer Research*, 36(2), 188-198.

Ryan, R. M., Huta, V., & Deci, E. L. (2008). Living well: A self-determination theory perspective on eudaimonia. *Journal of Happiness Studies*, *9*(1), 139-170.

Yourgrau, B. (2015). The origin story of Marie Kondo's decluttering empire. *New Yorker*.

Consumers' Inconsistence About Hypocrisy: RevisitingThe Concept of Corporate Hypocrisy

Susanne Täuber, University of Groningen, The Netherlands
Marijke C. Leliveld, University of Groningen, The Netherlands

EXTENDED ABSTRACT

With increasing CSR engagement from companies, there is also a call for understanding corporate hypocrisy: consumers oftentimes observe inconsistencies between words and deeds. Consumers' perceptions of a company as hypocritical form a key mechanism that critically affects consumers' overall attitudes towards the company. Corporate hypocrisy is commonly defined in alignment with interpersonal hypocrisy, namely as resulting from inconsistencies between an organization's statements and behaviors (Wagner et al., 2009). Consensus about the association between inconsistency and hypocrisy in interpersonal judgments is lacking. In particular, some scholars claim that people can be inconsistent without being seen as hypocritical (e.g., Alicke et al., 2013). Others claim that people can be hypocritical without being seen as inconsistent (e.g., Monin & Merritt, 2012). Yet others claim that perceived inconsistency will invariably elicit hypocrisy judgments (e.g, Effron, Luca, & O'Connor, 2015). This warrants more research into the proposed relationship in consumer contexts.

We propose that a finding from interpersonal hypocrisy research that has been less well explicated and tested in consumer research, may be helpful in identifying boundary conditions for the relationship between factual inconsistency, perceived inconsistency and hypocrisy. This proposition concerns the aggravation of hypocrisy judgments when the other person evinced an *air of superiority*. In organizational contexts, superiority is commonly associated with organizations' morality, which refers to corporate social and environmental responsibility as indicating virtuousness (Cameron et al 2004). We therefore propose that moral positioning might aggravate perceptions of corporate hypocrisy. Thus, while research suggests that companies benefit from moral positioning because it allows them to distinguish themselves positively from their competitors (Sen et al, 2016), it might also make them more susceptible to ascriptions of hypocrisy from consumers. Put formally:

Hypothesis 1: *Inconsistencies – as opposed to consistencies - between saying and doing result in perceptions of corporate hypocrisy.*

Hypothesis 2: *This effect is stronger for organizations positioning themselves as moral, compared to organizations positioning themselves as competent.*

Note that we also measured perceived inconsistency, which lacks the strong moral connotation of hypocrisy, and that we studied inconsistencies with and without transgressions, to explore in more detail how the aggravation works exactly.

Aiming to conceptually replicate prior studies (e.g., Wagner, et al., 2009), we tested the effect of inconsistency on consumer punishment intentions towards actual brands as mediated by perceived corporate hypocrisy.

Hypothesis 3: *Perceived corporate hypocrisy mediates the effect of objective inconsistency on punishment intentions.*

The complete model thus tests a moderated mediation:

Hypothesis 4: *Perceived corporate hypocrisy mediates the interactive effect of objective inconsistency and company positioning on punishment.*

Study 1 examined whether organizations' positioning is consequential for consumers' perceptions of inconsistency. 458 participants recruited through MTurk were randomly assigned to the conditions of a 2 (Positioning: moral vs. competent) x 3 (Inconsistency: none vs. without transgression vs. with transgression) between-subjects design. Participants read that Company X's aim was to produce in more sustainable [efficient] ways to improve the environment [product quality]. They were striving to improve 10 points on the "consumer score" (a supposedly objective measure of performance). The score reflecting Organization X's achievements regarding this specific aim went up by 10 points (+ 10)/ remained unchanged (+/- 0)/ went down by 10 points (-10) (respectively consistency, inconsistency without transgression, and inconsistency with transgression). Participants then indicated the extent to which Company X's behavior was consistent and inconsistent (reversed coded) with their aim (1 = *not at all; 7 = completely; r =* .86, *p <* .001*)*.

Results showed main effects of both independent variables, F's > 10, p's = .001. Importantly, the interaction term was also significant, $F(2,452)=16.07$, $p<.001$, $\eta_p^2=.07$. Tests for simple main effects revealed that *Positioning* did not affect perceived consistency when the organization's behavior was consistent with their aim, and when the inconsistent behavior did not involve a transgression, both F's < 0.27, p's > .60. By contrast, when the company's inconsistent behavior involved a transgression, the company with the moral aim was perceived as significantly less consistent (M=1.94) than the organization with the competent aim (M=3.39), $F(1,452)=41.99$, $p<.001$, $\eta_p^2=.09$.

Study 2 tested the entire conceptual model. A representative sample of Dutch consumers ($N = 522$) evaluated Dutch chocolate brands with a moral (Tony Chocolonely) vs. a competent (Verkade) reputation, as established through a pre-test. After reading the description of the brand's aims and behavior, participants indicated perceived consistency and inconsistency. We further measured perceived hypocrisy using the scale of Wagner et al. (2009; α = .93). Finally, participants were presented with a list of 5 options (e.g., participating in a test panel, receiving the brand's newsletter) which they had to actively uncheck if they did not want to make use of it. The number of remaining checked options were used as an index of brand-engagement.

For perceived consistency, we found an Inconsistency effect (no Brand effect) which was qualified by an interaction with Brand, $F(2,514)=4.89$, $p = .008$. Inconsistency significantly affected perceived inconsistency of the moral brand Tony Chocolonely, $F(2,514)=14.80$, $p < .001$, but not of the competent brand Verkade, $p > .72$. Further, replicating Study 1, moral brand positioning led to aggravated perceptions of inconsistency only when inconsistency involved a transgression, $p = .035$, and not inconsistency without transgression: $p = .967$. We found similar pattern of results for hypocrisy. The main effect of Inconsistency was qualified by an interaction with Brand, $F(2,510)=5.29$, $p = .005$. Objective inconsistency significantly affected perceived hypocrisy of the moral brand, $F(2,510)=14.70$, $p < .001$, but not of the competent brand, $F<2.10$, $p > .13$. PROCESS

analyses (model 7) showed that while manipulated inconsistency directly affected brand-engagement (effect = .16, t = 3.13, p = .002, $CI_{95\%}$ .061, .265), the indirect effect through perceived corporate hypocrisy was significant for the moral brand ($CI_{95\%}$ -.141, -.055) but not for the competent brand ($CI_{95\%}$ -.051, .022). The Index of Moderated Mediation was significant (effect = .10, $CI_{95\%}$ .042, .165).

The studies suggest that the benefit of moral positioning can turn into a backlash prompting consumers to perceive the brand as more inconsistent and hypocritical than their competently positioned competitors, resulting in lower brand-engagement.

REFERENCES

Alicke, M., Gordon, E., & Rose, D. (2013). Hypocrisy: what counts?. *Philosophical Psychology*, *26*(5), 673-701.

Cameron, K.S., Bright, D. and Caza, A. (2004) Exploring the Relationships between Organizational Virtuousness and Performance. *American Behavioral Scientist, 47*, 766-790.

Effron, D. A., Lucas, B. J., & O'Connor, K. (2015). Hypocrisy by association: When organizational membership increases condemnation for wrongdoing. Organizational Behavior and Human Decision Processes, 130, 147-159.

Monin, B., & Merritt, A. (2012). Moral hypocrisy, moral inconsistency, and the struggle for moral integrity. In Mikulincer, M. & Shaver, P. R. (Eds). The social psychology of morality: Exploring the causes of good and evil, (pp. 167-184). Washington, DC, US: American Psychological Association

Sen, S., Du, S., & Bhattacharya, C. B. (2016). Corporate social responsibility: a consumer psychology perspective. Current Opinion in Psychology, 10, 70-75.

Wagner, T., Lutz, R. J., & Weitz, B. A. (2009). Corporate hypocrisy: Overcoming the threat of inconsistent corporate social responsibility perceptions. *Journal of Marketing, 73*, 77-91.

The Neglected Victim Effect

Liat Levontin, Technion University, Israel
Danit Ein-Gar, Tel Aviv University, Israel
Tehila Kogut, Ben Gurion University, Israel

EXTENDED ABSTRACT

People are kind by nature, and it is most often the case that they help when others are in need (De Dreu, Balliet, & Halevy, 2014). In this paper, we show that sometimes people find it difficult to help others—not because help is beyond their reach, but rather because providing help conflicts with the wish to do so in a fair manner. Consider the case where you have a single bill of money and need to decide which of two beggars should receive it. On the one hand, any help is better than no help—so you tend to be kind and helpful, and choose to give the bill to one of the beggars. On the other hand, helping one beggar and not the other is unjust.

The dilemma of choosing whom to help from a choice set of several identifiable victims is a prevalent phenomenon. Many charitable organizations such as organizations dedicated to helping children of developing countries, helping students who cannot afford tuition fees and even saving wildlife or companion animals offer potential donors the option to view many victims and decide to whom to dedicate their donation. Interestingly, however, the question as to whether or not offering donors the option to choose from a choice set of identifiable victims is beneficial has yet to be answered.

The present research proposes that donation appeals that require the prospective donors to choose one identifiable victim from a choice-set of two inevitably also involves deciding who is neglected and not helped. While individuals want to help, and to feel good about doing so (such as feelings of "warm glow"—Andreoni 1990), the choice context, by default, creates a conflict between this and their wish to be fair and just. We argue that the conflict between the wish to help and the wish to be fair eventually leads prospective donors to avoid making any donation whatsoever—a phenomenon that we term the Neglected Victim Effect. We show that, counter-intuitively, the practice of offering a choice-set, which works so well for consumer goods and services (e.g., Adomavicius & Tuzhilin, 2005), backfires when it comes to charitable giving.

Most studies on donation-giving focused on the intention to donate, and how much to give, while not presenting the option of not to donate (at least, not explicitly). When considering donation-giving behavior, the option to refrain from donating is as vivid and valid as the decision to make a choice and donate. Research on choice has shown that when a no-choice option is presented in an equally compelling fashion, consumers' decision considerations change (e.g., Dhar & Simonson, 2003). The question we set out to answer, therefore, is how donors would respond when presented with a choice-set of several identifiable victims and are given an explicit "no-choice" option?

According to rational choice theory, when presented with a choice set of several options, individuals tend to choose the option that maximizes their interests and provides them with the greatest utility or benefit (e.g., Friedman, 1953). However, when no single alternative has a decisive advantage, and the option not to choose any of the alternatives is available, consumers prefer the "no-choice" option to an alternative that is difficult to justify, to avoid criticism, or regret (Dhar, 1997; Dhar, & Simonson, 2003).

Choice in the context of charitable giving is unique for many reasons, but the most important one - is that the decision affects other people and their lives (Beattie, Baron, Hershey, & Spranca,1994) and therefore raises moral considerations. Most people want to help others in need and feel good after doing so (Andreoni, 1990; Dorfman, Eyal, & Bereby-Meyer, 2014). Therefore, generally, we would expect individuals faced with a choice-set, to choose to help one of the victims. However, by choosing one victim, they also deny help from the non-chosen victim. This decision to neglect a victim is perceived as unfair. Being fair and just, while avoiding unjustifiable favoring of one person over the other, is a virtuous behavior (Blasi, Kurtines, & Gewirtz, 1994). When resources are limited and can only be shared with one of two equally deserving individuals, people tend to discard the resource rather than allocate it unequally (Shaw & Knobe, 2013; Shaw & Olson, 2012). In this research, we argue that choice in the context of charitable giving triggers a conflict between the wish to donate and do good, and the wish to be fair and impartial. This conflict, we suggest, may lead to choice-avoidance and opt-out. We term this the Neglected Victim Effect. The Neglected Victim Effect hypothesis suggests that when prospective donors are asked to choose their donation target from a choice-set of more than one identifiable victim—which means they would help one victim but neglect the other—they choose to opt-out and refrain from donating altogether, more often than when faced with a donation request for a single identifiable victim. We suggest that the conflict between the wish to be helpful and the wish to act fairly is the underlying driver of the Neglected Victim Effect—such that we would expect a stronger conflict among prospective donors who are asked to choose a single donation target out of several, than those who are solicited for a donation for a single identifiable victim.

Experiment 1 (N=306) compared the opt-out rates (i.e., the percentage of participants who refrained from donating altogether) between two conditions. In both conditions, participants were presented with two identifiable victims, with the same need and similar characteristics. However, in the Neglected Victim (NV) condition, participants were asked to choose whom to donate to (and whom to neglect), while in the Multiple Identifiable Victims (MIV) condition, they were asked to donate for only one of the two victims. Participants were informed about an organization dedicated to helping children in need ("The Good Neighbor Association"). In the NV condition, participants were told about two girls in need of donations—"Caroline" and "Agnes," both of whom were introduced with a photograph and a short description—and asked to choose between donating to one of them, or not donating at all. In the MIV condition, they were told about the same two girls but asked whether they would like to donate to one girl or the other (assigned to the participants at random)—i.e., they did not need to choose between the two girls. After making their decision, participants who had decided to donate indicated on a 100-point scale (ranging from $0 to $1) how much of their bonus money they were willing to donate We hypothesized that, in the NV condition, the number of participants deciding to opt-out and not to donate would be higher than in the MIV condition.

Overall, more participants chose to donate ($N = 203$; 66%) than to opt out ($N = 103$; 33%). Importantly, as hypothesized, significantly more participants refrained from donating and chose to opt out in the NV condition ($N = 50/102$; 49%) than in the MIV condition ($N = 53/204$; 26.0% χ^2 (1) = 16.16, $p < .001$). Interestingly, those who donated in the NV condition did not donate higher amounts ($M = .53$; $SD = .37$) than donors in the MIV condition ($M = .49$; $SD = .34$; F (1,184) = .45, $p = .504$).

Experiment 2 (N=419), further tested the Neglected Victim Effect using the same stimuli as in Experiment 1, but comparing opt-out rates between three conditions: (1) The neglected victim (NV) condition (as in experiment 1); (2) A control condition seeing two victims but considering only 1 (MIV; as in experiment 1); and (3) A control condition of a single identifiable victim in which participants were told about one girl in need (randomized between "Caroline" and "Frida"), and asked whether they would be willing to donate to her or not without being aware of any other girl in need (SIV). After making their decision, participants reported which of two considerations was more prominent when making their choice, the wish to help others (0) or the wish to be fair and impartial (1).

Consistent with the results of experiment 1, more participants chose to donate ($N = 268$; 64%) than to opt-out ($N = 151$). Importantly, significantly more participants opted out of donating in the NV condition ($N = 75/143$; 52.4%) than in either control conditions ($N_{MIV} = 33/140$; 23.6%; $N_{SIV} = 43/136$; 31.6%; $\chi^2(2) = 27.30$, $p < .001$).

As hypothesized, of participants who reported the wish to be fair and impartial as their dominant consideration, 50.7% were in the NV condition ($N = 75/148$) while only 24.3% were in the MIV condition ($N = 36/148$), and only 25.0% in the SIV condition ($N = 37/148$). Of those who reported the wish to help others as their dominant consideration, 25.1% were in the NV condition ($N = 68/271$), 38.4%, were in the MIV condition ($N = 104/271$), and 36.5% in the SIV condition ($N = 99/271$; $\chi^2(2) = 27.94$, $p < .001$). As expected, among participants who opted out, the majority reported the wish to be fair and impartial as their dominant decision consideration ($N = 118/151$; 78.1%) as opposed to the wish to help others ($N = 33/151$; 21.9%). Among those who decided to donate, more reported the wish to help others as their dominant decision consideration ($N = 238/268$; 88.8%) as opposed to the wish to be fair and impartial ($N = 30/268$; 11.2%; $\chi^2(1) = 189.50$, $p < .001$).

Experiment 3 (N=420) provided additional evidence that donors' inner conflict drives the neglected victim effect using a different, timely context (helping lonely people in a time of social distancing) and different victims (elderly men instead of young girls). This experiment included three conditions as in Experiment 2, however unlike Experiments 1 and 2 which asked participants to donate money, here participants were asked to volunteer, and after making their decision, they reported their decision considerations on two separate items (to what extent their decision was influenced by the wish to be fair and impartial, and to what extent by their wish to help others).

Consistent with the findings of experiments 1 and 2, more participants chose to volunteer ($N = 322$; 77%) than to opt-out ($N = 98$; 23%). Importantly, significantly more participants opted out from volunteering in the NV condition ($N = 42/141$; 29.8%) than in the two control conditions ($N_{MIV} = 34/140$; 24.3%; $N_{SIV} = 22/139$; 15.8%). $\chi^2(2) = 7.73$, $p = .021$.

Furthermore, as hypothesized, the consideration conflict (help-fair) mediated the effect of experimental condition on the percentage of opt-outs; the relative indirect effect of the NV condition vs. SIV condition on the decision to volunteer or not through the Consideration-Conflict variable was positive and significant ($B = .75$, $SE = .24$, 95% CI [.36, 1.28])—as was the indirect effect of the NV condition vs. MIV condition ($B = .63$, $SE = .25$, 95% CI [.20, 1.20]. This suggested a greater conflict in the NV condition than in either other condition.

The results of these studies support our hypothesis that potential donors are more likely to refrain from donating altogether when they need to choose between two identifiable victims—i.e., help one victim yet neglect another—than when merely asked to donate to one victim. The results show that it is the presentation of a choice that prompts higher rates of opt-out, rather than the number of victims presented. Our findings provide additional support for the conflict between the wish to be helpful and the wish to be fair, as the mechanism behind the effect. The findings also demonstrate that NV-condition participants who donated did not "compensate" for those who opted out. This finding bears profound implications for charity's bottom line since asking donors to choose between two identifiable victims results in a smaller number of donors—and commensurately, a smaller donation amount overall than when donors are simply asked to donate to one specific victim, without being obliged to choose.

Freedom of choice does not necessarily mean that individuals make optimal choices (Botti & Iyengar, 2006). However, in almost any consumption decision, consumers choose from the wealth of options surrounding them. This wealth of options exists in donation decisions as well, and charitable organizations try to utilize donors' choices by presenting prospective donors with customized choice-sets—on the assumption that doing so is an effective strategy of eliciting more donations. However, the studies of the present research indicate that asking donors to choose from a choice-set of single identifiable victims, coupled with the explicit option of not choosing either one (as occurs in real-world donation appeals), induces donors to refrain from donating altogether. The choice literature has shown that when the choice between options is difficult, and an explicit no-choice option is provided, individuals prefer the no-choice option. The present research tested this prediction in the context of donation-giving and found across all studies, using various conditions, that the no-choice option (i.e., the option to opt-out and not to donate to any of the victims), was not the preferred option. Furthermore, according to the choice literature, the no-choice option is preferred mainly because of the difficulty of choosing between options, or of justifying the preference of one option over another. In the present research, we found that, in fact, in the case of donation choices, a preference for the "no-choice" option is a result of a unique conflict between the wish to be helpful, and the wish to be fair. This is the first study to focus on how the consequences of choosing one victim while neglecting another lead to a "lose-lose" situation, in which many prospective donors prefer to avoid donating altogether. Our findings offer practical implications for donation-raising efforts. When a charitable organization is seeking to raise money for multiple victims, it should consider presenting each victim separately, without comparisons with others, to avoid activating an inner struggle, which may drive potential donors away from their initial tendency to help.

REFERENCES

Adomavicius, Gediminas, and Alexander Tuzhilin (2005), "Toward the next generation of recommender systems: A survey of the state-of-the-art and possible extensions," *IEEE transactions on knowledge and data engineering*, 17 (6), 734-49.

Andreoni, James (1990), "Impure altruism and donations to public goods: A theory of warm-glow giving," *The Economic Journal*, 100 (401), 464-77.

Beattie, J., Baron, J., Hershey, J. C., & Spranca, M. D. (1994), "Psychological determinants of decision attitude," *Journal of Behavioral Decision Making*, 7(2), 129–144.

Blasi, A., Kurtines, W. M., & Gewirtz, J. L. (1994), "Moral identity: Its role in moral functioning," *Fundamental Research in Moral Development*, 2, 168–179.

Botti, Simona, and Sheena S. Iyengar (2006), "The dark side of choice: When choice impairs social welfare," *Journal of Public Policy & Marketing*, 25 (1), 24-38.

De Dreu, C. K., Balliet, D., & Halevy, N. (2014), "Parochial cooperation in humans: Forms and functions of self-sacrifice in intergroup conflict," In Advances in Motivation Science (Vol. 1, pp. 1–47). Elsevier.

Dhar, R. (1997), "Consumer preference for a no-choice option," *Journal of Consumer Research*, *24*(2), 215–231.

Dhar, Ravi, and Itamar Simonson (2003), "The effect of forced choice on choice," *Journal of marketing research*, 40 (2), 146-60.

Dorfman, A., Eyal, T., & Bereby-Meyer, Y. (2014), "Proud to cooperate: The consideration of pride promotes cooperation in a social dilemma," *Journal of Experimental Social Psychology*, *55*, 105–109.

Friedman, M. (1953), *Essays in Positive Economics*, University of Chicago Press. pp. 15, 22, 31.

Shaw, Alex, and Joshua Knobe (2013), "Not all mutualism is fair, and not all fairness is mutualistic," *Behavioral and Brain Sciences*, 36 (1), 100-01.

Shaw, Alex, and Joshua Knobe (2012), "Children discard a resource to avoid inequity," *Journal of Experimental Psychology: General*, *141*(2), 382–395.

Why Consumers Disproportionately Invest to Improve Outcomes That Are Already Favorable

Joshua Lewis, New York University, USA

EXTENDED ABSTRACT

Introduction

The more people consume, the less value they derive from further consumption (Hsee and Rottenstreich 2004; Hsee, Rottenstreich, and Xiao 2005; Kahneman and Deaton 2010). By this logic, a consumer who is guaranteed to receive two Kit Kats should be less motivated to acquire a third Kit Kat than a consumer who is guaranteed to receive just one Kit Kat. An employee expecting a $700 bonus should be less motivated to increase her bonus by $100 than an employee expecting a $200 bonus. In stark opposition to this principle, the studies herein show that consumers disproportionately invest to improve *more* rather than *less* favorable outcomes. This behavior is potentially detrimental to consumer welfare: consumers might focus on improving outcomes that are already favorable rather than on improving what is most in need of improvement.

Why would consumers behave in a seemingly suboptimal way, defying the predictions of so much previous research? The studies herein suggest that consumers succumb to a novel bias in how they evaluate improvements. For example, imagine that one consumer can make a credit card purchase that increases her accumulated cashback reward from $70 to $80 while another consumer can make a similar credit card purchase that increases his accumulated cashback reward from $20 to $30. The consumer who can improve her cashback reward from $70 to $80 might more easily justify the purchase because she will ultimately be owed a substantial $80 in cashback. Because there is less need to justify the *lack* of a purchase, she might insufficiently adjust her enthusiasm for the fact that she would have received a cashback reward of $70 in any case. Meanwhile, the consumer who can improve his cashback reward from $20 to $30 might find this credit card purchase harder to justify with his relatively meager resulting cashback of $30, and might insufficiently adjust his hesitancy for the fact that he would only have been owed $20 without the purchase. In sum, when contemplating an improvement, consumers may succumb to a bias in which they focus on the potential improved outcome and insufficiently account for the outcome that they would have attained without the improvement.

Studies

Three preregistered studies examine this psychology. Studies 1 demonstrates the bias in incentive-compatible decisions about improving monetary rewards, Study 2 explores the bias in incentive-compatible decisions about increasing consumption of various goods and reconciles it with the previous literature on diminishing marginal benefit, and Study 3 suggests that the bias might apply even to improvements in consumer experiences that are harder to quantify.

In Study 1, 1,190 MTurkers made a series of incentive-compatible yes-no decisions about whether to improve each of 16 potential payments by doing an effortful button pushing task. To ensure participants were motivated to make decisions according to their true preferences, one of these 16 decisions was randomly selected to count for real.

Both the size of the improvements and the amount of the possible bonus payments varied across these decisions in a within-subjects (low rewards vs. high rewards) design. For each decision in the low rewards condition, the potential unimproved bonus payment was uniformly drawn from between 20 and 30 cents, and for each deci-

sion in the high rewards condition, from between 70 and 80 cents. In each decision, the reward could be improved by an amount drawn uniformly between 10 and 15 cents. For example, a low rewards question might read:

Would you type "ab" 300 times to increase a bonus by 10¢ from 20¢ to 30¢?

A high rewards question might read:

Would you type "ab" 300 times to increase a bonus by 10¢ from 70¢ to 80¢?

Participants chose to improve low rewards just 42% of the time, but high rewards 56% of the time, $p < .001$.

Given that people are usually *diminishingly* sensitive to the size of monetary gains, why are people ostensibly *increasingly* sensitive in this context? Why are they more willing to improve a reward from 70 to 80 cents than from 20 to 30 cents? In line with the mechanism proposed in the Introduction, it could be because they find their effort easier to justify when it will be rewarded with 80 cents (rather than 30 cents), and so they neglect the fact that they would still have had 70 cents (rather than 20 cents) without exerting effort. A decision *not* to exert effort, after all, does not usually require much extra justification besides avoiding that effort (Lewis and Simmons 2019).

To test this mechanism, participants in Study 1 made an additional improvement decision while knowing only *one* of the potential rewards. If participants preferred to base their improvements decisions on the potential improved outcome rather than the initial unimproved outcome, then they would most likely choose to make that additional improvement decision while knowing their potential *improved* reward. So, before participants made their additional improvement decision, they answered another question:

To help you decide whether to do the next typing task, would you prefer to know the unimproved bonus payment that you can get without typing, or the improved bonus payment that you can get by typing?

Consistent with the proposed mechanism, 62% of participants chose to know the potential improved reward (more than 50% at $p < .001$). Moreover, there was a significant interaction such that the effect of participants more often choosing to improve higher (vs. lower) rewards across the original 16 decisions was much greater for the 62% of people who chose to know this potential improved reward in the additional judgment, $p = .005$. Thus, a focus on the potential improved outcome (which could serve to justify any effort exerted to attain it) seems to drive this effect and outweigh the opposing force of diminishing sensitivity to monetary gains.

While *increasing* sensitivity to gains would not predict this interaction and would be very surprising considering previous research on diminishing sensitivity (e.g. Kahneman & Tversky 1979), Study 2 attempts to rule it out in two additional ways. First, instead of monetary gains, the rewards were physical prizes such as highlighters, pens, and snacks — goods which should satiate consumers rapidly. Second, participants also answered questions about their risk preferences with respect to the amount of these goods that they received, which should theoretically reflect whether they received increasing or diminishing marginal benefit from those goods (Kahneman and Tversky 1979). For example, in one question, participants faced a choice between receiving two tea bags for sure, and a lottery in which they would have a 50/50 chance of receiving either one or three tea bags (or they could indicate no preference and let the

survey decide for them). If participants gain more marginal benefit from receiving three bags instead of two than they gain from receiving two tea bags instead of one (i.e. increasing marginal benefit), then they should choose the lottery, as it presents the possibility of receiving three tea bags instead of two at the expense of the possibility of receiving two tea bags instead of one. By the same logic, if participants gain more marginal benefit from receiving two tea bags instead of one than from receiving three tea bags instead of two (i.e. decreasing marginal benefit), then they should refuse the lottery and choose to receive two tea bags for sure. Thus, if participants refuse the lottery but indicate that they would do more work (i.e., type "ab" more times) to increase the amount of tea bags they receive from two to three than from one to two, then the psychological mechanism that drives participants' decisions about improvements would seem to be distinct from that which drives their decisions about risk.

Thus, for each of eight potential prizes, 220 laboratory participants in Study 2 made incentive-compatible decisions about the quantities of that prize they would receive in both a risk condition and an improvement condition (so, risk vs. improvement was manipulated between-subjects for each prize). In the risk condition, participants chose between receiving two units of each prize for sure and a 50/50 lottery to receive either one or three units of that prize. In the improvement condition, participants made two decisions — one about how many times they would type "ab" on a keyboard to improve the quantity of the prize they would receive from one to two, and the other about how many times they would type "ab" to improve from two to three. In the risk condition, participants were more likely to choose the sure thing than the lottery, $p < .001$, which suggests that they experienced diminishing marginal benefit from each extra unit of consumption. However, participants' judgments in the improvement condition were significantly less likely to imply diminishing marginal benefit, $p < .001$. In fact, participants were willing to work directionally more to improve the quantity of the prize they received from two to three than from one to two, $p = .171$,[1] which would imply that they experienced *increasing* marginal benefit from each extra unit of consumption. This seeming contradiction can be reconciled if participants in the improvement condition were focusing on the potential improved prize, rather than the difference between the improved and unimproved prizes. Three units of a prize will usually be worth more to participants than two units of a prize, even if the *marginal* benefit is decreasing. Thus, participants may *experience* diminishing marginal benefit from increasing the quantity of these prizes but simultaneously make improvement *decisions* that defy these preferences due to their tendency to focus on the potential improved prize.

A limitation of Study 2 is that participants' risk preferences may overstate the extent to which they truly experience decreasing marginal benefit from increased quantities of the goods. For example, they might succumb to direct risk aversion (Gneezy, List, and Wu 2006) and — if the decision in the risk condition induces an expectations-based reference point of two units of the good — loss aversion (Kahneman and Tversky 1979; Kőszegi and Rabin 2006). Thus, it is still conceivable that participants exhibit risk aversion even while experiencing *increasing* marginal benefit from additional units of the prize.

---

1   This preregistered analysis included only participants who passed three comprehension checks each within one attempt. Unfortunately, only 114 out of 220 participants did so. Including all participants who passed the three comprehension checks each within two attempts increases the sample size to 174 and reveals a significant effect, p = .009, and a previous hypothetical online pilot study replicated the effect, p < .001. Thus, the evidence against the null hypothesis is stronger than the reported p-value suggests.

Study 3 addresses this possibility more directly, employing a two-cell between-subjects design with 1,925 MTurkers. After reading one of three vignettes, participants either chose which out of two experiences (better vs. worse) they would invest in improving (choice condition) or judged which of those two possible experiences would be more improved by that investment (marginal benefit condition). For example, one scenario stipulated:

Imagine that you're going to two concerts towards the end of this month with a friend. One is to see your very favorite band, the other is to see a band that you are relatively indifferent to. You budget a fixed amount of money for spending on your social life each month, but you realize you still have a spare $10 to spend on drinks or food at either one of these concerts.

In the choice condition, participants were then asked:

Given that you are going to go to both concerts, which concert would you choose to improve by spending the $10?

In the marginal benefit condition, they were instead asked:

Given that you are going to go to both concerts, which concert experience do you think would be more improved by spending the $10?

In both cases, participants could choose from three response options (the better experience, the worse experience, and no preference). If participants choose which improvements to make based on the marginal benefit of those improvements, then their answers in the choice condition should exactly reflect their answers in the marginal benefit condition. For example, if a participant believes the worse experience would be more improved, then that participant should also choose to improve the worse experience. However, if participants use the quality of the potential improved experience to justify investing in the improvement, then they should be more likely to improve the better experience than their judgments of marginal benefit would suggest. For example, a participant might believe that the worse concert would be more improved by spending the $10 but still choose to spend the $10 on the better concert, for which the potential improved experience would make spending that $10 feel more worthwhile. Consistent with this hypothesis, participants were more inclined to improve the better experience than they were to indicate that the better experience would be more improved, $p < .001$.

DISCUSSION

While consumers may *experience* diminishing marginal benefit from extra consumption, their decisions about improvements often fail to reflect that experience. This is because, when consumers consider investing resources in improving a future outcome, they focus on the potential improved reward (which would justify the cost of the improvement) and neglect to sufficiently account for the potential unimproved reward that they would have received at no cost. Consequently, they invest more effort in improving larger vs. smaller monetary rewards (Study 1), they invest more effort in increasing larger vs. smaller quantities of consumer goods (Study 2), and they are more inclined to improve better experiences vs. worse experiences than their perceptions of the possible improvements would suggest (Study 3). The ramifications of this psychology could be large. For example, charitable donors may avoid giving to the neediest beneficiaries because the potential improved outcome for those beneficiaries would still be too bad to make the investment feel worthwhile. Indeed, this might explain why US donors send such a small fraction of their donations to poor countries, where those donations would have a far greater impact (MacAskill 2015). The bias could also affect consumers' own welfare. Consumers may overinvest in improving an already-lavish vacation but neglect to improve more mundane aspects of their life.

In sum, research from a wide variety of literatures spanning economics, psychology, and consumer behavior supports the notion of diminishing marginal benefit: people experience an ever-smaller benefit from incremental increases in consumption. Yet, when people make decisions about improvements, they violate this principle. Future work across all of these disciplines should explore the ramifications of this bias and work towards alleviating its adverse effects.

REFERENCES

Gneezy, Uri, John A. List, and George Wu (2006), "The Uncertainty Effect: When a Risky Prospect Is Valued Less than Its Worst Possible Outcome," *The Quarterly Journal of Economics*, 121(4), 1283–1309.

Hsee, Christopher K. and Yuval Rottenstreich (2004), "Music, Pandas, and Muggers: On the Affective Psychology of Value," *Journal of Experimental Psychology. General*, 133(1), 23–30.

Hsee, Christopher K., Yuval Rottenstreich, and Zhixing Xiao (2005), "When Is More Better?: On the Relationship Between Magnitude and Subjective Value," *Current Directions in Psychological Science*, 14(5), 234–37.

Kahneman, Daniel and Angus Deaton (2010), "High Income Improves Evaluation of Life but Not Emotional Well-Being," *Proceedings of the National Academy of Sciences*, 107(38), 16489–93.

Kahneman, Daniel and Amos Tversky (1979), "Prospect Theory: An Analysis of Decision under Risk," *Econometrica*, 47(2), 263–91.

Kőszegi, Botond and Matthew Rabin (2006), "A Model of Reference-Dependent Preferences," *The Quarterly Journal of Economics*, 121(4), 1133–65.

Lewis, Joshua and Joseph P. Simmons (2019), "Prospective Outcome Bias: Incurring (Unnecessary) Costs to Achieve Outcomes That Are Already Likely.," *Journal of Experimental Psychology: General*, http://doi.apa.org/getdoi.cfm?doi=10.1037/xge0000686.

MacAskill, William (2015), *Doing Good Better: How Effective Altruism Can Help You Make a Difference*, Penguin.

When and Why Are Consumers Reluctant to Seek for Help When They Encounter Difficulties in Using the Products? The Role of Consumption Type

Shaobo (Kevin) Li, Southern University of Science and Technology, China
Xun (Irene) Huang, Nanyang Technological University, Singapore
Yuwei Jiang, The Hong Kong Polytechnic University, China

EXTENDED ABSTRACT

Consumers often encounter difficulties—ranging from how to assemble a complex Lego model to how to utilize a newly-launched mobile app—when utilizing new products. Some consumers resolve the difficulties themselves, while many others seek help (e.g., calling the call center or posting questions in the forums). Given the augmented need of consumer help seeking, marketers need to understand when and why consumers seek assistance in product usage.

The foregoing situation led the current research. Specifically, we propose that when consumers engage in hedonic (vs. utilitarian) consumption, they focus more on the process (vs. outcome) of the consumption. As such, difficulties are considered to be an inherent part of the consumption process and consumers are more (vs. less) likely to tolerate problems that arise in the process of hedonic (vs. utilitarian) consumption and, consequently, are less (vs. more) likely to seek aid in that situation.

Help seeking was defined as the act of asking others for assistance and information to solve problems (Lee 2002). Marketing literature has mainly focused on examining consumers' help giving behavior (Winterich and Zhang 2014), research on consumers help seeking behavior is scant. Related to consumers' help seeking behavior, only some researchers have investigated the factors (e.g., level of difficulty; specific emotion) influence consumers' advice seeking tendency (Gino, Brooks, and Schweitzer 2012; Schrah, Dalal, and Sniezek 2006). To fill in the research gap on consumers' help seeking, we examine how consumption contexts influence consumers' help seeking tendency.

Products can be classified as hedonic and utilitarian (Alba and Williams 2013). Hedonic consumption is mainly driven by the desire to enjoy the process, or the affective experience engage in hedonic consumption, whereas consumers engage in utilitarian consumption for accomplishing a task or fulfilling a goal (Dhar and Wertenbroch 2000; Whitley, Trudel, and Kurt 2018). We argue that consumers are motivated to enjoy the process and experience of the hedonic good since they focus on the affective experience. Even the difficulties in hedonic consumption (e.g., difficulties in assembling a house by Lego blocks) is part of the experience that consumers enjoy, thus consumers have a higher tolerant for difficulties in hedonic consumption. However, In the utilitarian consumption context, consumers focus more on fulfil a goal or accomplish a task, seeking for others' help when facing difficulty can help consumers achieve the final goal more efficiently. More formally,

Hypothesis 1: *Consumers are more (vs. less) reluctant to seek for others' help when they encounter difficulties in the hedonic (vs. utilitarian) consumption.*

Hypothesis 2: *Process (vs. outcome) focus mediates the above relationship.*

Moreover, individual difference on Protestant work ethics (PWE) moderates the before-mentioned effect. Individuals with high PWE believe that you will succeed if you work hard (Cheng, Mukhopadhyay, and Schrift 2017). Even in utilitarian consumption, which is more outcome-driven, consumers with high PWE beliefs will tolerate challenges more as they believe tough process leads to good outcome, thus are less likely to seek help. Therefore, we predict that, for consumers with high PWE beliefs, the proposed effect of consumption type on help-seeking behavior will be weakened. Putting together,

Hypothesis 3: *The reduced help-seeking intention in hedonic (vs. utilitarian) consumption is less evident among consumers with high PWE beliefs.*

In study 1, we first selected top 30 apps of all 23 categories defined by Apple in US market and then asked participants from M-Turk to rate the utilitarian-hedonic level of each app on a 7-point Likert scale (1 = very utilitarian; 7 = very hedonic). Second, by using a web-crawler program, we counted the number of questions people asked for each app on *Quora.com* as a proxy of helping seeking tendency. We found that customers asked significantly less questions for hedonic apps as compared to utilitarian apps, supporting our hypothesis.

In Study 2, we asked participants to indicate their help seeking tendency when they encounter difficulties in 8 different consumption situations (e.g., business trip, leisure trip) on a 6-likert scale. We found that participants are more (vs. less) reluctant to seek for help when engaging in hedonic (vs. utilitarian) consumption.

In study 3, we asked participants to indicate their help seeking tendency when they encountering difficulties in online course (vs. online game) scenarios and measured their process-outcome orientation in these two scenarios. We found that participants are more (vs. less) reluctant to seek for help in the online game (vs. online course) consumption context. Moreover, participants focused more on the process (vs. outcome) in the online game (vs. online course) context. Importantly, process-outcome orientation mediates the main effect.

Study 4 is a 2(consumption context: hedonic consumption vs. utilitarian consumption) * 2(continuous PWE scale) designed study. We measured participants' help seeking tendency by using the same scenario in Study 3. Moreover, we also measured participants' PWE (Mirels and Garrett 1971). First, we replicated the main effect of consumption context. More importantly, we found a significant interaction. Specifically, among participants with low PWE, they are more reluctant to seek for help in the hedonic consumption condition than in the utilitarian consumption condition; among participants with high PWE, there is no significant difference.

Our findings contribute to the helping literature by shedding light on consumers' help seeking behavior since prior helping literature has mainly focused on consumers help giving behavior (Winterich and Zhang 2014) and ignored the other side of the equation (consumers help seeking behavior). Furthermore, we add to the emerging stream of literature on understanding the difference between hedonic versus utilitarian consumption (Chitturi, Raghunathan, and Mahajan 2008; Alba and Williams 2013). Managerially, the findings of this research can inform companies the importance of providing appropriate assistance and service to consumers depending on consumption contexts (e.g., hedonic consumption or utilitarian consumption).

REFERENCES

Alba, Joseph W., and Elanor F. Williams (2013), "Pleasure Principles: A Review of Research on Hedonic Consumption," *Journal of Consumer Psychology*, 23 (1), 2–18.

Cheng, Yimin, Anirban Mukhopadhyay, and Rom Y. Schrift (2017), "Do Costly Options Lead to Better Outcomes? How the Protestant Work Ethic Influences the Cost–Benefit Heuristic in Goal Pursuit," *Journal of Marketing Research*, 54 (4), 636–49.

Chitturi, Ravindra, Rajagopal Raghunathan, and Vijay Mahajan (2008), "Delight by Design: The Role of Hedonic versus Utilitarian Benefits," *Journal of Marketing*, 72 (3), 48–63.

Dhar, Ravi, and Klaus Wertenbroch (2000), "Consumer Choice Between Hedonic and Utilitarian goods," *Journal of Marketing Research*, 37 (1), 60–71.

Gino, Francesca, Alison W. Brooks, and Maurice E. Schweitzer (2012), "Anxiety, Advice, and the Ability to Discern: Feeling Anxious Motivates Individuals to Seek and Use Advice," *Journal of Personality and Social Psychology,* 102 (3) 497–512.

Lee, Fiona (2002), "The Social Costs of Seeking Help," *Journal of Applied Behavioral Science,* 38 (1), 17–35.

Mirels, Herbert L., and James B. Garrett (1971), "The Protestant Ethic as a Personality Variable," *Journal of Consulting and Clinical Psychology*, 36 (1), 40.

Schrah, Gunnar E., Reeshad S. Dalal, and Janet A. Sniezek (2006), "No Decision-Maker is an Island: Integrating Expert Advice with Information Acquisition" *Journal of Behavioral Decision Making*, 19 (1), 43–60.

Winterich, Karen Page, and Yinlong Zhang (2014), "Accepting Inequality Deters Responsibility: How Power Distance Decreases Charitable Behavior," *Journal of Consumer Research*, 41 (2), 274–93.

Whitley, Sarah C., Remi Trudel, and Didem Kurt (2018), "The Influence of Purchase Motivation on Perceived Preference Uniqueness and Assortment Size Choice," *Journal of Consumer Research*, 45 (4), 710–24.

The Sharing Economy Shapes and Is Shaped by Consumers:
The Mediating Role of Consumer Reflexivity in Sharing

Stella Yiyan Li, Northern Arizona University, USA
Antje Graul, Utah State University, USA
John Jianjun Zhu, New Mexico State University, USA

EXTENDED ABSTRACT

The sharing economy incorporates new challenges for firms to rethink and redefine their roles in a new consumer journey, with consumers actively participating in both the production and consumption process (Dellaert 2019). Findings on the significant change of the total consumption utility and welfare of consumers who engage in sharing as co-producers (i.e., those who share their possessions with other consumers) (Dellaert 2019) raise a similar question regarding the potential impacts of sharing at the individual consumer level for the participants who temporarily access shared products instead of permanently owning them. Will such sharing experiences transform their consumption preferences, norms, beliefs, and behaviors, fostering a decrease in attachment to and the important meaning of possessions?

This study aims to fill this crucial void by introducing the concept of consumer reflexivity as the underlying social-psychological mechanism explaining how the rapidly growing sharing practices might affect the participating consumers and their intention to re-engage in sharing. Drawing on previous research on reflexivity in multiple disciplines including sociology, education psychology, and organizational psychology, we conceptualize consumer reflexivity as a state of self-reflection involving a strong sense of self-awareness, self-regulation, and identity construction in the consumption process.

We propose that consumer reflexivity increases when consumers juxtapose distinct economic (i.e., flexibility and mobility), social (i.e., bonding with other shared minded participants) or environmental (i.e., saving natural resources, energy, and being sustainable) benefits of sharing to their beliefs and experiences with traditional ownership-based consumption models. We theorize that the perceived disruptiveness of sharing derived from consumers' sharing experience and perceived sharing benefits triggers their reflection and perception regarding future sharing experiences, which in turn affects consumers' intention to re-engage in sharing. Moreover, we suggest that the process of consumer reflection is contingent on individual differences including the type of sharing schemes experienced and the biospheric value orientation of the individual consumer.

Method and Data

To test whether engaging in sharing might trigger consumer reflexivity and influence consumers' intention to re-engage in a sharing, we first surveyed 200 consumers who have previously participated in sharing schemes in order to validate the existence and roles of a three-dimensional consumer reflexivity (i.e., self-awareness, self-regulation, and identity construction) in a sharing consumption context. We next establish the causality of the theorized effects through experiments that prime high versus low levels of consumer reflexivity with 118 respondents recruited online, and then another experiment both prime consumer reflexivity and manipulate the perceived sharing experience of another 1020 respondents recruited online. To enhance the robustness of our findings, we replicate our model with an alternative measure of future sharing intention and separate tests on the mediation effects of each sub-dimension of consumer reflexivity. We further demonstrate significant moderation of the type of sharing schemes experienced and the biospheric value orientation on the mediation role of consumer reflexivity.

Summary of Findings

Adapting the conceptualization and measures of reflexivity across different fields, we have developed and validate a three-dimensional measure of consumer reflexivity. Findings in our surveys and experiments show that three perceived sharing benefits—namely economic utility, social value, and sustainability potential—trigger consumer reflexivity. However, consumer reflexivity only mediates the effects of social value and sustainability potential of sharing on consumers' intention to reengage in sharing. Moreover, results from our survey also demonstrated that a consumer's past B2C sharing experience weakens the positive meditation of consumer reflexivity on the effects of perceived social benefits of sharing on the intention to re-engage in sharing whereas it strengthens the mediation effect of consumer reflexivity of the perceived sustainability benefits of sharing. Meanwhile, a consumer's biospheric value orientation weakens the positive mediation by consumer reflexivity on the effects of perceived social value of sharing schemes on intention to re-engage in sharing whereas it strengthens the positive mediation of consumer reflexivity on the effect of sustainability potential of sharing schemes. Individual differences did not affect the effects of economic utility on one's intention to re-engage in sharing.

Discussion

Over three studies, we investigated the connections between sharing and consumer reflexivity. The rise of service, knowledge, and digital economies has significantly challenged the maintenance of traditional consumption orientation, life trajectories, and long-term thinking of consumers (Bardhi and Eckhardt 2017). We believe that sharing practices also help consumers to step back and reflect on their consumption behaviors. The findings from our online survey and experiments allow us to explore whether and how sharing affects consumer reflexivity, which then motivates their reengagement in sharing. Conceptually and theoretically, we contribute to the literature in the following ways. First, our results provide the first empirical account addressing the present gap in the literature by showing the mediating effects of consumer reflexivity and the boundary conditions for such mediation effects. Second, our findings of the existence of consumer reflexivity in the sharing consumption context and the specific factors (i.e., perceived sharing benefits as indicators of perceived disruptiveness of sharing) that stimulate consumers to critically reassess their prior consumption beliefs, identity, and behavioral intentions complements prior arguments that reflexivity can only be triggered by unexpected traumatic life events (e.g., cancer, divorce) discontinuing daily routines and lifestyles (Pavia and Mason 2004; Thompson et al. 2018). Finally, our argument that reflexivity can increase consumers' identification with the *consumption practice* of sharing itself rather than the products accessed in the scheme extends recent research on liquid consumption which suggests that consumers tend to avoid identification with products through product ownerships or materialistic possessions (Eckhardt and Bardhi 2015). Notably, our results also provide important implications and valuable insights for managers and practitioners of sharing schemes.

REFERENCES

Acquier, A., Daudigeos, T., & Pinkse, J. (2017). Promises and paradoxes of the sharing economy: An organizing framework. *Technological Forecasting and Social Change*, *125*, 1-10.

Bardhi, F., & Eckhardt, G. M. (2012). Access-based consumption: The case of car sharing. *Journal of Consumer Research*, *39*, 881-898.

Bardhi, F., & Eckhardt, G. M. (2017). Liquid consumption. *Journal of Consumer Research*, *44*, 582-597.

Barnes, S. J., & Mattsson, J. (2017). Understanding collaborative consumption: Test of a theoretical model. *Technological Forecasting and Social Change*, *118*, 281-292.

Belk, R. W. (2014). Sharing versus pseudo-sharing in Web 2.0. *The Anthropologist*, *18*, 7-23.

Dellaert, B.G.C. (2019). The consumer production journey: Marketing to consumers as co-producers in the sharing economy. *Journal of the Academy of Marketing Science*, *47*, 238-254.

Eckhardt, G. M., & Bardhi, F. (2015). The sharing economy isn't about sharing at all. *Harvard Business Review*, *28*, 1.

Giddens, A. (1991). The contours of high modernity. In A. Giddens (Ed.), *Modernity and Self-Identity: Self and Society in the Late Modern Age (pp.10-34)*. Stanford: Stanford University Press.

McPherson, I. (2005). Reflexive learning: Stages towards wisdom with dreyfus. *Educational Philosophy and Theory*, *37*, 705-718.

Mezirow, J. (2000). Learning to think like an adult: Core concepts of transformation theory. In Mezirow, J. (Ed.), *Learning as Transformation*, San Francisco: Jossey-Bass Inc., 3-33.

Milanova, V. and Maas, P. (2017). Sharing intangibles: Uncovering individual motives for engagement in a sharing service setting. *Journal of Business Research*, *75*, 159-171.

Möhlmann, M. (2015). Collaborative consumption: determinants of satisfaction and the likelihood of using a sharing economy option again. *Journal of Consumer Behavior*, *14*, 193-207.

Pavia, T. M., & Mason, M. J. (2004). The reflexive relationship between consumer behavior and adaptive coping. *Journal of Consumer Research*, *31*, 441-454.

Sheth, J. N., Sethia, N. K., & Srinivas, S. (2011). Mindful consumption: A customer-centric approach to sustainability. *Journal of the Academy of Marketing Science*, *39*, 21–39.

Thompson, C. J., Henry, P. C., & Bardhi, F. (2018). Theorizing reactive reflexivity: Lifestyle displacement and discordant performances of taste. *Journal of Consumer Research*, *45*, 571–594.

Tussyadiah, I. P. (2016). Factors of satisfaction and intention to use peer-to-peer accommodation. *International Journal of Hospitality Management*, *55*, 70-80.

Focusing on Experiential (vs. Material) Aspects of Goal-Related Products Increases Motivation

Sarah Lim, Cornell University, USA
Kaitlin Woolley, Cornell University, USA

EXTENDED ABSTRACT

Consumers purchase products to help them pursue their goals. To be physically fit, they purchase gym memberships and/or new workout equipment; to eat healthier, they take cooking classes and/or purchase kitchenware; to ace the GRE, students can enroll in a GRE class and/or purchase exam-prep books. Although these different sets of purchases are made to pursue a specific goal, they have a key distinction. One set of purchases is more *experiential*; they are made to gain an experience that consumers will live through. The other set of purchases is more *material;* they are made to acquire a tangible object that consumers can own (Gilovich and Gallo 2020; Gilovich, Kumar, and Jampol 2015).

Prior research has focused on how these different types of purchases influence consumers' happiness (Carter and Gilovich 2012). However, in the current research, we examine a different question — how the experiential versus material nature of a goal related purchase affects consumers' motivation to pursue their goals. On the one hand, material purchases related to a goal could be more motivating because material tangibility functions as a physical reminder of the goal. On the other hand, experiential purchases related to a goal could be more motivating. Compared to material purchases, experiences are more central to one's identity (Carter and Gilovich 2012). Experiential goal-related purchases could therefore lead consumers to identify more with their goal.

We propose and demonstrate that making experiential (vs. material) purchases, or focusing on the experiential (vs. material) features of goal-related products, leads consumers to identify more with their goal, which increases their motivation to pursue the goal. We provide evidence for this proposed mechanism by demonstrating 1) mediation through goal identification and 2) moderation by chronic goal identity centrality, such that the effect of experiential (vs. material) focus on motivation attenuates for goals that are chronically central to one's identity. Eight studies provide converging evidence for this proposition.

Study 1a demonstrated that consumers who made more experiential (vs. material) purchases related to their fitness goals spent more time pursuing these goals (B = 3.52, $t(156)$ = 2.28, p = .024). Generalizing to other domains, study 1b showed that participants who perceived their recent goal related purchases as more experiential (vs. material) reported greater success in pursuing their fitness, healthy eating, and educational goals during the past two weeks ($F(1, 1435)$ = 26.12, $p < .001$).

Our remaining studies provide a causal test of this hypothesis, holding the actual goal related product constant and manipulating people's focus on the experiential (vs. material) aspects of the product. Study 2a demonstrated that Apple Watch users were more motivated to work out when focusing on the experiential (vs. material) aspects of their Apple Watch ($M_{experiential}$ = 5.37; $M_{material}$ = 4.87; $t(149)$ = 2.37, p = .019, d = .39). Studies 2b and 2c replicated this effect for students thinking about different aspects of their workout headphones ($M_{experiential}$ = 4.28; $M_{material}$ = 3.86; $F(1, 211)$ = 5.99, p = .015, μ_p^2 = .03) and for online participants focusing on different aspects of their workout t-shirt ($M_{experiential}$ = 5.09; $M_{material}$ = 4.72; $t(299)$ = 2.26, p = .025, d = .26).

Study 3 examined whether the motivating effect of experiential (vs. material) focus is mediated by goal identification. An experiential (vs. material) focus increased participants' motivation to work out ($M_{experiential}$ = 4.82; $M_{material}$ = 4.15; $t(398)$ = 3.77, $p < .001$, d = .38) and caused participants to identify themselves more as an athletic person ($M_{experiential}$ = 67.96; $M_{material}$ = 63.10; $t(398)$ = 2.21, p = .028, d = .22). Supporting our proposed process, goal identification mediated the effect of product focus on motivation ($B_{indirect}$ = .10, 95% CI = [.01, .18]).

Study 4 examined whether the effect of product focus is moderated by goal identity centrality. If an experiential focus affects motivation by increasing goal identification, product focus should have a weaker effect on motivation for goals that people already strongly identify with. To test this, we manipulated goal identity centrality by asking students to think about an academic goal, which is more central to their identity, and a fitness goal, which is less central to their identity (e.g., Ferguson 2008). We found the predicted interaction between product focus and goal identity centrality ($F(1, 204)$ = 4.14, p = .043, η_p^2 = .02). An experiential (vs. material) focus increased motivation to pursue a fitness goal ($M_{experiential}$ = 4.10; $M_{material}$ = 3.44; $F(1, 204)$ = 5.90, p = .016, η_p^2 = .03), with no significant effect of product focus on motivation to pursue an academic goal ($F < 1$).

Our final study examined how adopting an experiential (vs. material) focus affects actual goal persistence. Participants in a multi-day fitness challenge focused on either the experiential or material features of their fitness related products. Focusing on the experiential (vs. material) aspects of their fitness related products increased average time spent exercising during the challenge ($M_{experiential}$ = 43.06 minutes; $M_{material}$ = 27.45 minutes; $t(42)$ = 2.30, p = .026, d = .69) and increased the likelihood that participants completed the number of days of the challenge that they signed up for (45.5% vs. 9.1%; $\chi2(1, N = 44)$ = 7.33, p = .007, ϕ = .41).

Adding to prior research that has focused on hedonic benefits of experiential (vs. material) purchases (Carter and Gilovich 2010; Gilovich and Gallo 2020; Nicolao, Irwin, and Goodman 2009; van Boven and Gilovich 2003), the current research identifies an experiential advantage in goal pursuit. In doing so, this research proposes a simple intervention to help motivate consumers: focus on the experiential (vs. material) aspects of goal related products. This research thus offers practical advice for many consumers who make goal related purchases in the hopes of achieving specific goals (Schroeder 2018) yet struggle to attain them.

REFERENCES

Carter, Travis, and Thomas Gilovich (2010), "The Relative Relativity of Material and Experiential Purchases," *Journal of Personality and Social Psychology*, 98 (6), 146–59.

Carter, Travis and Thomas Gilovich (2012), "I Am What I Do, Not What I Have: The Differential Centrality of Experiential and Material Purchases to the Self," *Journal of Personality and Social Psychology*, 102 (6), 1304–17.

Gilovich, Thomas, and Iñigo Gallo (2020), "Consumer's Pursuit of Material and Experiential Purchases: A Review," *Consumer Psychology Review*, 3(1), 20–33.

Gilovich, Thomas, Amit Kumar, and Lily Jampol (2015), "A Wonderful Life: Experiential Consumption and the Pursuit of Happiness," *Journal of Consumer Psychology*, 25 (1), 152–65.

Ferguson, Melisa (2008), "On Becoming Ready to Pursue a Goal You Don't Know You Have: Effects of Nonconscious Goals on Evaluative Readiness," *Journal of Personality and Social Psychology*, 95 (6), 1268–94.

Nicolao, L., Julie R. Irwin, and Joseph K. Goodman (2009), "Happiness for Sale: Do Experiential Purchases Make Consumers Happier than Material Purchases?" *Journal of Consumer Research*, 36 (2), 188–98.

Schroeder, Jules (2018), "Millennials, Here's Why You Are Addicted to Self-Improvement," Forbes, Jan 10., https://www.forbes.com/sites/julesschroeder/2018/01/30/millennials-heres-why-you-are-addicted-to-self-improvement/#302b915f3008.

Van Boven, Leaf, and Thomas Gilovich (2003), "To Do or to Have? That Is the Question," *Journal of Personality and Social Psychology*, 85 (6), 1193–202

#Cyborgs Are in Your Dreams, Thoughts, Talks, and Perhaps Next Door

Vitor M. Lima, York University, Canada
Luís Pessoa, Pontifical Catholic University of Rio de Janeiro, Brazil
Russell W. Belk, York University, Canada

EXTENDED ABSTRACT

Elon Musk, the Neuralink CEO, says that we are already cyborgs (Musk 2018). Is he right? Are our smartphones us? Throughout time, we can find myths (e.g., Talos), comic books (e.g., Doktor Sleepless), and TV series (e.g., Years and Years) depicting the dynamics and tensions arising from our consumption and interaction with different types of technologies (Belk, Humayun, and Gopaldas 2020). Although prior studies investigated technology consumption grounded in different perspectives (e.g., Hoffman and Novak 2018; Xiao and Kumar 2019), they mostly have employed an instrumental approach (Heidegger 1977). In these conceptualizations and portrayals, as a depiction of the consumer-technology relationship, humans are always portrayed as playing the role of masters, whereas technological solutions are the servants (Schweitzer et al. 2019). However, due to the development and volitional consumption of emergent technologies, such as CRISPR and embedded near-field communication (NFC) microchips, consumers are physically becoming one with technology. Sometimes, it is hard to distinguish what is what and who is who. From this standpoint, the way that we have been experiencing the literal dissolving of human/technology boundaries over time remains neglected. Therefore, our research questions are: *How do consumers experience the phenomenon of the human-tech merger? Do they reconcile such blending?* To address these questions, from 2018 to 2020, we conducted a netnography by following consumers' narratives on social media that were tagged with the hashtag #cyborg (Kozinets 2019). Our final dataset is comprised of approximately 15,000 entries from Facebook, Twitter, Instagram, and Youtube. Data interpretation followed discourse analysis methods (Greimas and Courtes 1982).

Supported by our data and the literatures on cyborgs (e.g., Clynes and Kline 1960) and Jungian archetypes (Jung 1959), our findings point to four distinct narratives. In each one, archetypal manifestations about cyborgization portray different psycho-social effects but tied by a common reason: the control over our sense of humanness. The first narrative, *Imagining the cyborg,* is represented by the Trickster archetype. This archetype is manifested through acts of creation and devastation in which the moral pillars of traditional society collapse (Jung 1959). The tricky and pricy enchantment of this archetype is represented in the Norse mythology by the God Loki, the master of shapeshifting performance. Due to the considerable volume of such portrayals of the trickster in the netnography, it is possible to assume that the cyborg is an entity to admire. Some of the references on social media relate to performances from artists such as Neil Harbisson, the first legally recognized cyborg. Artistic enactments can be taken as a reference to the exercise of imagination and volitionality in building "more than human" identities (Schau 2018). For example, Users 1 and 2 (Instagram, 2019) posted:

> Post: "Cyborg artist J. D. transpecies surgery - new sense to explore echolocation #cyborg #echolocation #cyborgart #transpecies #extrasense #senses #bodyart #newsense #bodyhacking #surgery"
> Comment: "awesome!"

Being the cyborg, the second narrative, encompasses references to the Hero archetype and his/her journey. Here, despite the terrible suffering, there is always a superior purpose to be achieved at the end of the trail (Jung 1959), as foreseen by the Prometheus myth and Captain Marvel. In this heroic storyline, the sense of positive morality is clearly associated with cyborgization through restoration of human health. Although sounding contradictory, consumers regain control over their sense of humanness by blending with technology. Eventually, as in the case of pacemakers, it is the only way to stay alive (Oudshoorn 2020). Thus, this practice depends directly on a therapeutic justification since, from a bioethical and religious perspective, such blending may not violate the values of the body and soul (Hrynkow 2020), as follows (Users 3 and 4, Twitter, 2018):

> Tweet: "Thanks for following & you'll continue to see tweets that give you insight into what "normal" life is like when you're a little bit robot - & also kind of a dork ¯_(□)_/¯, #bebionic #cyborg"
> Comment: "You are a brave person and fighter…God blessed you."

The third narrative, *Avoiding the cyborg,* is grounded in the Self archetype. It symbolizes the wholeness (or perfect psychic assimilation) since it is responsible for the coordination of opposing or conflicting elements in our psyche (Jung 1959). This narrative is marked by possible aspects of the Self that remain unintegrated and may be destructive. In the Christian perspective, for instance, this obscure side is "feminine, the material, and ultimately the "Antichrist," who personifies dark aspects of the Self split off during the development of the positive god image" (Ensign 2005, 18). By this logic, to prevent the rise of the Antichrist, we must avoid falling into sin by trying to become "more than humans." Here, one of the most remarkable products associated with a possible heresy is the NFC microchip, which is usually implanted in a person's hand between the index finger and thumb. To some, this object represents the Mark of the Beast (see Revelations, 13:16-17), and should be avoided at all costs (Users 5 and 6, Youtube, 2018):

> Post: "The Day I Got Microchipped"
> Comment: "I say NO to the microchip, guys please don't take the microchip is evil"
> Comment: "This is MARK OF THE BEAST. Stay away from this AMEN."

The fourth narrative, *Fearing the cyborg,* involves the Shadow archetype as its exemplar, which is composed of every repressed, undeveloped, and denied thing in our unconscious (Jung 1959). Cyberpunk images of cyborgs as weapons or as entities controlling weapons only increases the sense of dehumanization and the perceived threat to human existence. References to such anthropomorphized armament can be considered as warnings of a hypothesized machine takeover. The human-like machine versus machine-like human tension is highlighted by discussions of human enhancement through artificial intelligence, which is feared to be the most significant threat to humanity (Fukuyama 1992). The following example illustrates this theme (Users 7 and 8, Twitter, 2019):

> Tweet: "Would you let Elon Musk insert electrodes in your brain? Musk's #Startup #Neuralink wants to explore the frontier of #BCI #cybernetic enhancement with #AI."

Comment: "I am not happy about the future with all this AI […] it is the beginning of the end!"

Although the line that separates gods and demons, the sacred and the profane, is not always easy to be established, a common point in the West is the fear of punishment by an omniscient, omnipresent, and omnipotent deity for our transgressions (Johnson and Krüger 2004). In this last narrative, humans must not behave in a hubristic way, like Prometheus, who created humans and stole the fire from Zeus. Otherwise, the wrath of the gods might be sparked and, consequently, humanity punished similarly to Prometheus.

Our findings are not solely about technophobic/technophilic archetypal manifestations of what humans can *do* with technology but what can and cannot be done by "*becoming* technology." The contribution of this research lies in the thus far neglected role of technologies in changing the human condition by destabilizing humanity's ontological framing. Having this in mind, future investigations should embrace the promises, perils, and consequences of consumers' freedom and choices in becoming cyborgs, so that a deeper understanding of its psycho-social effects can be imagined. In our current philosophical and cultural framing, the perpetual and mutual influence among archetypes, myths, technologies, and consumers' narratives do not allow any boundary that sets cyborgs aside without symbolizing transcendence or transgression. Moreover, the observed complexity of consumer-technology relationships only reinforces the necessity of broader and more critical discussions about new forms of life. So, is Elon Musk correct? Are we already cyborgs? Are we our hearing aids, modified genes, smartphones, AirPods, and NFC Microchips? Is it up to the gods or to us to decide the limits or boundaries of being human?

REFERENCES

Belk, Russell W., Mariam Humayun, and Ahir Gopaldas (2020), "Artificial Life," *Journal of Macromarketing*, 40(2), 221–36.

Clynes, M. and N. Kline (1960), "Cyborgs and Space," *Astronautics*, (September), 26–27, 74–75.

Ensign, John (2005), "Rappers and Ranters: Scapegoating and Shadow in the Film 8 Mile and in Seventeenth Century Heresy," *San Francisco Jung Institute Library Journal*, 24(4), 17–39.

Fukuyama, Francis (1992), *The End Of History and the Last Man*, New York, NY: Macmillan, Inc.

Greimas, Algirdas J. and Joseph Courtes (1982), *Semiotics and Language, an Analytical Dictionary*, Bloomington, IN: Indiana University Press.

Heidegger, Martin (1977), *The Question Concerning Technology and Other Essays*, New York: Harper Perennial.

Hoffman, Donna L. and Thomas P. Novak (2018), "Consumer and Object Experience in the Internet of Things: An Assemblage Theory Approach," *Journal of Consumer Research*, 44(6), 1178–1204.

Hrynkow, Christopher (2020), *Spiritualities, Ethics, and Implications of Human Enhancement and Artificial Intelligence*, ed. Christopher Hrynkow, Delaware: Vernon Press.

Johnson, Dominic and Oliver Krüger (2004), "The Good of Wrath: Supernatural Punishment and the Evolution of Cooperation," *Political Theology*, 5(2), 159–76.

Jung, Carl G. (1959), "Aion: Researches into the Phenomenology of the Self," in *Collected Works of C.G. Jung Vol. 9*, ed. Gerhard Adler, Michael Fordham, Herbert Read, and Richard Francis Carrington Hull, Princeton: Princeton University Press, 4480–4841.

Kozinets, Robert V. (2019), *Netnography: The Essential Guide to Qualitative Social Media Research*, London, UK: SAGE Publications Ltd.

Musk, Elon (2018), "Joe Rogan Experience #1169 - Elon Musk," *Joe Rogan Experience*, https://www.youtube.com/watch?v=ycPr5-27vSI.

Oudshoorn, Nelly (2020), *Resilient Cyborgs*, Singapore: Springer Singapore, http://link.springer.com/10.1007/978-981-15-2529-2.

Revelations "Revelations 13:16-17," in *Holy Bible: King James Version*.

Schau, Hope (2018), "Consumers Volitional Identity Projects," in *Consumer Culture Theory*, ed. Eric J. Arnould and Craig J. Thompson, London: SAGE Publications Ltd, 19–39.

Schweitzer, Fiona, Russell Belk, Werner Jordan, and Melanie Ortner (2019), "Servant, Friend or Master? The Relationships Users Build with Voice-Controlled Smart Devices," *Journal of Marketing Management*, 35(7–8), 693–715.

Xiao, Li and V. Kumar (2019), "Robotics for Customer Service: A Useful Complement or an Ultimate Substitute?," *Journal of Service Research*, 09, 1–21.

The Egalitarian Value of Counterfeit Goods: How Perceptions of Inequality Illuminate the Hidden Egalitarian Value of Counterfeit Goods

Joyce Jingshi Liu, Hong Kong University of Science and Technology, Hong Kong, China
Wiley Wakeman, Stockholm School of Economics, Sweden
Michael Norton, Harvard Business School, USA

EXTENDED ABSTRACT

Counterfeit goods are tied to individual unethical behaviors (Gino et al. 2010), as well as broader criminal activity and safety hazards (International Anti-Counterfeiting Coalition 2005). Yet, the market for counterfeit goods continues to grow, projected to reach $4.2 trillion USD by 2022 (Frontier 2016). Willing purchase of counterfeits can be attributed to various sources of value, including economic and status signaling benefits of these produces (Wilcox et al. 2009). In this research, we explore another value of counterfeit goods that drives purchase, namely, the value counterfeits have in bolstering the impressions of social equality. We argue that counterfeits may be seen as addressing social inequality – an outcome we introduce here as the "egalitarian value" of consumer goods.

We argue that perceptions of this egalitarian value arise specifically when income inequality is salient. Because income inequality motivates concerns regarding social comparisons (Podder 1996; Cheung and Lucas 2016), consumers may be drawn to acquiring resources that are scarce, signaling their superior status in the hierarchy (Sharma and Alter 2012). However, and critical to this research, because inequality also motivates concerns regarding fairness (Oishi et al. 2011), consumers may be drawn to strategies that in fact reduce the exclusivity of scarce resources that are otherwise held by only the rich, leveling the playing field for all. We argue that counterfeit goods can serve the function of the latter. Thus, we explore the role that income inequality plays in motivating the recognition of this egalitarian value of counterfeit goods, as well as how this value motivates consumers' purchase intentions.

Indeed, in a pilot survey conducted in eight countries (N=1,463)[1], the social acceptance and prevalence of counterfeits increase, as the country-level income inequality, as well as individuals' perceptions of income inequality, increase. One reason for this relationship may be that counterfeits offer the appearance that society is fair, acting as a type of compensatory consumption mechanism (Sivanathan and Pettit 2010).

Three studies test our theorizing. Study 1 (N=208) has a 3 (video: inequality, control, equality; between-subjects) x 2 (products: counterfeit, legitimate; within-subjects) design. The inequality (vs. control vs. equality) condition watched a video about income inequality in the U.S. (vs. brain science vs. increasing equality), and rated an iPhone and a Goophone (a counterfeit iPhone) on their hedonic, utilitarian, economic and, critically, egalitarian values, and reported likelihood to purchase a counterfeit. We computed the relative values associated with a counterfeit versus a legitimate product[2]. Income inequality increased the relative egalitarian value associated with the counterfeit ($M_{inequality}$=1.36, $M_{control}$=.99, $M_{equality}$=.94, Table 1). Moreover, this egalitarian value mediates the effect of inequality (vs. control, equality) on purchase intentions toward a counterfeit (Bootstrap sample=5000, inequality vs. control 95% CI=[.008, .362];

inequality vs. equality 95% CI=[.0125, .4127]), independent of the other values (Table 1).

Study 2 tests individuals' social dominance orientation (SDO; Pratto et al. 1994) as a moderator and predicts that the observed effect will *not* hold among high SDO consumers, who endorse inequality. Participants (N=301) completed the same procedure as the inequality and control conditions in Study 1, in addition, they completed a Social Dominance Orientation Scale (Sidanius et al. 2000; α=.96). We found an inequality main effect (1=inequality, -1=control, β=.16, p=.033), qualified by an inequality X SDO interaction on relative egalitarian value (β=-.20, p=.008). Inequality (vs. control) increased the relative egalitarian values associated with a counterfeit among low SDO participants (-1 S.D.; β=.36, p<.001), but not high SDO participants (+1 S.D.; β=-.04, p=.709). Moreover, egalitarian value mediates the effect of inequality, moderated by SDO, on willingness to buy a counterfeit over a legitimate phone (Bootstrap sample=5000, 95% CI=[-.222, -.023][3], independently of the other values (Table 1). Thus, the egalitarian value associated with a counterfeit over their legitimate counterparts particularly appeals to those who support social equality.

Egalitarianism can be achieved by either reducing the status of the overprivileged, or by increasing the status of the underprivileged. Study 3 tests which motive more directly motivates counterfeit consumption. Participants (N=287) watched the same videos as in Study 2, and rated the relative hedonic, utilitarian, economic, status, and egalitarian values of an iPhone and a Goophone. Then, they reported the relative extent that the counterfeit is associated with a *spiteful egalitarianism* motive ("pulling down" those on the top) and that with a *benevolent egalitarianism* motive ("pushing up" those at the bottom), and their purchase preference for a counterfeit vs. legitimate phone. As before, income inequality (vs. control) increased the relative egalitarian value of a counterfeit ($M_{inequality}$=5.23, $M_{control}$=4.89, p=.011) and preference for a counterfeit ($M_{inequality}$=4.78, $M_{control}$=3.88, p=.022). Moreover, inequality (vs. control) increased the spiteful egalitarian motive associated with a counterfeit ($M_{inequality}$=5.24, $M_{control}$=4.81, p=.007); but did not affect the benevolent egalitarian motive ($M_{inequality}$=5.77, $M_{control}$=5.58, p=.228). The effect of inequality on purchase preference was mediated by spiteful egalitarian motive (Bootstrap sample=5000, 95% CI=[.017, .124]), but not benevolent egalitarian motive (95% CI=[-.018, .095]). Thus, income inequality increases counterfeit purchase, because it increases the perception that counterfeits, relative to legitimate goods, can improve social equality by reducing the privileges of those on the top.

In sum, under conditions of income inequality, counterfeit goods can be seen as "good" by making the world a fairer place, explaining the ongoing demand for these products.

---

1   Participants were recruited from China, India, Pakistan, UK, Spain, Russia, Chile and Mexico. A multi-level linear model regression was conducted, where the country-level Gini coefficients entered the model as a group-level variable, and the perceived income inequality entered the model as an individual-level variable.

2   We subtracted the rating of a counterfeit by the respective rating of a legitimate good for each value measured.

3   Note that for the moderated mediation model, the 95% CI are negative because the interaction of inequality prime (1=inequality, -1=control) and SDO on relative egalitarian value and on product preference both have negative coefficients, indicating that the effects are driven by those with low SDO. As such, the moderated mediation effect is also driven by those with low SDO (conditional indirect effect: 95% CI=[.0454, .3987]), and not those with high SDO (condition indirect effect: 95% CI=[-.1068, .0657]).

The (Mis)Perception of Altruistic Individuals: An Inference of Intertemporal Preferences

Yidan Yin, Wendy Liu, University of California San Diego, USA

EXTENDED ABSTRACT

INTRODUCTION

Alice is known by her friends and colleagues to be charitable. She volunteers in a local soup kitchen on weekends and donates to charity on a monthly basis. Recently, Alice received a promotion at work, and her friends would like to buy her a gift to celebrate. They are debating whether to buy her something that offers immediate gratification such as cupcakes, or something that provides benefits in the long-run such as a book on career management. More generally, will people's impression of Alice as a charitable person affect their prediction of Alice's intertemporal preference? Later, a new position is opening up at her company that is responsible for meeting a short-term deadline (versus a long-term corporate goal). Alice is interested in the position. When interviewing for the position, should Alice make a point to highlight or downplay her charitable efforts?

Altruistic behaviors and intertemporal behaviors are two of the most important and often-studied concepts in psychology, garnering interest among researchers in many subfields of behavioral science including social and cognitive psychology, neuroscience, behavioral economics, as well as marketing, managerial and medical decision making. An intriguing question is whether people perceive a relationship between these two behaviors, and what might be the underlying inference process. This perception is important to study because the perceptions of altruistic individuals affect how altruistic people are treated by others, which in turn can create positive or negative reinforcements for altruistic behaviors in society.

In five studies, three with real incentives for prediction accuracy, we propose and find that there is a strong social perception of a positive relationship whereby altruistic individuals are perceived to be focused on the long run. Importantly, and ironically, we also find that altruistic individuals are misperceived—in fact, in actual behavior, there is no relationship between altruism and intertemporal choice—a result that is consistent with past research showing mixed patterns of actual relationship (Bartels, Kvaran & Nichols 2013; Hershfield, Cohen & Thompson 2012; Rand 2016; Rand et al. 2012).

We propose three potential inference mechanisms through which the (mis)perception of altruism's link to intertemporal preferences can occur, and we test each in our studies. First, when observing a person behaving altruistically, people perceive the individual to care more about others (Carlson & Zaki, 2018). Research shows that the mental representations of others and the distant future are similar in that both are more psychologically distant than the present self (Fiedler et al., 2012; Soderberg et al., 2014; Trope et al., 2007). In fact, research has shown that people may view the self in the distant future as if it were another person, and as such may think about their future selves in similar ways as they think about other people (Bartels & Urminsky, 2011; Hershfield, 2019; Hershfield et al., 2011). Thus, a lay theory may draw on intuitions about psychological distance, and infer that an altruistic individual may have a broader construal beyond the present self, that includes not only others but also oneself in the distant future. Consequently, the altruistic person is perceived to care more not only about others, but also about the self in the future.

Hypothesis 1: *Altruistic people are perceived to put greater weight on the future due to their perceived broader construal that includes others and the self in the future.*

A second possibility is that people may have lay theories about how altruism and long-term versus short-term interests are related. Research has shown that altruism can also provide benefits to the self, such as a reputational benefit (Barclay 2006), a reciprocal favor (Fehr & Gachter 2000), or increased happiness (Dunn, Aknin & Norton 2008). Extending past research, we observe that often the costs and benefits of giving to the self can occur at different points in time. Specifically, when someone helps another person, there is an immediate cost to the self, however the downstream benefit to the self such as reputation, reciprocation, or long-term happiness and health (Post 2005) often occurs later in time. Therefore, we propose that there may be a lay perception that altruism, while costly in the short run, is good for the self in the long run. Further, people may perceive that one of the reasons why an individual behaves altruistically is because that individual believes in the long-term benefit of altruism. Such a belief aides them to overcome the aversion to the short-term cost to the self in order to choose to help others. Building on this lay belief, people then generalize the inference to a belief that the altruistic individual tends to care more about the long-term rather than short-term consequences of their actions in general. Thus, we hypothesize a second inference mechanism between perceived altruism and long-term importance:

Hypothesis 2: *Altruistic people are perceived to believe in the long-term benefits of giving, and they prioritize this long-term benefit over the short-term cost.*

This perception is then generalized to the belief that altruistic individuals are focused on long-term benefits over short-term interests in general.

Finally, yet a third path through which people may perceive a link between altruistic behavior and long-term preference is that altruistic individuals may be perceived to have better impulse control. Specifically, even when two individuals equally recognize and value long-term interests, they can still differentially struggle to override the impulse to pursue immediate interests (Figner et al. 2010). Altruistic individuals may be perceived to be more "disciplined" and better at regulating themselves towards their long-term goals.

Hypothesis 3: *Altruistic people are perceived to have better impulse control, and hence are more likely to act responsibly and help others.*

In summary, we propose an intertemporal dimension to the perception of altruistic individuals, whereby they are perceived to be more long-term oriented. Notably, this lay perception persists regardless of the actual relationship between altruistic behavior and long-term preference. We test this perception, its downstream consequences, and three potential underlying inference paths, in five studies.

Study 1

In Study 1, we used real incentives to test whether people believe more altruistic individuals are more likely to choose a later larger reward over an immediate smaller reward. Further, we examine whether there is an actual link between individuals' intertemporal choice and altruistic behavior.

Method

A total of 301 adults on mturk participated as "choosers" (M_{age} = 35.85, SD_{age} = 12.48; 171 men, 128 women, 2 participants declined to report).

Choosers were told that they would complete several short tasks linked together for convenience. In the first task, they made a choice between receiving $100 today or $110 in three months, knowing that there is a chance to receive the money for real. To reduce demand effects (of linking the intertemporal choice with the charity choice), next, choosers made two filler choices, namely, to choose their favorite fruit and ice cream flavors. Lastly, choosers decided whether to help a charity by completing an additional 3-minute survey about the charity for free. Those who said yes then proceeded to the additional survey.

In the second "guessers" phase of the study, 299 adults took part as guessers, among which 29 participants did not pass the attention check and were excluded from analyses, leaving 270 participants in the analyses (M_{age} = 36.61, SD_{age} = 11.16; 146 men, 123 women, 1 participant declined to report).

Each guesser was randomly paired with a chooser (drawn at random with replacement from the pool of 301 choosers): 43.0% (57.0%) guessers were paired with an altruistic (vs. non-altruistic) chooser. Guessers were shown the decisions the chooser made: their favorite fruit, their favorite ice cream flavor, and their decision of whether to help a charity. Guessers were then incentivized to guess whether the chooser chose to receive $100 today or $110 in three months. They would receive a $0.25 bonus if their guess matched the chooser's actual choice.

Results

As predicted, guessers were significantly more likely (in fact 4 times as likely) to guess their paired chooser chose $110 in three months when the chooser had decided to help a charity (M = 39.7%, 95% CI [30.7%, 49.2%]), than when the chooser had decided not to help (M = 9.74%, 95% CI [5.55%, 15.6%]), $\chi^2(1)$ = 32.17, p < .001, d = 0.74.

In actual behavior, however, the proportions of choosers choosing $110 in three months did not significantly differ among those who decided to help (M = 25.9%, 95% CI [18.2%, 34.8%]) and those who decided not to help (M = 22.1%, 95% CI [15.8%, 29.5%]), $\chi^2(1)$ = 0.33, p = .56, d = 0.07.

Discussion

Study 1 showed that although an actual relationship between altruistic behavior and intertemporal preference was absent, lay participants had a clear prediction that the altruistic individual would have greater long-term preference.

Study 2

Study 2 replicated study 1 findings using a similar design, with 297 "choosers" and 279 "guessers". Under real incentives for accuracy, guessers again were significantly more likely to guess their paired chooser chose a larger sum in three months over a small immediate sum when the chooser volunteered (M = 42.0%, 95% CI [30.2%, 54.5%]), than when the chooser did not volunteer (M = 14.3%, 95% CI [9.85%, 19.8%]), $\chi^2(1)$ = 22.34, p < .001, d = 0.59. However, again, the actual proportions of choosers choosing the larger sum in three months did not significantly differ among those who volunteered (M = 24.6%, 95% CI [15.0%, 36.5%]) and those who did not volunteer (M = 27.1%, 95% CI [21.2%, 33.7%]), $\chi^2(1)$ = 0.06, p = .80, d = 0.03.

Further, after controlling for perceived wealth in money, guessers were still more likely to predict long-term choice when choosers volunteered (vs. did not volunteer), $\chi^2(1)$ = 18.41, p < .001. Thus, perceptions of wealth in time and money cannot explain our results.

Study 2 then probed whether perceived long-term weight and/or perceived impulse control drove the effect. Mediation analyses using the mediation package in R (Tingley, Yamamoto, Hirose, Keele, & Imai, 2014) found only a significant indirect effect through perceived long-term weight, estimate = 0.16, 95% CI [0.10, 0.23], p < .001, but not impulsiveness. Thus, H3 was not supported. In sum, the belief that altruistic individuals are long-term oriented is due to their perceived greater prioritization of long-term interests, rather than reduced impulsiveness.

Study 3

Study 3 examined the downstream consequences of the perception. In a task with real incentives tied to outcomes, participants had to choose a person to lead a project with either a long-term or short-term profit goal. Participants were given the profile of two candidates. One of the candidates was manipulated to be more altruistic. Results showed that when choosing a candidate to lead a project with a long-term profit goal, 66% of participants voted for the more altruistic candidate, significantly more than 50%, p < .001, 95% CI [56.7%, 75.1%]. In contrast, for the project with a short-term goal, 31% voted for the more altruistic candidate, significantly less than 50%, p <.001, 95% CI [22.1%, 40.6%]. This study shows the perception of altruistic individuals has real consequences for when altruistic individuals would be favored in social contexts.

Study 4

Study 4 aimed to conceptually replicate S3. Further, Study 4 aimed to provide process evidence by testing H1 and H2, i.e., whether the effect is driven by an inference that altruistic individuals have a big-picture construal and focus on psychologically distant entities, or an inference that altruistic individuals believe in the long-term benefit of giving.

Results replicated study 3 where the altruistic individual is preferred only for tasks with long-term goals (84% participants appointed the more altruistic candidate to be the manager, significantly more than 50%, p <.001, 95 CI [75.3%, 90.9%]. When there is a mid-term goal, the altruistic individual is selected to the same extent as the non-altruistic individual (55% selecting, not significantly different from 50%, p = .49, 95% CI [42.7%, 66.2%]).

The more altruistic candidate was perceived to be more likely to see the big picture, as well as more likely to believe helping others pays off for the self in the long run. Mediation analyses showed that both inferences are significant drivers of the greater importance altruistic individuals place on the long run, which in turn drove the choice of the altruistic individual for tasks with long-term goals. Thus, both H1 and H2 are supported as the driver of the perception.

Study 5

One alternative account of the effect is that, to the extent having a long-term preference and altruism are considered desirable traits, people are simply seeing an association between two positive traits. If this was true, then people should see individuals with other positive traits such as likeability to have a long-term preference as well. In Study 5, we aimed to rule out this alternative explanation by manipulating perceived likeability versus perceived altruistic, imbedded in descriptions of many other traits. Participants made predictions about the target person's intertemporal choice. The study was therefore a 2 (trait presented: altruism, likeability) x 2 (level: high,

low) between-subjects design, and we predicted an interaction effect. We had 762 participants after exclusions for attention.

The main effects of trait level, $\chi^2(1) = 0.50$, $p = .48$, and trait type, $\chi^2(1) = 1.94$, $p = .16$, were non-significant. As predicted, the interaction was significant, $\chi^2(1) = 13.14$, $p < .001$. Participants were significantly more likely to guess the target person chose the future reward when the target person had high-level altruism ($M = 23.4\%$, 95% CI [17.6%, 30.1%]) than when the target person had low-level altruism ($M = 11.7\%$, 95% CI[7.41%, 17.4%]), $\chi^2(1) = 7.90$, $p = .005$, d = 0.30.

In contrast, participants were significantly more likely to guess the target person chose the future reward when the target person had low-level likeability ($M = 17.9\%$, 95% CI [12.8%, 23.9%]) than high-level likeability ($M = 10.3\%$, 95% CI [6.38%, 15.4%]), $\chi^2(1) = 4.06$, $p = .044$, d = 0.20. Thus, the perceived association with long-term focus is specific to altruism, rather than extending to all positive traits.

GENERAL DISCUSSION

How are altruistic individuals perceived by others? We found that they are perceived, erroneously, to prefer long-term interests. Further, people then favor altruistic individuals for tasks with long-term objective, while disfavoring altruistic individuals for short-term goals.

Consumers can use this knowledge to understand how altruism can aid versus hinder personal goals. For example, in the opening example, when marketing oneself for a long (vs. short)-term task, one should highlight (downplay) one's charitable behaviors. For marketers, it might be useful to consider the relationship between the firm's CRM (cause-related marketing) efforts, and the public's perception of the brand and the company. For example, do financial analysts forecast greater long-term profits for a firm upon a firm's CRM news announcements? Do consumers perceive a brand with significant CRM as a better (worse) long (short)-term purchase? These questions will be interesting to answer in future research.

REFERENCES

Barclay, P. (2006). Reputational benefits for altruistic punishment. *Evolution and Human Behavior, 27*(5), 325–344.

Bartels, D. M., & Urminsky, O. (2011). On intertemporal selfishness: How the perceived instability of identity underlies impatient consumption. *Journal of Consumer Research*, *38*(1), 182–198. https://doi.org/10.1086/658339

Bartels, D. M., Kvaran, T., & Nichols, S. (2013). Selfless giving. *Cognition*, *129*(2), 392-403.

Dunn, E. W., Aknin, L. B., & Norton, M. I. (2008). Spending money on others promotes happiness. *Science, 319(*5870), 1687–1688. https://doi.org/10.1126/science.1150952

Eysenck, S. B., Pearson, P. R., Easting, G., & Allsopp, J. F. (1985). Age norms for impulsiveness, venturesomeness and empathy in adults. *Personality and Individual Differences*, *6*(5), 613-619.

Fehr, E., & Gächter, S. (2000). Fairness and retaliation: The economics of reciprocity. *Journal of Economic Perspectives*, *14*(3), 159–181. https://doi.org/10.1257/jep.14.3.159

Fiedler, K., Jung, J., Wänke, M., & Alexopoulos, T. (2012). On the relations between distinct aspects of psychological distance: An ecological basis of construal-level theory. *Journal of Experimental Social Psychology*, *48*(5), 1014–1021. https://doi.org/10.1016/j.jesp.2012.03.013

Figner, B., Knoch, D., Johnson, E. J., Krosch, A. R., Lisanby, S. H., Fehr, E., & Weber, E. U. (2010). Lateral prefrontal cortex and self-control in intertemporal choice. *Nature Neuroscience*, *13*(5), 538.

Hershfield, H. E. (2019). The self over time. *Current Opinion in Psychology*, *26*, 72–75. https://doi.org/10.1016/j.copsyc.2018.06.004

Hershfield, H. E., Cohen, T. R., & Thompson, L. (2012). Short horizons and tempting situations: Lack of continuity to our future selves leads to unethical decision making and behavior. *Organizational Behavior and Human Decision Processes*, *117*(2), 298-310.

Hershfield, H. E., Goldstein, D. G., Sharpe, W. F., Fox, J., Yeykelis, L., Carstensen, L. L., & Bailenson, J. N. (2011). Increasing saving behavior through age-progressed renderings of the future self. *Journal of Marketing Research*, *48*(SPL), S23–S37. https://doi.org/10.1509/jmkr.48.SPL.S23

Post, S. G. (2005). Altruism, happiness, and health: It's good to be good. International *Journal of Behavioral Medicine, 12*(2), 66–77.

Rand, D. G. (2016). Cooperation, fast and slow: Meta-analytic evidence for a theory of social heuristics and self-interested deliberation. *Psychological Science*, *27*(9), 1192-1206.

Rand, D. G., Greene, J. D., & Nowak, M. A. (2012). Spontaneous giving and calculated greed. *Nature*, *489*(7416), 427.

Soderberg, C. K., Callahan, S. P., Kochersberger, A. O., Amit, E., & Ledgerwood, A. (2014). The effects of psychological distance on abstraction: Two meta-analyses. *Psychological Bulletin*. https://doi.org/10.1037/bul0000005

Tingley, D., Yamamoto, T., Hirose, K., Keele, L., & Imai, K. (2014). Mediation: R package for causal mediation analysis.

Trope, Y, Liberman, N., & Wakslak, C. (2007). Construal levels and psychological fistance: Effects on representation, prediction, evaluation, and behavior. *Journal of Consumer Psychology*, *17*(2), 83–95. https://doi.org/10.1016/S1057-7408(07)70013-X

To Touch or Not To Touch? The Effect of Product Touch on Consumers' Product Attribute Processing and Preference

Wumei Liu, Lanzhou University, China
Echo Wen Wan, the University of Hong Kong, China
Haizhong Wang, Sun Yat-Sen University, China

EXTENDED ABSTRACT

Introduction

Existing touch research examined the effect of product touch (versus no touch) on overall evaluation (Grohmann et al. 2007), purchasing likelihood (Citrin et al. 2003; McCabe and Nowlis 2003), ownership perceptions (Peck and Shu 2009), risk perceptions (Liu et al. 2017), and valuation (Peck and Shu 2009; Peck et al. 2013) of the product being evaluated, and on consumers' subsequent choice and purchase of other products (Streicher and Estes 2016; Ringler et al. 2019). *However,* function and appearance are of a product's two basic attributes (Townsend et al. 2011). Consumers' evaluation and preference of functional attributes and appearance (hedonic, aesthetics) attributes can be affected by several consumer-level (e.g., Bloch et al. 2003; Wan et al. 2017), contextual level (e.g., Chen et al. 2017; Chitturi et al. 2007), and product-level (e.g., Okada 2005; Wan et al. 2017) factors. *It is unclear whether product touch affects consumers' processing of and preference for a specific product attribute.* This research gap motivated our paper.

Hypotheses

Mental simulation (reenactments of previous experiences that have been stored in memory, Papies et al. 2017), often comes from individuals' sensory experiences and bodily activities (Elder and Krishna 2012; Papies et al. 2017; Krishna and Schwartz 2014). Touching a product involves actions of trying and using the product. Therefore, product touch (versus no touch) should increase usage simulation (mentally simulate the action of using the product). Because mental simulations of a motor activity subsequently engender consumers' desire to actually perform this action, due to activation of approach responses (Elder and Krishna 2012; Liu et al. 2018; Papies et al. 2017; Ping et al. 2009). Therefore usage simulation will trigger consumers a strong goal to subsequently know more about the product's usage (usage goal). Usage is often more closely linked with function rather than appearance. So, product touch (versus no touch) will increase consumers' processing and preference for the product's functional rather than appearance attribute information (*Hypotheses 1-2*), due to increases in usage simulation and usage goal (*Hypothesis 3*). This effect will disappear (versus be more evident) when the product is dominant in appearance (versus function) (*Hypothesis 4*), because usage simulation and usage goal will not occur when evaluating an appearance-dominant product.

Overview of Experiments

Experiments 1-2 tested the effect of touch on functional attribute processing (H1) as well as the serial mediation process (H2), via an information searching task (Wan et al. 2017). Experiments 3-4 next tested the downstream marketing consequences of functional attribute processing, functional attribute preference (H2), and the underlying mechanisms (H3) in lab (Experiments 3) and field (Experiment 4). Finally, Experiment 5 tested H4. *See Table 1 for details of each experiment.*

Experiments 1-2

Experiment 1 first randomly assigned participants to one of four treatments (product touch vs. no touch vs. product image touch vs. neutral/baseline), and then invited participants to complete a product attribute searching task (Wan et al. 2017). The number of coins participants spent in searching for functional attribute and appearance attribute information were recorded, and were generated into a functional attribute searching ratio. As expected, the ratio in the product touch condition was higher than that in the no touch ($t(88) = 2.35$, $p = .021$), picture touch ($t(88) = 2.11$, $p = .038$) and baseline ($t(86) = 2.45$, $p = .016$) conditions. However, the ratio among the latter three conditions were similar, $F(2,130) = .039$, $p = .961$, supporting H1 and suggesting that the touch effect on functional attribute processing was 1) driven by *touch* rather than by *no touch*, and 2) unique and cannot be replaced by picture touch.

Experiment 2 first randomly assigned participants to one of two treatments (touch vs. no touch), and then invited participants to wear an eye-tracker to browse the product's functional attribute and appearance attribute information for 1 minute. As expected, participants fixated longer duration ($F(1,102) = 3.95$, $p = .049$) and more frequent times ($F(1,102) = 3.99$, $p = .048$) of the functional attribute information after touching versus not touching a product, supporting H1. A bootstrap analysis showed that usage simulation and usage goal serially mediated the touch effect on functional attribute fixation duration (indirect effect = .0439, 95% CI [.0012, .2048] excluded zero) and fixation times (indirect effect = 1.3211, 95% CI [.0390, 5.9503]), supporting H2.

Experiments 3-5

Experiments 3 and 4 both employed a touch manipulation (touch vs. no touch) one-way between-subjects design. Experiment 4 was run by a salesperson in a university store after training. As expected, participants in Experiment 3 preferred to upgrade the product's function rather than appearance after product touch (versus no touch), $t(156) = 2.30$, $p = .023$. This effect was mediated by usage simulation and usage goal (indirect effect = .0462, 95% CI [.0012, .1489] excluded zero). Experiment 4 showed that a higher percentage of consumers favored the pen's new version to be superior in function after being encouraged to touch (versus not touch) the pen, Pearson $\chi^2(1) = 4.25$, $p = .039$.

Experiment 5 employed a touch manipulation (touch vs. no touch) x product type (function dominant vs. appearance dominant) two-way between-subjects design. As expected, after evaluating a function-dominant product, participants in the touch (versus no-touch) condition reported a higher preference to upgrade the product's function, $F(1,186) = 6.97$, $p = .009$. This difference disappeared after evaluating an appearance-dominant product, $F(1,186) = .09$, $p = .707$, supporting H4. A bootstrap analysis showed that this moderation effect was mediated by usage simulation and usage goal (indirect effect = -.0245, 95% CI[-.0686, -.0061]).

Discussion

First, we identified a novel outcome (functional attribute processing and preference) of consumers' product touch behavior. Second, we identified a novel antecedent (product touch) of consumers'

functional attribute processing and preference. Third, we observed a new form of mental simulation (usage simulation) and found it increased functional attribute processing and preference. This paper also has rich implications to online and offline retailing, and to product attribute design.

REFERENCES

Bloch, Peter H. (1995), "Seeking the Ideal Form: Product Design and Consumer Response," *Journal of Marketing*, 59 (3),16–29.

Bloch, Peter H., Brunel, Frederic F. and Arnold Todd J. (2003), "Individual Differences in the Centrality of Visual Product Aesthetics: Concept and Measurement," *Journal of Consumer Research*, 29 (4), 551–565.

Chen, Charlene Y., Lee, Leonard and Yap, Andy (2017), "Control Deprivation Motivates Acquisition of Utilitarian Products," *Journal of Consumer Research*, 43 (6), 1031–1047

Chitturi, Ravindra., Rajagopal, Raghunathan and Vijay, Mahajan (2007), "Form versus Function: How the Intensities of Specific Emotions Evoked in Functional versus Hedonic Trade-Offs Mediate Product Preferences," *Journal of Marketing Research*, 44 (4), 702–714.

Citrin, Alka V., Stem, Donald E., Spangenberg, Eric R. and Clark, Michael J. (2003), "Consumer need for tactile input an internet retailing challenge," *Journal of Business Research*, 56 (11), 915–922.

Elder, Ryan S. and Krishna, Aradhna (2012), "The "Visual Depiction Effect" in Advertising: Facilitating Embodied Mental Simulation through Product Orientation," *Journal of Consumer Research*, 38(6), 988–1003

Grohmann, Bianca., Spangenberg, Eric R. and Sprott, David E. (2007), "The influence of tactile input on the evaluation of retail product offerings," *Journal of Retailing*, 83 (2), 237–245.

Krishna, Aradhna and Schwarz, Norbert (2014), "Sensory perception, embodiment, and grounded cognition: Implications for consumer behavior," *Journal of Consumer Psychology*, 24 (2), 159–168.

Liu, Wumei, Batra, Rajeev and Wang, Haizhong (2017), "Product touch and consumers' online and offline buying: The role of mental representation**,**" *Journal of Retailing,* 93 (3), 369–381.

Liu, Yi., Zang, Xuelian., Chen, Lihan., Assumpção, Leonardo and Li, Hong (2018), "Vicariously touching products through observing others' hand actions increases purchasing intention, and the effect of visual perspective in this process: An fMRI study," *Human Brain Mapping*, 39 (1), 332–343.

McCabe, Deborah B. and Nowlis, Stephen M. (2003), "The Effect of Examining Actual Products or Product Descriptions on Consumer Preference," *Journal of Consumer Psychology*, 13 (4), 431–439.

Okada, Erica Mina (2005), "Justification Effects on Consumer Choice of Hedonic and Utilitarian Goods," *Journal of Marketing Research*, 42 (1), 43–53.

Papies, Esther K., Best, Maisy., Gelibter, Elena and Barsalou, Lawrence W. (2017), "The Role of Simulations in Consumer Experiences and Behavior: Insights from the Grounded Cognition Theory of Desire," *Journal of the Association for Consumer Research*, 2 (4), 402-418.

Peck, Joann and Childers, Terry L. (2003), "To have and to hold: The influence of haptic information on product judgments," *Journal of Marketing*, 67 (2), 35–48.

Peck, Joann and Childers, Terry L. (2003b), "Individual Differences in Haptic Information Processing: The "Need for Touch" Scale," *Journal of Consumer Research*, 30 (3), 430–442.

Peck, Joann, Barger, Victor A. and Webb, Andrea (2013), "In search of a surrogate for touch: The effect of haptic imagery on perceived ownership," *Journal of Consumer Psychology*, 23 (2), 189–196.

Peck, Joann and Shu, Suzanne B. (2009), "The Effect of Mere Touch on Perceived Ownership," *Journal of Consumer Research*, 36 (3), 434–447.

Ping, Raedy M., Dhillon, Sonica and Beilock, Sian L. (2009), "Reach for What You Like: The Body's Role in Shaping Preferences," *Emotion Review*, 1 (2), 140–50.

Ringler, Christine., Sirianni, Nancy J., Gustafsson, Anders and Peck, Joann (2019), "Look but Don't Touch! The Impact of Active Interpersonal Haptic Blocking on Compensatory Touch and Purchase Behavior," *Journal of Retailing*, 95 (4), 186–203.

Shen, Hao., Zhang, Meng and Krishna, Aradhna (2016), "Computer Interfaces and the "Direct-Touch" Effect: Can iPads Increase the Choice of Hedonic Food?" *Journal of Marketing Research*, 53 (5),745–758

Streicher, Mathias C. and Estes, Zachary (2016), "Multisensory interaction in product choice: Grasping a product affects choice of other seen products," *Journal of Consumer Psychology*, 26 (4), 558–565.

Townsend, Janell D., Montoya, Mitzi M. and Calantone, Roger J. (2011), "Form and function: A matter of perspective," *Journal of Product Innovation Management*, 28 (3), 374–377.

Wan, Echo W., Chen, Rocky P. and Jin, Liyin (2017), "Judging a book by its cover? The effect of anthropomorphism on product attribute processing and consumer preference," *Journal of Consumer Research*, 43 (6), 1008–1030.

Food Packaging and Guilt: The Effects of the Color Red and Negative Cognitive Associations for Vice Versus Virtue Food Products

Renaud Lunardo, Kedge Business School, France
Camille Saintives, INSEEC Business School, France
Damien Chaney, South Champagne Business School, France

EXTENDED ABSTRACT

Through three studies, we demonstrate that because of the association of the color red with transgression, consumers feel more guilt when exposed to a red (versus green or blue) food packaging. This effect depends on the vice categorization of the food, red leading to stronger guilt for vice products.

Influencing evaluations (Mai et al 2016) and choice (Genschow et al. 2012; Madzharov et al. 2016), color can act as a powerful cue for food packages. In particular, research has stressed the role of cognitions in people's responses to color on food packages (Spence 2018). However, in spite of the negative meanings of the color red and specifically its association with mistakes and transgression (Mehta and Zhu 2009), no research to date has examined how such negative associations might negatively affect emotions and behavior toward red-colored food products. What we suggest is that because of such meanings, the red color may prompt guilt, a negative emotion that is closely linked to transgression (Baumeister et al. 1994). Building on the notion of self-signaling (Prelec and Bodner 2003), we demonstrate in three studies the notion that red (versus green, blue) leads to stronger negative associations and guilt – and eventually on behavior –, especially when used for vice (i.e., unhealthy; Chernev and Gal 2010; Mishra and Mishra 2011) products.

THEORETICAL BACKGROUND

Colors can lead people to form cognitive responses that then influence their behavior (Elliot et al. 2007). Because the color red carries specific meanings related to the negative notions of transgression (Mehta et al. 2017) – red being used for traffic lights and stop signs (Elliot et al. 2007) –, being exposed to the color red on a food package may lead people to make negative inferences about the food product. To this regard, research shows that the red color color makes people more vigilant and leads to a change in more conscious attitudes (Crowley 1993). Because guilt is a negative and self-conscious emotion generated in response to transgression (Baumeister et al. 1994), exposure to the color red may lead consumers to be more aware of their misbehavior (De Bock et al. 2013) and to exhibit guilt feelings. Therefore, we propose that because red is associated with transgression (Elliot et al. 2007), it will cause people to anticipate or experience more guilt from the consumption of the colored stimulus, leading to negative behavioral responses. This effect may occur when red is contrasted with green, which is widely considered the opposite of red (De Bock et al. 2013; Schloss and Palmer 2011) and carries positive meanings for food products (freshness, …). Hence:

Hypothesis 1: *The red color of food packages leads to stronger negative cognitive associations than the green color.*

Hypothesis 2: *Negative cognitive associations positively affect guilt (H2a) and thus mediate the effect of the color red (versus green) on guilt feelings (H2b).*

The question remains whether the indirect effect of the color red (versus green) on guilt occurs for any food product's package. In this regard, in the food domain, people categorize products according to a good/bad dichotomy of virtues and vices (Chernev and Gal 2010; Mishra and Mishra 2011). Virtue products are those that are consistent with long-term self-control goals, and vice products represent those that are consistent with goals of immediate gratification (Chernev and Gal 2010). Given this characterization, vice food products are usually viewed as unhealthy and virtue products as healthy (Dhar and Wertenbroch 2012; Sela et al. 2009). Building on the notion of self-signaling (Prelec and Bodner 2003), Dhar and Wertenbroch (2012) showed that the consumption of vice products leads consumers to believe that they lack the ability to resist temptation. With these negative beliefs prompted by vice products and also because the color red makes people more vigilant (Elliot et al. 2007) and conscious (Crowley 1993), vice products may reinforce the negative cognitions that people associate with red vice products. Therefore:

Hypothesis 3: *The vice versus virtue product type moderates the effects of the color red (versus green) on negative cognitive associations, such that red leads to stronger negative cognitive associations for vice (versus virtue) products (H3a). It also moderates the indirect effect of the color red (versus green) on guilt through negative cognitive associations, with red leading to stronger negative cognitive associations and guilt feelings for vice (versus virtue) products (H3b).*

Extant literature provides evidence on how guilt precludes people from engaging in the consumption of what causes this emotion (Duhachek et al. 2012; Matherly et al. 2019), suggesting the following:

Hypothesis 4: *The vice versus virtue product type moderates the serially mediated indirect effect of the color red (versus green) on behavioral intentions through negative cognitive associations and guilt. Specifically, for vice (versus virtue) products, red indirectly leads to lower behavioral intentions through the mediating effect of negative cognitive associations and guilt feelings.*

STUDY 1

Procedure

This field experiment manipulated the red versus green color of a food packaging, more precisely a squared box that researchers covered with either red or green paper and that differed in hue (red versus green) but—as much as possible—not in saturation and value. This experiment took place over two morning master-level classes. At the beginning of the class, students were exposed to one of the red and green boxes that was placed on a table. The boxes had been filled with chocolate—all of the same size, taste, and brown color—and students were told that they were allowed to approach the box to pick some chocolates, which they should completely consume. Three hours after having picked some chocolates, students were given a questionnaire. Two students did not agree to participate, making

the sample composed of 97 individuals (55.7% female). None was color-blind.

Participants rated the degree of guilt they felt after having eaten the chocolates (*guilty/culpable/remorseful*; α=.84; Agrawal and Duhachek 2010). Then, to measure negative cognitive associations, participants rated the degree to which they associated the color of the boxes with two words (*transgression* and *forbidden*; α=.70; Elliott et al. 2007). In order to rule out the explanation that it is the color green that negatively affects guilt because of its positive meaning (Mai et al. 2016), the positive cognitive association of "freshness" was measured. In addition, participants were asked to indicate the number of chocolates they had picked from the box.

Covariates were then measured. Because the study took place during the morning, participants were asked if they had breakfast before the study (0=No, 1=Yes). Also, a four-item measure of diet habits (Mohr et al. 2012; α=.82) was included. Further, because the color red is associated with sugar tastes (Spence, 2018), an item was added asking to what extent participants associated the color red with sugar tastes to rule out the notion that the lower number of chocolates picked could not be due to such associations. Finally, participants indicated on two mono-item scales their attitude toward the color of the box and chocolates in general. All scales were 7-point Likert scales.

Results

An ANCOVA that the color condition (0=Green, 1=Red) as the fixed factor, negative cognitive associations as the dependent variable, and the aforementioned covariates, revealed significantly stronger negative cognitive associations in the red condition (M = 3.32) than in the green condition (M=1.31, $F(1, 88)$=56.45, p<.001), supporting H1. Covariates had no significant impact (p's>.05). Supporting H2, a mediation analysis (Process, Model 4) then revealed a significant indirect effect of the color red versus green on guilt (β=.54, 95% CI=.092, 1.157). Specifically, the color red increases negative cognitive associations (β=2.05, p<.001), which then positively affects guilt (β=.26, p<.05). This indirect effect of color on guilt was replicated without the covariates (95% CI=.183, 1.126). No direct effect was observed (p>.05). Importantly, the alternative explanation that green could exert a negative effect on guilt due to the positive meaning associated with this color was ruled out (95% CI=-.392, .154).

Finally, and although no hypothesis was stated about an effect of the color red on choice, a significant serial mediation (β=−.11, 95% CI=−.348, −.011) indicated that the positive indirect effect of the color red on guilt through negative cognitive associations is followed by a decrease in the number of chocolates chosen (β=−.21, p<.05).

Discussion

Study 1 demonstrates that it is because the red color evokes transgression that people feel more guilt consuming some foods from a red versus green package. Study 1 also shows that guilt ultimately leads people to choose less of a food product from a red versus green package.

STUDY 2

Study 2 aims to test the moderating effect of vice and virtue on the red color–guilt relationship.

Procedure

Two hundred forty individuals were recruited online. Because of seven people being color-blind, the final sample included 233 ob-

servations (53.2% male; M_{Age}=30.35). The experiment employed a 2 (predominant food package color: red versus green) × 2 (product type: vice versus virtue) between-subjects design. Participants read a short scenario that asked them to imagine being at home in the middle of the morning, getting hungry, and finding a cereal bar in a kitchen cupboard. The cereal bar served as the focal product because it can have both virtue and vice connotations. Following previous manipulations of vice and virtue (Mishra and Mishra 2011), the emphasis in the vice condition was thus on the calories of the bar, while in the virtue condition the claims were about the product's healthfulness. After exposure to the stimuli, participants complete the same measures as previously (α_{Guilt}=.87; α_{Negative associations}=.80). For manipulation check purposes, participants rated how unhealthy the cereal bar was (1="not at all unhealthy"; 7 "very unhealthy").

Results

Participants perceived the cereal bar in the vice condition as significantly unhealthier (M_{Vice}=4.08; M_{Virtue}=2.32; $F(1, 232)$=73.53, p<.001), and the interaction between color and the vice versus virtue manipulation was not significant (p>.10), making the manipulation of vice versus virtue successful.

Supporting H1, an ANOVA showed that negative cognitive associations were stronger when the package was red (M_{Red}=2.20; M_{Green}=1.86; $F(1, 232)$=4.77, p<.05). Then, a mediation analysis replicated the mediating effect of negative cognitive associations (95% CI=.035, .483), with the color red (versus green) prompting negative cognitive associations (β=.33, p<.05), such associations increasing guilt feelings (β=.76, p<.001).

Next, a moderated-mediation analysis tested the moderating role of the vice versus virtue property of the food product. The results revealed a significant interaction of color and product type on negative cognitive associations (β=.72, p<.05; Figure 1) and no main effects of color and product type (p's>.05; Figure 2). Independent samples *t*-tests performed in each product type condition revealed no significant mean difference of negative cognitive associations in the virtue condition (t=.852, p>.05) but a significant difference in the vice condition (M_{Green}=1.98, M_{Red}=2.68; t=−3.06 p<.01), supporting H3a. Furthermore, the analysis revealed a significant index of moderated mediation (95% CI=.118, .990), such that negative cognitive associations mediated the effects of the color red on guilt feelings in the vice product condition (95% CI=.193, .865) but not in the virtue condition (95% CI=−.298, .233), supporting H3b.

Finally, a moderated serial mediation analysis (95% CI = −.313, −.015) – which included a single-item measure of behavioral intentions ("To what extent would you like to eat this crunchy bar?"; 1 = "not at all" and 7 = "very much") as the dependent variable –revealed a serially mediated effect of the color red on intentions only in the vice condition (95% CI=−.275, −.023) and not in the virtue condition (95% CI=−.054, .087). In the vice condition, the color red increases negative cognitions (β=.69, p<.01), which increase anticipated guilt (β=.70, p<.001), such guilt decreasing behavioral intentions (β=−.39, p<.001).

Discussion

Study 2 shows that red has stronger effects on negative cognitive associations, anticipated guilt feelings and intentions when the food is a vice product. In study 3, because red is sometimes opposed to blue (Bagchi and Cheema 2013; Mehta and Zhu 2009), we aim to replicate the current findings when opposing a red food package to green and blue food packages.

STUDY 3

Procedure

This experiment was completed online by 481 individuals (0 color-blind; 67.4% female, M_{Age} = 36.03). Color was manipulated at three levels (red versus green versus blue). Packages of chips were designed that differed only in their red, green, or blue hue. To manipulate their vice versus virtue property, the flavor of the chips was either "cheese and bacon" (vice condition) or "veggie" (virtue condition). Participants read a short scenario adapted from that of study 2 and completed the same measures as previously (α_{Guilt}=.81; $\alpha_{Negative\ associations}$=.68).

Results

Participants in the vice condition perceived the package of chips as unhealthier (*M*=5.39) than those in the virtue condition (*M*=4.26; *F*(1, 479)=79.52, *p*<.001), making the manipulation of vice versus virtue successful. Healthiness perception did not vary with color (*p*>.60).

An ANOVA followed by a Least Significant Difference (*LSD*) test supported H1, with a significant difference of negative cognitive associations across colors (*F*(2, 478)=4.91, *p*<.01), and the color red (*M*=2.37) leading to significantly stronger negative cognitive associations than the colors green (*M*=1.94, *p*=.002) and blue (*M*= 2.06, *p*=.031).

Then, two mediation analyses were conducted, respectively opposing the color red to the color green and blue. Supporting H2, results revealed a mediating effect of negative associations in both analyses ($\beta_{Red/Green}$=.24, 95% CI=.074, .417; $\beta_{Red/Blue}$=.07, 95% CI=.003, .172).

Testing H3, two moderated-mediation analyses were performed, again opposing the color red to either green or blue. When opposed to green, the red color significantly interacted with the vice versus virtue property of the chips (β=.56, *p*<.05; Figure 1). More specifically, a significant difference of negative cognitive associations emerged in the vice condition (M_{Green}=2.01, M_{Red}=2.70; *p*<.001), but not in the virtue condition (*t*=.73, *p*>.05). Results also revealed a significant index of moderated mediation (β=.34, 95% CI=.022, .684), with an indirect effect of the color red on guilt in the vice condition (95% CI=.170, .662) but not in the virtue condition (95% CI=−.159, .292).

The moderating-mediation analysis that opposed the colors red and blue revealed a marginally significant interaction between color and vice (β=.23, *p*=.09), followed by a non-significant index of moderated mediation (95% CI=−.080, .245). This indicates that the vice property of a food product's packaging does not change the indirect effect of the color red on guilt feelings when such color is opposed to blue.

Finally, a moderated serial mediation analysis opposing red to green (using the same dependent variable as in study 2) revealed a significant index (95% CI=−.211, −.002). As previously, a significant serially mediated effect of the color red on intentions was observed in the vice condition (95% CI=−.222, −.015) but not observed in the virtue condition (95% CI=−.088, .039). Hence, when the food product is considered a vice, the red package color leads to lower consumption intentions due to the negative cognitive associations and subsequent guilt. When opposing the red and blue colors, no moderated serial mediation was observed (95% CI=−.064, .007).

CONCLUSION

This research contributes to the recent stream of literature on the influence of food package color (Madzharov et al., 2016; Mai et al., 2016) by showing that merely being exposed to the color red on food packaging can heighten negative cognitions and the particular emotion of guilt. The three studies show that such effect is due to the negative associations of red with transgression, and is observed when red is opposed to green – not blue – and featured on vice food products.

REFERENCES

Agrawal, Nidhi and Adam Duhachek (2010), "Emotional Compatibility and the Effectiveness of Antidrinking Messages: A Defensive Processing Perspective on Shame and Guilt," *Journal of Marketing Research*, 47 (2), 263–273.

Bagchi Rajesh and Amar Cheema (2013), "The Effect of Red Background Color on Willingness-to-Pay: The Moderating Role of Selling Mechanism," *Journal of Consumer Research*, 39 (5), 947–960.

Baumeister, Roy F., Arlene M. Stillwell, and Todd F. Heatherton (1994), "Guilt: An Interpersonal Approach," *Psychological Bulletin*, 115, 243–67.

Chernev, Alexander and David Gal (2010), "Categorization Effects in Value Judgments: Averaging Bias in Evaluating Combinations of Vices and Virtues," *Journal of Marketing Research*, 47 (4), 738–747.

Crowley, Ayn E. (1993), "The Two-Dimensional Impact of Color on Shopping," *Marketing Letters*, 4 (1), 59–69.

De Bock, Tine, Mario Pandelaere, and Patrick Van Kenhove (2013), "When Colors Backfire: The Impact of Color Cues on Moral Judgment," *Journal of Consumer Psychology*, 23 (3), 341–348.

Dhar, Ravi and Klaus Wertenbroch (2012), "Self-Signaling and the Costs and Benefits of Temptation in Consumer Choice," *Journal of Marketing Research*, 49 (1), 15–25.

Duhachek, Adam, Nidhi Agrawal, and DaHee Han (2012), "Guilt Versus Shame: Coping, Fluency, and Framing in the Effectiveness of Responsible Drinking Messages," *Journal of Marketing Research*, 49 (6), 928–941.

Elliot, Andrew J., Markus A.Maier, Arlen C. Moller, Ron Friedman and Jörg Meinhardt (2007), "Color and Psychological Functioning: The Effect of Red on Performance Attainment," *Journal of Experimental Psychology: General*, 136(1), 154–68.

Genschow, Oliver, Leonie Reutner, and Michaela Wänke (2012), "The Color Red Reduces Snack Food and Soft Drink Intake," *Appetite*, 58(2), 699–702.

Madzharov, Adriana V., Suresh Ramanathan, and Lauren G. Block (2016), "The Halo Effect of Product Color Lightness on Hedonic Food Consumption," *Journal of the Association for Consumer Research*, 1 (4), 579–591.

Mai, Robert, Claudia Symmank, and Berenike Seeberg-Elverfeldt (2016), "Light and Pale Colors in Food Packaging: When Does This Package Cue Signal Superior Healthiness or Inferior Tastiness?," *Journal of Retailing*, 92 (4), 426–444.

Matherly, Ted, Anastasiya Pocheptsova Ghosh, and Yogesh V. Joshi (2019), "The Freedom of Constraint: How Perceptions of Time Limitations Alleviate Guilt From Two-Phase Indulgent Consumption," *Journal of the Association for Consumer Research*, 4 (2), 147–159.

Mehta, Ravi and Rui (Juliet) Zhu (2009), "Blue or Red? Exploring the Effect of Color on Cognitive Task Performances," *Science*, 323 (5918), 1226–1229.

Mehta, Ravi, Joris Demmers, Willemijn M. van Dolen, and Charles B. Weinberg (2017), "When Red Means Go: Non-Normative Effects of Red Under Sensation Seeking," *Journal of Consumer Psychology*, 27 (1), 91-97.

Mishra, Arul, and Himanshu Mishra (2011), "The Influence of Price Discount Versus Bonus Pack on the Preference for Virtue and Vice Foods," *Journal of Marketing Research*, 48 (1), 196–206.

Mohr, Gina S., Donald R. Lichtenstein, and Chris Janiszewski (2012), "The Effect of Marketer-Suggested Serving Size on Consumer Responses: The Unintended Consequences of Consumer Attention to Calorie Information," *Journal of Marketing*, 76 (1), 59–75.

Prelec, Drazen and Ronit Bodner (2003), "Self-Signaling and Self-Control," in George Loewenstein, Daniel Read, and Roy Baumeister (Eds.), *Time and Decision: Economic and Psychological Perspectives on Intertemporal Choice*, New York: Russell Sage Foundation, pp. 277–298.

Schloss, Karen B. and Stephen E. Palmer (2011), "Aesthetic Response to Color Combinations: Preference, Harmony, and Similarity," *Attention, Perception and Pyschophysics*, 73 (2), 551–571.

Sela, Aner, Jonah Berger, and Wendy Liu (2009), "Variety, Vice, and Virtue: How Assortment Size Influences Option Choice," *Journal of Consumer Research*, 35 (6), 941–951.

Spence, Charles (2018), "Background Colour and its Impact on Food Perception and Behavior," *Food Quality and Preference,* 68, 156–166.

Warmth Versus Competence Positioning: Impacts of Human-Like Body Shapes of Anthropomorphized Products on Consumers

Yixia Mai, Sun yat-sen University, China
Bing Shi, Sun Yat-Sen University, China

EXTENDED ABSTRACT

Anthropomorphism refers to the way of imbuing non-human agents with humanness (Epley, Waytz, & Cacioppo, 2007). Prior research focuses on endowing a product/brand a human-like face (Aggarwal & McGill, 2007) or body parts (Touré-Tillery & McGill, 2015), whereas little attention is paid to the overall body shape of an anthropomorphized product/brand. Note that mimicry of human body shapes is common in the market, such as Mr. Juicy curve-shaped bottles and Air Jordan's basketball-man-silhouette logo. How human-like product body shapes affect consumer perception and behavior is of great interest to marketing researchers and practitioners.

Perceived traits for chubby versus thin body shape

Social psychologists have demonstrated that body shapes lead to different impressions (e.g., Brodsky, 1954). Recent findings highlight variability in people's spontaneous associations of personality traits with body shapes (Hu et al., 2018). For instance, fatness when being perceived positively (or "chubbiness" as termed in this research—being plump and round in a pleasantly looking way, not too overweight) is more likely associated with friendliness and interpersonal warmth (Vallen et al., 2019). Consistently, round logo shapes, as compared to angular shapes, are related to characters such as friendliness, approachableness and gentleness (Jiang et al., 2016).

By contrast, thin bodies (i.e., individuals with lower amount of body fat than average-weight individuals, but not ultra-skinny) are perceived as independent, dependable, efficient and disciplined (Hu et al., 2018; Tiggemann & Rothblum, 1988). Young adults with slim physique are found to have a higher socio-economic status than fat counterparts (Muñoz-Cachón et al., 2007). Thin individuals are perceived as self-controlled, intelligent (Robertson & Vohora, 2008), competent (Tiggemann & Rothblum, 1988), and confident (Hu et al., 2018). According to the Big Five personality model (Barrick, Mount, & Judge, 2001), conscientiousness is associated with dependability, achievement-striving, and planfulness. Taken together, we predict:

Hypothesis 1:   *A chubby humanized shape of a product is more likely to trigger consumers' perception of agreeableness whereas a thin humanized shape is more likely to trigger perception of conscientiousness.*

Warmth and competence product positioning

In marketing, products are often positioned with key attributes which communicate benefits and help establish the product/brand images (Schiffman & Wisenblit, 2015). Body shapes of anthropomorphized products represent product design features. How product design interacts with the positioning is important to marketers/advertisers. Moreover, in marketing/advertising practices, a product is typically promoted in combination of images and verbal information (Jiang et al., 2016). Considering these, we further focus on the interplay between pictorial, anthropomorphized product body shape and verbally described product positioning upon consumers.

Two types of positioning—warmth and competence—are the core dimensions proposed in Brands as Intentional Agents Framework (BIAF; Kervyn, Fiske, & Malone, 2012). BIAF defines warmth as perceived intentions of a product/brand and competence as its ability to enact these intentions (Kervyn et al., 2012). Bridging social cognition and marketing practices, the warmth dimension corresponds to perceptions about humans which capture characteristics including friendliness, sincerity and trustworthiness, closely associated with Agreeableness (Kervyn et al., 2012). The competence dimension reflects characteristics such as intelligence, determination, persistence and efficacy/efficiency, which are projected mostly onto Conscientiousness and Openness of the Big Five personality model (Fiske, Cuddy, & Glick, 2007). Based on the foregoing discussion on Hypothesis1, and considering that evaluation of an anthropomorphized product depends on how well its anthropomorphic characters fit the relevant human schema (Aggarwal & McGill, 2007), we predict:

Hypothesis 2:   *Product attitude will be more favorable and purchase intention (PI) will be higher when product humanized body shape matches the positioning (i.e., chubby shape-warmth positioning or thin shape-competence positioning) than when they mismatch.*

Furthermore, regarding the proposed association of chubby body shapes with Agreeableness and thin body shapes with Conscientiousness, variability in the effects of product body shapes by positioning potentially occurs via the trait perception triggered by the product shape.

Hypothesis 3:   *When a humanized product centers on warmth positioning, perceived agreeableness, rather than conscientiousness, is more likely to mediate the effect of product humanized body shape on consumer attitudes and PI; but the mediation of conscientiousness tends to occur when the product focuses on competence positioning.*

Pilot Studies

We conducted a series of pilot studies including individual interviews and survey studies to identify appropriate measurement items for five personality traits: Agreeableness (A-Trait), Conscientiousness (C-Trait), Neuroticism (N-Trait), Openness (O-Trait), and Extraversion (E-Trait). At last, the revised TIPI scale (TIPI; Gosling, Rentfrow, & Swann, 2003) comprising seven 10-point positively-framed items was finalized. The items are: two A-Trait items (sympathetic, warm; easygoing, friendly), two C-Trait items (dependable, self-disciplined; efficient, competent) and one item for each of the other three (N-Trait: calm, emotionally stable; O-Trait: open to new experiences, complex; E-Trait: extraverted, enthusiastic). This scale was used in the following studies.

Pretests with recruitment of different samples were conducted independently for trial-and-testing the chubby versus thin anthropomorphized product stimuli across the studies. Details will be available via contact with the authors.

Study 1: Personality Perceptions of Chubby versus Thin Anthropomorphic Products

Seventy-four participants (55.4% female; M_{age} = 20.66, SD = 1.85) were recruited and asked to view either a chubby- or thin-shaped water bottle, and then complete a questionnaire including the revised TIPI scale. Chubbiness was measured on a verbal item ("Viewing it as a human, what do you think of its body shape?"; 1 = very thin, 9 = very chubby), and a graphic one adopted from Contour Drawing Rating Scale (Thompson & Gray, 1995).

Note that all reliability scores for measures throughout this research were satisfactory (αs > .75) except these two acceptable reliability values (C-Trait perception and warmth perception in Study 2, α = .69 and .68 respectively).

Results

The chubby-shaped products were perceived as chubbier than the thin-shaped ones (ps < .001). A 2(product shape)×5(personality trait) mixed ANOVA, with ratings of the revised TIPI items as the dependent variable, revealed the main effect of personality trait ($F(4, 292)$ = 7.73, p < .001) was significant. Moreover, a significant product-shape-by-trait interaction ($F(4, 292)$ = 16.04, p < .001) was reported. Planned contrasts further showed higher A- and lower C-Trait ratings for chubby-shaped than thin-shaped products (A-Trait: $F(1, 73)$ = 16.02, p < .001; C-Trait: $F(1, 73)$ = 36.3, p < .001). This pattern is consistent with H1.

Discussion

Findings in this study present support for H1. In Studies 2a-b, we aimed to elaborate on the applications of the inferences of personality traits from humanized product shapes to marketing situations, one of which involves users with various personality trait (Study 2a) and the other concerns buyers'/users' occupations featuring warmth or competence (Study 2b).

Study 2a: Human-like Product Shapes and Agreeable versus Conscientious Buyers/Users

Sixty-four undergraduates (59.4% Female, M_{age} = 20.69, SD = 1.79) were included in this between-subjects (target user's personality: A-Trait/C-Trait) study. They first viewed a verbal description of an imagined user that highlighted either agreeableness or conscientiousness trait. Agreeable-user scenario contained A-Trait-related words (e.g., warm-hearted) while Conscientious-user condition stressed C-Trait-related descriptors (e.g., industrious) (the manipulations were pretested). Participants were then asked to make a choice between the chubby versus thin models of a toothbrush product to match the described user and, finally, to report the perceived A- and C-Trait of the chosen product.

Results

A Pearson's Chi-square test revealed that participants were more inclined to match an agreeable person with a chubby-shaped product model (87.9%) and a conscientious person with a thin-shaped one (71.0%; χ2(1) = 22.95, p < .001). Consistent with H1, the ones who selected the chubby-shaped model (N= 38) for the target user rated higher scores on A-Trait than C-Trait (p = .018), but the reversed was observed for those who chose the thin-shaped model (N = 26; p = .007).

Study 2b: Anthropomorphically-Shaped Products and Occupations

Participants from Study 2a were further included in a between-subjects choice task. They viewed a product (mini wireless stereo/ electric toothbrush, counterbalanced) of either a chubby (N = 31) or thin (N = 33) shape, and then chose one from a pair of occupations to which they thought the focal product fitted more. Finally, they answered the remaining questions as instructed.

Based on pretests, we selected two occupation pairs, bank manager–psychological consultant and accountant–teacher as a proxy for Competence-versus-Warmth contrast. No difference was found between stereotypical body shapes within each occupation pair (ps > .20).

Results

Participants' choices of occupations (1 = competence-related; 0 = warmth-related) were regressed on anthropomorphic body shape (1 = thin; 0 = chubby) in a logistic regression with mood and familiarity of product shape controlled. For the accountant-teacher contrast, results indicated a significant effect for the product type of toothbrush (Wald $\chi^2(1)$ = 5.23, p = .022) and a marginally significant effect for mini stereo (Wald $\chi^2(1)$ = 3.07, p = .080) with an expected direction. Consistent with H2, relatively more participants (toothbrush, 71.0%; mini stereo, 61.3%) in the thin-shape condition appointed the product to an accountant featuring competence, while the percentage was significantly lower (toothbrush: 36.4%; mini stereo: 39.4%) in the chubby-shape condition. As for the bank manager-psychological consultant contrast, the matching pattern was the same except that, for toothbrush, the coefficient failed to be significant although its direction was as expected. The participants matched bank manager with the thin-shaped product more than with the chubby-shaped product (toothbrush: 54.8% vs. 39.4%, Wald $\chi^2(1)$ = 2.62, p = .105; mini stereo: 58.1% vs. 30.3%, Wald $\chi^2(1)$ = 4.97, p = .026).

Study 3: Investigating the Roles of Product Shape and Positioning

A 2(product body shape) × 2(product positioning: warmth/competence) between-subjects design was adopted. Participants (N = 153; 64.7% female; M_{age} = 21.33, SD = 1.04) viewed an ad picture featuring a humanized product (shampoo/power bank, counterbalanced), either chubby or thin, with verbal headlines and description stressing warmth or competence. They then completed a questionnaire.

Measures

Control variables We adopted two items (1 = not at all happy/cheerful, 7 = very happy/cheerful) for the measurement of mood. Product height/length, width and roundness perception and product shape familiarity were measured on a single 7-point item respectively. Participants' own appearance self-esteem (ASE) was measured on six 5-point items (e.g., "I am dissatisfied with my weight"; Heatherton & Polivy, 1991).

Perceived chubbiness Chubbiness was measured with the same two items in Study 1.

Perceived positioning Warmth and competence positioning types were rated on two items (warmth: 1 = not warm/friendly at all, 9 = very warm/friendly; competence: capable/competent).

Product attitude Product attitude was measured on two 10-point items (1 = bad/not at all like it, 10 = good/like it very much).

Purchase intention (PI) We adopted two measurement items (1 = very unwilling to buy it now/very impossible to buy it in the coming 30 days, 10 = very willing to buy it now/very possible to buy it in the coming 30 days).

Results

Mood was positively correlated with product attitude ($ps <$ .005) and PI ($ps < .001$). The other control variables were not significantly related to product attitude or PI ($rs < .15$, $ps > .10$). Given collaborative roles of determining (body) shapes, these control variables were still included in subsequent analyses.

Verbal cues in the warmth-positioning condition produced higher warmth ratings than those in the competence-positioning condition ($ps < .026$), and the reverse held for perceived competence ($ps < .06$). The chubby-shaped products were perceived as chubbier than the thin-shaped ones ($ps < .001$).

Results of 2(product body shape)×2(positioning) ANCOVAs showed a significant shape-by-positioning interaction on product attitude with covariates controlled (shampoo: $F(1, 140) = 10.11$, $p =$ .002, $\eta_p^2 = .07$; power bank: $F(1, 140) = 33.60$, $p < .001$, $\eta_p^2 = .19$). Planned contrasts further showed that attitude was more positive in the chubby-shape-warmth-positioning condition than chubby-shape-competence-positioning condition (shampoo: $F(1, 140) = 6.01$, $p =$ .015; power bank: $F(1, 140) = 29.78$, $p < .001$), and more in the thin-shape-competence-positioning condition than thin-shape-warmth-positioning condition (shampoo: $F(1, 140) = 4.15$, $p = .040$; power bank: $F(1, 140) = 7.63$, $p = .006$).

A bootstrapped moderated mediation analysis (Model 7; Hayes, 2012) with covariates controlled, product shape (chubby = 0, thin = 1) as independent variable, product positioning (warmth = 0, competence = 1) as moderator, agreeableness/conscientiousness perception ratings for the product as mediators, and product attitude as dependent variable, revealed significant conditional indirect effects of agreeableness and conscientiousness perceptions (A-Trait: for shampoo, $b = .36$, SE = .21, 95% CI [.00, .83]; for power bank, $b = .34$, SE = .18, 95% CI [.01, .72]; C-Trait: for shampoo, $b = .37$, SE = .19, 95% CI [.05, .80]; for power bank, $b = .32$, SE = .17, 95% CI [.05, .71]).

More specifically, the indirect effect of A-Trait perception on product attitude was observed only in the warmth-positioning condition (shampoo: $b = -.39$, SE = .16, 95% CI [-.74, -.12]; power bank: $b = -.38$, SE = .14, 95% CI [-.68, -.12]) but not in the competence-positioning condition (shampoo: $b = .03$, SE = .14, 95% CI [-.30, .25]; power bank: $b = -.04$, SE = .14, 95% CI [-.30, .25]). By contrast, the indirect effect of C-Trait perception was found only in the competence-positioning condition (shampoo: $b = .50$, SE = .16, 95% CI [.22, .86]; power bank: $b = .32$, SE = .16, 95% CI [.07, .68]) but not in the warmth-positioning condition (shampoo: $b = .13$, SE = .13, 95% CI [-.13, .39]; power bank: $b = .00$, SE = .12, 95% CI [-.23, .20]). Note that N-, O- and E-Traits failed to be significant mediators in the models.

Regarding PI, results revealed a similar product-shape-by-positioning interaction pattern as that for product attitude. The moderated mediation for PI was replicated as well. We also analyzed ASE×product body shape interactions and found no significant effects on either PI or product attitude ($ps > .20$). Considering non-significant findings, we did not report results regarding ASE.

Discussion

Study 3 supported H2-H3 by illustrating that a product with a chubby human-like shape is preferred when it is positioned as warmth instead of competence. But the opposite holds when the product humanized shape is thin. The product-body-shape-by-positioning interaction is mediated by perceptions of A- and C-Trait, with the relative effects of the mediator contingent upon the given positioning.

General Discussion

The studies demonstrate people making A- and C-Trait inferences from anthropomorphic product shapes: associating higher A-Trait with chubbiness and higher C-Trait with thinness. A shape-positioning congruity effect exists in product evaluation contexts as well as in a buyer-/user- or occupation-product matching scenario. The effect is generalizable across various product categories.

To our knowledge, this research is important in introducing body-shape-and-trait associations into the anthropomorphism marketing literature. The findings should help promote anthropomorphic product design with consideration of product/brand positioning. Also, it provides insights on how to segment and target consumers based on positioning and product design, which may be valuable in real-life contexts such as gift choosing/giving.

Some questions remain for future research. First, a more stringent operational definition of "body shape" needs to be made. Future research may need to employ a more objective classification method or standard to define products' "body shapes". Next, what roles the other personality traits play in product shape anthropomorphism remain less clear. Future work is necessary to explore the boundary conditions, if any, of the other three personality traits to come into play. Finally, it is worthwhile to examine the observed congruity effects further by experimenting with more product categories and manipulating levels of consumers' familiarity with the product and its shape.

REFERENCES

Aggarwal, P., & McGill, A. L. (2007). Is that car smiling at me? Schema congruity as a basis for evaluating anthropomorphized products. *Journal of Consumer Research, 34,* 468-479.

Barrick, M. R., Mount, M. K., & Judge, T. A. (2001). Personality and performance at the beginning of the new millennium: what do we know and where do we go next? *International Journal of Selection and Assessment, 9*(1-2), 9-30.

Brodsky, C. M. (1954). A study of norms for body form-behavior relationship. *Anthropological Quarterly, 27*(4), 91-101.

Chae, B., & Hoegg, J. (2013). The future looks "right": Effects of the horizontal location of advertising images on product attitude. *Journal of Consumer Research, 40*(2), 223-238.

Epley, N., Waytz, A., & Cacioppo, J. T. (2007). On seeing human: a three-factor theory of anthropomorphism. *Psychological Review, 114*(4), 864-886.

Fiske, S. T., Cuddy, A. J. C., & Glick, P. (2007). Universal dimensions of social cognition: warmth, then competence. *Trends in Cognitive Sciences*, *11*(2), 77-83.

Gosling, S. D., Rentfrow, P. J., & Swann Jr, W. B. (2003). A very brief measure of the Big-Five personality domains. *Journal of Research in Personality, 37*(6), 504-528.

Hayes, A. F. (2012). PROCESS: A versatile computational tool for observed variable mediation, moderation, and conditional process modeling.

Heatherton, T. F., & Polivy, J. (1991). Development and validation of a scale for measuring state self-esteem. *Journal of Personality and Social Psychology, 60*(6), 895-910.

Hu, Y., Parde, C. J., Hill, M. Q., Mahmood, N., & O' Toole, A. J. (2018). First Impressions of Personality Traits from Body Shapes. *Psychological Science, 29*(12), 1969-1983.

Jiang, Y., Gorn, G. J., Galli, M., & Chattopadhyay, A. (2016). Does your company have the right logo? how and why circular- and angular-logo shapes influence brand attribute judgments. *Journal of Consumer Research, 42*(5), ucv049.

Kervyn, N., Fiske, S. T., & Malone, C. (2012). Brands as intentional agents framework: how perceived intentions and ability can map brand perception. *Journal of Consumer Psychology*, *22*(2), 0-176.

Muñoz-Cachón, M. J., Salces, I., Arroyo, M., Ansotegui, L., Rocandio, A. M., & Rebato, E. (2007). Body shape in relation to socio-economic status in young adults from the basque Country. *Collegium Antropologicum, 31*(4), 963-968.

Robertson, N., & Vohora, R. (2008). Fitness vs. fatness: Implicit bias towards obesity among fitness professionals and regular exercisers. *Psychology of Sport and Exercise, 9*(4), 547-557.

Schiffman, L. G., & Wisenblit, J. (2015). Consumer Behavior, Eleventh. *England: Pearson*.

Thompson, M. A., & Gray, J. J. (1995). Development and validation of a new body-image   assessment scale. *Journal of Personality Assessment*, *64*(2), 258-269.

Tiggemann, M., & Rothblum, E. D. (1988). Gender difference in social consequences of perceived overweight in the United States and Australia. *Sex Roles*, *18*(1), 75-86.

Touré-Tillery, M., & McGill, A. L. (2015). Who or what to believe: Trust and the differential persuasiveness of human and anthropomorphized messengers. *Journal of Marketing*, *79*(4), 94-110.

Vallen, B., Sridhar, K., Rubin, D., Ilyuk, V., Block, L. G., & Argo, J. J. (2019). Shape- and Trait-Congruency: Using Appearance-based Cues as a Basis for Product Recommendations. *Journal of Consumer Psychology*, *29*(2), 271-284.

The Impact of Comparative Product Quality Information in a Multi-Product Context

Christoph Mai, University of Erlangen-Nuremberg, Germany
Nicole Koschate-Fischer, University of Erlangen-Nuremberg, Germany
Andreas Fürst, University of Erlangen-Nuremberg, Germany

EXTENDED ABSTRACT

Firms must develop strategies to influence consumers to their advantage at the point of sale (Bettman, Luce, and Payne 1998; Nies and Natter 2010). Therefore, they often use TPPRs (third-party product reviews) on the product package (Chen, Liu, and Zhang 2012) because consumers "increasingly rely on product quality information provided by third-party product ratings organizations" (De Maeyer and Estelami 2011, p. 1067).

However, research on this topic is rather scarce. Prior studies focus on how a TPPR positively affects the *rated product* (e.g., Aiken and Boush 2006). Nevertheless, given theoretical support that TPPRs can reduce competitors' profits (Shaffer and Zettelmeyer 2002) and that TPPRs include a comparative component (e.g., Dean and Biswas 2001), TPPRs may negatively affect *competitive products* (products of a firm's competitors).

TPPRs test products against one another (e.g., Chen, Liu, and Zhang 2012; Dean and Biswas 2001). Hence, they lead consumers to engage in comparative judgments between the products in a purchase situation (e.g., Dean and Biswas 2001). Following the selective accessibility model (Mussweiler 2003), these comparative judgments trigger anchoring effects between the products, while the model explains whether contrast or assimilation emerges. Individuals form a surface-level judgment of the perceived (dis)similarity between the products. When individuals perceive the products as (dis)similar, they search for information supporting the impression of (dis)similarity (i.e., contrast vs. assimilation). When evaluating a competitive product (which does not have a TPPR), the *apparent difference* concerning a TPPR between the products should result in a high perceived product dissimilarity, leading to contrast (i.e., a negative effect of a favorable TPPR). Further, we focus on three potential boundary conditions: A TPPR of the competitive product, the brand equity of the rated product, and the consumer comparison mindset. These influences are related to TPPRs or have shown to determine the effectiveness of such product quality information and will therefore add to a more comprehensive understanding (e.g., Brady, Cronin, Fox, and Roehm 2008; Dean and Biswas 2001; Kwong and Wong 2014).

In Study 1, participants saw six sunscreens. One sunscreen showed the favorable TPPR ("very good"). As baseline condition, we used a dummy label ("new") to ensure information parity. Further, we included three control groups with no label, a favorable front-of-package-claim, or a positive online consumer review. Participants evaluated the perceived quality of the competitive sunscreen. Results showed only a negative effect of a TPPR.

In Study 2, we showed six sunscreens including the TPPR (vs. dummy label). Participants also evaluated the perceived product dissimilarity, which was higher for a TPPR. Mediation analysis revealed that perceived product dissimilarity mediated the negative effect on perceived quality (Hayes 2017).

In Study 3, participants saw TPPRs (vs. dummy label) for two sunscreens and evaluated the perceived quality of the competitive product. The negative effect varied depending on a TPPR of the competitive product, appearing only when the competitive product had no TPPR.

In Study 4, a sunscreen with high or low brand equity showed the TPPR (vs. dummy label). We also measured purchase intention of the competitive product. Results revealed a weaker negative effect in the low versus high brand equity condition, while perceived quality mediated the negative effect on purchase intention.

In Study 5, we manipulated participants' consumer comparison mindset with a procedural priming task (dissimilarity vs. similarity mindset) (Häfner 2004). Participants then saw six sunscreens including the TPPR (vs. dummy label). Results showed a stronger negative effect, when consumers were in a dissimilarity versus similarity mindset; perceived quality mediated the negative effect on purchase intention.

In Study 6, participants saw products from three different product categories for two competing brands including the TPPR (vs. dummy label) on a sunscreen. Participants evaluated the competitive products in the different product categories (sunspray and shampoo). Results revealed negative effects on both, while mediation analyses indicated that perceived qualities mediated the negative effects on purchase intentions.

In Study 7, we showed six soft drinks including the TPPR (vs. dummy label). As additional compensation, participants could choose €1 (prices of all soft drinks) or a soft drink (i.e., the competitive product). We assessed participants' product choice of the competitive product. Mediation analysis indicated that perceived quality mediated the negative effect on product choice.

Our findings underline that only investigating direct effects is insufficient to explain TPPRs' overall effectiveness. By illustrating that spillover effects across product categories appear between competitive products, our results also add to research on spillover effects. For firms, TPPRs may serve as an effective instrument for damaging competitive products. By examining boundary conditions, managers receive guidance on how they can control negative effects and on when they should especially assign high importance to TPPRs.

REFERENCES

Aiken, K. Damon and David M. Boush (2006), "Trustmarks, Objective-Source Ratings, and Implied Investments in Advertising: Investigating Online Trust and the Context-Specific Nature of Internet Signals," *Journal of the Academy of Marketing Science*, 34 (3), 308-323.

Bettman, James R., Mary F. Luce, and John W. Payne (1998), "Constructive Consumer Choice Processes," *Journal of Consumer Research*, 25 (3), 187-217.

Brady, Michael K., J. Joseph Cronin Jr, Gavin L. Fox, and Michelle L. Roehm (2008), "Strategies to Offset Performance Failures: The Role of Brand Equity," Journal of Retailing, 84 (2), 151–64.

Chen, Yubo, Yong Liu, and Jurui Zhang (2012), "When do Third-Party Product Reviews Affect Firm Value and What can Firms do? The Case of Media Critics and Professional Movie Reviews," *Journal of Marketing*, 76 (2), 116-134.

De Maeyer, Peter and Hooman Estelami (2011), "Consumer Perceptions of Third Party Product Quality Ratings," *Journal of Business Research*, 64 (10), 1067-1073.

Dean, Dwane H. and Abhijit Biswas (2001), "Third-Party Organization Endorsement of Products: An Advertising Cue Affecting Consumer Prepurchase Evaluation of Goods and Services," *Journal of Advertising*, 30 (4), 41-57.

Häfner, Michael (2004), "How Dissimilar Others may still Resemble the Self: Assimilation and Contrast after Social Comparison," *Journal of Consumer Psychology*, 14 (1), 187-196.

Hayes, Andrew F. (2017), *Introduction to Mediation, Moderation, and Conditional Process Analysis: A Regression-Based Approach*, New York: Guilford Publications.

Kwong, Jessica Y. and Kin F. E. Wong (2014), "Fair or not Fair? The Effects of Numerical Framing on the Perceived Justice of Outcomes," *Journal of Management*, 40 (6), 1558–1582.

Mussweiler, Thomas (2003), "Comparison Processes in Social Judgment: Mechanisms and Consequences," *Psychological Review*, 110 (3), 472-489.

Nies, Salome and Martin Natter (2010), "Are Private Label Users Attractive Targets for Retailer Coupons?," *International Journal of Research in Marketing*, 27 (3), 281-291.

Shaffer, Greg and Florian Zettelmeyer (2002), "When Good News about your Rival is good for you: The Effect of Third-Party Information on the Division of Channel Profits," *Marketing Science*, 21 (3), 273-293.

"Do You Speak Emoji?" – How Visual Cues Shape Computer-Mediated Communication

Tobias Maiberger, University of Erlangen-Nuremberg, Germany
David Schindler, University of Erlangen-Nuremberg, Germany
Elisabeth Sanders, University of Erlangen-Nuremberg, Germany
Nicole Koschate-Fischer, University of Erlangen-Nuremberg, Germany

EXTENDED ABSTRACT

The sheer amount of electronic word-of-mouth (eWOM) containing an emoji has raised academic and managerial interest. Facial emojis as most common type and the focus of this research transmit their meaning through their graphic resemblance to facial expressions. Facial emojis typically serve to reiterate or replace written language. This research focusses on whether these two communicative functions have different consequences on eWOM persuasiveness.

In EASI theory, van Kleef (2009) argues that facial expressions affect observers through eliciting affective (e.g., liking of a smiling person) and inferential responses (e.g., smiling person is doing fine). Conceptualizing facial emojis as electronically mediated facial expressions, we argue that facial emojis should affect eWOM receivers via an emotional and an informational route – both are important for persuasion (Petty and Cacioppo 1986). In terms of derived emotion, research has shown that facial emojis increase the emotionality of an expression (Smith und Rose 2020). This increase in nonverbally transmitted emotionality should positively affect a message's persuasiveness, irrespective of whether the emoji reiterates or replaces verbal expressions. In terms of derived information, for an emoji reiterating, the preceding verbal expression leads to a relatively precise understanding of the emoji. Thus, it disambiguates a message, as facial expressions are better suited than words to communicate information about the sender's intention. However, when the facial emoji replaces a verbal expression, there is no accompanying verbal statement clarifying the emoji. Thus, it transmits information that is less accurate. This increases the message's perceived ambiguity and negatively affects its persuasiveness. In sum, a facial emoji that reiterates a verbal expression should positively affect persuasiveness through increasing message emotionality and decreasing message ambiguity. A facial emoji that replaces a verbal expression, however, should affect persuasiveness positively through increasing message emotionality and negatively through increasing message ambiguity.

Moreover, when a facial emoji is highly ambiguous, the information a facial emoji replacing a verbal expression conveys is more challenging to capture as there is no accompanying verbal statement to rely on. This should strengthen the negative indirect effect of a facial emoji replacing a verbal expression on persuasiveness through message ambiguity.

Furthermore, in case of high verbal context richness, we assume that individuals can better interpret the emoji's meaning from the specified verbal context surrounding the emoji, particularly when it replaces a verbal expression. Thus, a facial emoji replacing a verbal expression should no longer increase but instead decrease message ambiguity that should positively affect persuasiveness.

We tested the impact of facial emojis on persuasiveness in six studies. Study 1 examined the impact of the communicative function of a facial emoji on persuasiveness through an online field study on Facebook. The experiment had three between-subjects manipulated conditions (text-only vs. emoji reiterating vs. emoji replacing). We found that, compared to text-only, facial emojis reiterating a verbal expression increased persuasiveness, while facial emojis replacing a verbal expression did not exert a persuasive impact. Study 2 provided evidence for the proposed underlying mechanisms. A mediation analysis (custom PROCESS models in all studies; Hayes 2018) demonstrated that facial emojis reiterating a verbal expression yielded positive effects on persuasiveness via message emotionality and message ambiguity. Facial emojis replacing a verbal expression, however, affected persuasiveness positively via message emotionality but negatively via message ambiguity resulting in similar persuasive consequences compared to text-only. A validation study using an online post from a fictitious brand extended the impact on persuasiveness and the underlying mechanisms to brands engaging in eWOM. Study 4 investigated the moderating influence of emoji ambiguity (low vs. high). The findings showed that emoji ambiguity did not influence the effects of facial emojis reiterating a verbal expression on persuasiveness. However, it strengthened the negative indirect effect of facial emojis replacing a verbal expression on persuasiveness via message ambiguity. Study 5 examined the moderating effect of context information richness (low vs. high) and found that context richness did not influence the effect of facial emojis reiterating a verbal expression on persuasiveness. However, facial emojis replacing a verbal expression exerted an impact on persuasiveness via message ambiguity that was negative for low and positive for high context richness. Finally, a validation study demonstrated that positive and negative facial emojis reiterating a verbal expression increased persuasiveness, while positive and negative facial emojis replacing a verbal expression did not yield persuasive consequences.

Overall, this research provides a deeper understanding of language use in digitized contexts by demonstrating that whether a facial emoji reiterates or replaces a verbal expression has important persuasive consequences. From a practical perspective, our findings provide new strategies for marketers and consumers to communicate online more efficiently.

REFERENCES

Hayes, Andrew F. (2018), *Introduction to Mediation, Moderation, and Conditional Process Analysis: A Regression-Based Approach,* New York: Guilford Press.

Petty, Richard E. and John T. Cacioppo (1986), "The Elaboration Likelihood Model of Persuasion," *Advances in Experimental Social Psychology*, 19(12), 123-205.

Smith, Leah W. and Randall L. Rose (2020), "Service with a Smiley Face: Emojional Contagion in Digitally Mediated Relationships," *International Journal of Research in Marketing*, 37(2), 301-319.

van Kleef, Gerben A. (2009), "How Emotions Regulate Social Life: The Emotions as Social Information (EASI) Model," *Current Directions in Psychological Science*, 18(3), 184-188.

Look Good and Work Hard? Only if You are a Man or in Preschool

Michal Maimaran, Northwestern University, USA
Aparna A. Labroo, Northwestern University, USA
Anastasiya Pocheptsova Ghosh, University of Arizona, USA

EXTENDED ABSTRACT

In an image-obsessed society, consumers can find it easier than ever to have their self-esteem destroyed. From body-shaming advertisements, to social media feedback, to preening in form-fitting clothing, consumers can instantly feel attractive or unattractive. We examine whether feeling attractive or unattractive due to such marketplace actions can affect motivation to pursue cognitive tasks. Feeling attractive can lead to general good feeling about oneself, whereas feeling unattractive can decrease self-esteem. When feeling good about themselves, consumers are more confident and optimistic about their abilities and take on more challenging cognitive tasks (Fishbach and Labroo, 2007). Yet, a common stereotype is attractiveness and intelligence are negatively correlated, particularly for women (Heilman et al. 2004; Lewis et al. 2012). Attractive women are frequently portrayed as unintelligent "objects of desire" in pop-culture, media, and TV shows. These marketer portrayals further strengthen societal beliefs that attractive women are unintelligent. Moreover, the salience of the attractive-is-unintelligent belief could decrease motivation to pursue cognitive tasks among women, but not men, if women consider these beliefs as self-diagnostic. Furthermore, merely feeling attractive or unattractive could make such beliefs salient and result in these downstream consequences.

How attractive (or unattractive) a person feels could thus be an important, highly pervasive but not yet investigated factor to raise this belief's accessibility. When feeling attractive, women may place a greater weight on being attractive and reduce cognitive pursuits. By contrast, feeling unattractive, women may place a lower weight on being attractive, and boost cognitive pursuits. Since men are generally not subject to this belief, it should not be perceived as self-diagnostic to the same extent by them, and while feeling attractive could cue this belief it should not adversely affect their cognitive pursuits.

An important precursor to beliefs impacting cognitive pursuits is their existence or availability to begin with (Devine, 1989; Higgins, 1989; Menon, Raghubir, and Schwarz, 1995). Young children, who may stereotype based on gender and race (Bigler and Liben, 2006), and may behave according to these stereotypes when choosing toys or activities (Coyne et al., 2016; Serbin et al., 2001), are unlikely to hold the attractive-is-unintelligent belief about women. Such more complex beliefs are likely to develop only later (McKenney and Bigler, 2014; Stone et al. 2015), as they require compensatory thinking—the ability to make trade-offs and infer more of one attribute implies less of another—a skill that develops around age 7 (Inhelder and Piaget, 1969; Stone et al. 2015). Four-and five-year olds instead tend to classify objects as good or bad and show little compensatory thinking (Flavell, 1963; Ginsburg and Opper, 1988). Furthermore, if the attractive-is-unintelligent belief about women develops over time from media portrayals, as we postulate, then children this age are less likely to consume and understand such media. Feeling attractive should reduce cognitive pursuit only when these beliefs are available, and therefore can become accessible by merely feeling attractive; i.e., among adult women but not young girls.

The first pretest (N=274) establishes that adults hold the belief that attractive women (but not men) are less intelligent and that such beliefs are perceived as more self-diagnostic for women than for men. A second pretest, (N=41), establishes that children 4-5 years old instead associate more attractive people, men and women, with being more intelligent. Next, four studies show that when feeling attractive (unattractive), women, but not men, are less (more) motivated to pursue cognitive tasks, but children are more motivated when feeling attractive.

Study 1 (N=50, all female) included only women and manipulated feeling attractive versus not by wearing a well-fitting versus non-fitting sweatshirt. Women who wore a well-fitting sweatshirt chose to complete more anagrams compared to those wearing a non-fitting sweatshirt ($M_{more-attractive}$ = 5.23, SD = 2.77; $M_{less-attractive}$ = 6.74, SD = 1.89; $t(46)$ = 2.153, p = .037). There was no difference in the percentage of correctly-completed anagrams, suggesting the effect is motivation and no ability based. We replicate this result in studies 2 and 3.

Study 2 (N=612, 53% female) included both men and women, and manipulated feeling attractive versus not by having participants describe an attractive selfie (attractive condition) versus describe making a cup of tea (control condition). All participants were then invited to find as many of the 14 words hidden in a word-search matrix, or to bypass the task. Decomposing the interaction between gender and condition ($F(1, 594)$ = 3.085, p = .080), women feeling attractive attempted fewer words than women in the control condition (M_{selfie} = 1.76, SD = 1.39 vs. $M_{control}$ = 2.09, SD = 1.48, $t(594)$ = 3.411, p =.001), while men showed no difference (M_{selfie} = 1.61, SD = 1.97 vs. $M_{control}$ = 1.49, SD = 1.41, p > .418), suggesting the belief attractive-is-unintelligent affects cognitive pursuits only when it is self-diagnostic (i.e., among women).

Study 3 (N=298, 43% female) manipulated feeling *unattractive* versus not by having participants view an ad featuring an attractive female or male (man-ad and woman-ad conditions) or describe making a cup of tea (control condition), and measured cognitive pursuits as in study 2. Decomposing the interaction between gender and condition ($F(1, 275)$ = 3.983, p = .020), women feeling unattractive after viewing the woman-ad attempted to find more words compared to control women ($M_{woman-ad}$ = 2.15, SD = 1.48 vs. $M_{control}$ = 1.63, SD = 1.27, $t(275)$ = 1.861, p = .064). Surprisingly, men who viewed the woman-ad attempted to find fewer words than control men , possibly because they were distracted ($M_{woman-ad}$ = 1.22, SD = 1.08 vs. $M_{control}$ = 1.78, SD = 1.42, $t(275)$ = 2.144, p = .033). Men's and women's cognitive pursuits did not differ between control and man-ad conditions.

Study 4 (N=61, 55% girls mean age = 61 months) included a sample of preschoolers and manipulated feeling attractive versus not by receiving a compliment on their looks before choosing the task (attractive condition) or after (control condition). Children feeling attractive were more likely choose a challenging task (count a large versus small pile of blocks) compared to those in the control condition (53.6% vs. 27.3%, $X^2(1, N = 61)$ = 4.390, p = .036). This suggest that when the attractive-is-unintelligent belief is not accessible, as it is with preschoolers, children do not behave consistent with the belief.

REFERENCES

Bigler, Rebecca S., and Lynn S. Liben (2006), "A Developmental Intergroup Theory of Social Stereotypes and Prejudice," *Advances in Child Development and Behavior*, Vol. 34, ed. Robert V. Kail, JAI, 39-89.

Devine, Patricia G. (1989), "Stereotypes and Prejudice: Their Automatic and Controlled Components," *Journal of Personality and Social Psychology*, 56 (1), 5-18.

Coyne, Sarah M., Jennifer R. Linder, Eric E. Rasmussen, David A. Nelson, and Victoria Birkbeck (2016), "Pretty as a Princess: Longitudinal Effects of Engagement With Disney Princesses on Gender Stereotypes, Body Esteem, and Prosocial Behavior in Children," *Child Development*, 87 (6), 1909-1925.

Fishbach, Ayelet and Aparna A. Labroo (2007), "Be Better or Be Merry: How Mood Affects Self-Control," *Journal of Personality and Social Psychology*, 93 (2), 158.

Flavell, John H. (1963), "The Developmental Psychology of Jean Piaget," *The University Series in Psychology*.

Ginsburg, Herbert P. and Sylvia Opper (1988), *Piaget's Theory of Intellectual Development*, Englewood Cliffs, NJ: Prentice-Hall.

Heilman, Madeline E., Aaron S. Wallen, Daniella Fuchs, and Melinda M. Tamkins (2004), "Penalties for Success: Reactions to Women Who Succeed at Male Gender-Typed Tasks," *Journal of Applied Psychology*, 89 (3), 416-427.

Higgins, E. Tory (1989), "Self-Discrepancy Theory: What Patterns of Self-Beliefs Cause People to Suffer?," in *Advances in Experimental and Social Psychology*, Vol. 22, Leonard Berkowitz, New York City, NY: Academic Press, 93-136.

Inhelder, Bärbel, and Jean Piaget. *The psychology of the child*. New York: Basic Books, 1969.

Lewis, Easton, Goetz, and Buss, 2012; Schneider, Tinsley, Cheldelin, and Amanatullah, 2010Lord, Charles G., Lee Ross, and Mark R. Lepper (1979), "Biased Assimilation and Attitude Polarization: The Effects of Prior Theories on Subsequently Considered Evidence," *Journal of Personality and Social Psychology*, 37 (11), 2098-2109.

McKenney, Sarah J. and Rebecca S. Bigler (2014), "High Heels, Low Grades: Internalized Sexualization and Academic Orientation among Adolescent Girls," *Journal of Research on Adolescence*, 26 (1), 30-36.

Menon, Geeta, Priya and Raghubir, and Norbert Schwarz (1995), "Behavioral Frequency Judgments: An Accessibility-Diagnosticity Framework," *Journal of Consumer Research*, 22 (2), 212-228.

Serbin, Lisa A., Diane Poulin-Dubois, Karen A. Colburne, Maya G. Sen, and Julie A. Eichstedt (2001), "Gender Stereotyping in Infancy: Visual Preferences for and Knowledge of Gender-Stereotyped Toys in the Second Year," *International Journal of Behavioral Development*, 25 (1), 7-15.

Stone, Ellen A., Christina S. Brown, and Jennifer A. Jewell (2015), "The Sexualized Girl: A Within-Gender Stereotype among Elementary School Children," *Child Development*, 86 (5), 1604-1622.

How Autobiographical Memory Perspective Influences Self-congruence and Brand Preference

Sudipta Mandal, Indian Institute of Management, Indore, India

EXTENDED ABSTRACT

Brands provide self-definitional benefits to consumers by helping them achieve their identity goals (Aaker, 2012; Keller & Lehmann, 2006). Consequently, consumers prefer brands associated with a set of personality traits that are congruent with their own (Aaker, 1999). This psychological congruence between the brand and the self is known as self-congruence or self-brand congruence (Sirgy, 1982). Extant research has primarily restricted itself to consequences of self-congruence (Jamal & Al-Marri, 2007; Mazodier & Merunka, 2012). Focus on antecedents of self-congruence is conspicuously absent in extant research. In this research, we address this gap and extend prior work on self-congruence by examining how one specific factor, namely, autobiographical memory perspective, influences consumer's perceptions of self-change, and in turn their brand preferences.

Autobiographical memories are reminiscences of past episodes from one's own life experiences (Brewer, 1986). Such memories involve recollections of an individual's personal experiences and are an important constituent of self-image (Brewer, 1986). Additionally, imagery constitutes a significant element of autobiographical memory (Pillemer, 2009). Thus, autobiographical memories may be visualized either from a *first-person perspective*, i.e., through one's own eyes, or from a *third-person perspective*, i.e., "looking" at the self from an outside observer's perspective. Each perspective influences one's construction of self-image (Libby, Eibach, & Gilovich, 2005).

Scholars have used the term 'self-concept' or 'self-image' to conceptualize the consumer's sense of self (Rosenberg, 1986). Consumer researchers typically use four dimensions of self-image, namely, actual self-image, ideal self-image, social self-image, and ideal social self-image (Sirgy et al., 2000). Theory of the self posits that individuals inherently try to minimize discrepancies between their actual and ideal self-images. A key motive for the construction and expression of self-image is self-consistency, i.e., the disposition to behave consistently with one's view of oneself (Epstein, 1980; Sirgy, 1982). Consonant with Sirgy's (1986) self-congruence theory, any inconsistency between a brand-user image and the consumer's self-image potentially results in self-brand incongruence. As we explain next, autobiographical memory perspectives influence consumer's perceptions of self-change, i.e., change in self-image. This in turn impacts self-brand congruence.

Individuals can visualize autobiographical memories from a *first-person perspective* or a *third-person perspective* (Frank & Gilovich, 1989). Each perspective causes people to construe their own actions at a low/concrete-level or high/abstract-level (Libby et al., 2005). Concrete construal emphasizes the details of an action in isolation. Abstract construal focuses on the broader meaning and implications of the same action (Trope & Liberman, 2003). Visualizing autobiographical memories from a third-person perspective, functions like other forms of psychological distancing, causing individuals to engage in abstract construal thereby accentuating and decontextualizing the broader meaning of the recalled events (Libby & Eibach, 2004; Libby et al., 2005). Autobiographical memories from a first-person perspective engender concrete construal causing individuals to emphasize the finer details of the recalled event in isolation only.

Further, individuals may also retrospect about differences or similarities between one's past and present selves. When the focus is on *differences* (*similarities*) between one's past and present selves, a third-person perspective causes the differences (similarities) to be construed at an abstract level, thereby accentuating changes (similarities) in the very nature of the self. A first-person perspective causes the differences (similarities) to be construed at a concrete level, only identifying changes (similarities) in isolated events or actions (Libby et al., 2005). Accordingly, individuals' appraisals of perceived self-change are greater when their autobiographical memories focus on *differences* between their past and present selves, from a third-person (vs. first-person) perspective. And, perceptions of self-change are lesser when individuals' autobiographical memories focus on *similarities* between their past and present selves, from a third-person (vs. first-person) perspective. When perceived self-change is significant, the need for self-consistency engenders psychological incongruence between the self and a previously preferred brand, triggering preference for an alternative brand that can resolve this incongruence. Thus,

Hypothesis 1: Consumer's focus on differences between present and recalled self from a third-person memory perspective adversely impacts their self-congruence with a current brand, and triggers preference for an alternative brand.

Hypothesis 2: Consumer's focus on similarities between present and recalled self from a first-person memory perspective adversely impacts their self-congruence with a current brand, and triggers preference for an alternative brand.

Research shows that when individuals focus on similarities between their past and present selves, they usually tend to focus on how they are similar to their *positive* past selves. Further, this tendency is more predominant among individuals with high as opposed to low self-esteem (Ross & Wilson, 2002). Consequently, high (vs. low) self-esteem individuals are more predisposed toward focusing on similarities to their positive past selves. Thus,

Hypothesis 3: Consumer's focus on similarities between their present and recalled self from a first-person memory perspective adversely impacts their self-congruence with a current brand, and triggers preference for an alternative brand in high self-esteem individuals.

Fundamental to the idea of self-brand congruence is the significance of self-image to consumer's brand preferences (Birdwell, 1968). We identify autobiographical memory perspective as a key determinant of consumer's perceived change in self-image. Thus,

Hypothesis 4: Consumer's self-brand congruence is impacted by autobiographical memory perspective, mediated by their assessment of perceived self-change.

Three laboratory experiments validated our hypotheses, all of which were supported. Experiment 1 tests H1 and H4 using a single-factor (memory-perspective: first-person vs. third-person) between-

subjects design. Experiment 2 tests H1, H2, and H4 using a 2 (memory-perspective: first-person vs. third-person) x 2 (memory-focus: similarities vs. differences) between-subjects study. Experiment 3 tests H3 and H4 using a 2 (memory-perspective: first-person vs. third-person) x 2 (self-esteem: high vs. low) between-subjects study. Participants' assessments of perceived self-change was the mediating variable and self-congruence was the dependent variable in all three experiments.

Extant research has focused primarily on consequences of self-congruence. Our work focuses on an antecedent – autobiographical memory perspective. We identify consumer's perceived self-change as the principal mechanism underlying the effect. Our experiments additionally demonstrate that, autobiographical memories need not involve brand-related experiences to trigger judgments in a brand-related domain – indicating cross-domain spill-over effects. Collectively, these results facilitate our understanding of autobiographical memory perspective as an antecedent of consumer's self-congruence and have implications for nostalgia advertising and retro-branding.

REFERENCES

Aaker, D. A. (2012). *Building strong brands*. Simon and Schuster.

Aaker, J. L. (1999). The malleable self: The role of self-expression in persuasion. *Journal of Marketing Research*, *36*(1), 45–57.

Aron, A., Aron, E. N., & Smollan, D. (1992). Inclusion of other in the self scale and the structure of interpersonal closeness. *Journal of Personality and Social Psychology*, *63*(4), 596.

Belk, R. W. (1988). Possessions and the extended self. *Journal of Consumer Research*, *15*(2), 139–168.

Birdwell, A. E. (1968). A study of the influence of image congruence on consumer choice. *The Journal of Business*, *41*(1), 76–88.

Brewer, W. F. (1986). *What is autobiographical memory?*

Epstein, S. (1980). The self-concept: A review and the proposal of an integrated theory of personality. *Personality: Basic Aspects and Current Research*, *81132*.

Frank, M. G., & Gilovich, T. (1989). Effect of memory perspective on retrospective causal attributions. *Journal of Personality and Social Psychology*, *57*(3), 399.

Hayes, A. F. (2017). *Introduction to mediation, moderation, and conditional process analysis: A regression-based approach*. Guilford Publications.

Jamal, A., & Al-Marri, M. (2007). Exploring the effect of self-image congruence and brand preference on satisfaction: The role of expertise. *Journal of Marketing Management*, *23*(7–8), 613–629.

Keller, K. L., & Lehmann, D. R. (2006). Brands and branding: Research findings and future priorities. *Marketing Science*, *25*(6), 740–759.

Libby, L. K., & Eibach, R. P. (2004). Seeing meaning in action: Imagery perspective and action identification. *Manuscript in Preparation*.

Libby, Lisa K., Eibach, R. P., & Gilovich, T. (2005). Here's looking at me: The effect of memory perspective on assessments of personal change. *Journal of Personality and Social Psychology*, *88*(1), 50.

Mazodier, M., & Merunka, D. (2012). Achieving brand loyalty through sponsorship: The role of fit and self-congruity. *Journal of the Academy of Marketing Science*, *40*(6), 807–820.

Pillemer, D. B. (2009). *Momentous events, vivid memories*. Harvard University Press.

Rosenberg, M. (1986). *Conceiving the self*. RE Krieger.

Rosenberg, M. (2015). *Society and the adolescent self-image*. Princeton university press.

Ross, M., & Wilson, A. E. (2002). It feels like yesterday: Self-esteem, valence of personal past experiences, and judgments of subjective distance. *Journal of Personality and Social Psychology*, *82*(5), 792.

Sirgy, M. J. (1982). Self-concept in consumer behavior: A critical review. *Journal of Consumer Research*, *9*(3), 287–300.

Sirgy, M. J. (1986). *Self-congruity: Toward a theory of personality and cybernetics*. Praeger Publishers/Greenwood Publishing Group.

Sirgy, M. J., Grewal, D., & Mangleburg, T. (2000). Retail environment, self-congruity, and retail patronage: An integrative model and a research agenda. *Journal of Business Research*, *49*(2), 127–138.

Sirgy, M. J., Grewal, D., Mangleburg, T. F., Park, J., Chon, K.-S., Claiborne, C. B., Johar, J. S., & Berkman, H. (1997). Assessing the predictive validity of two methods of measuring self-image congruence. *Journal of the Academy of Marketing Science*, *25*(3), 229.

Trope, Y., & Liberman, N. (2003). Temporal construal. *Psychological Review*, *110*(3), 403.

Materialists and the Desire for New Products:
How Materialism Enhances Newness Perceptions for Innovations

KT Manis, Texas Tech University, USA
Rebecca Rabino, Texas Tech University, USA

EXTENDED ABSTRACT

The new product development literature distinguishes the newness of products on a continuum ranging from incremental to radical innovations (Chandy and Tellis 1998). Formally, incremental (radical) innovations are innovations that involve minor (major) changes in technology and provide smaller (greater) customer benefits per dollar, relative to existing products (Chandy and Tellis 1998). These distinctions are extremely valuable for researchers and practitioners, but may be less readily obvious to consumers. Indeed, consumers often struggle to understand a new product's value (Gourville 2006). We seek to contribute to a growing body of literature addressing a consumer-based view of innovations. In fact, we suggest that consumer perceptions of innovations may be shaped by relevant individual differences. Specifically, we investigate how consumer materialism affects perceptions and purchase likelihood of innovative products.

Materialism is defined as "the importance a person places on possessions and their acquisition as a necessary or desirable form of conduct to reach desired end states" (Richins and Dawson 1992, 307). Acquisition of products is a central component of materialistic consumers' lives. Materialistic consumers view the purchase of a product as a source of happiness and a source of status (Richins 2013, 2017; Richins and Dawson 1992). We predict that the emphasis materialistic consumers put on new purchases is so potent that it will affect their newness perceptions of innovative products (Mugge and Dahl 2013). The importance of purchasing products to their self-concept and self-value may make materialistic consumers (versus less materialistic consumers) more favorably predisposed when assessing the newness of an innovative product.

We furthermore suggest that the positive effect of materialism will be isolated to incremental innovations. Radical innovations, which represent an extreme departure from existing products, are more easily identified as 'new' no matter a consumers' predisposition. Thus, we predict that radical innovations will be perceived as 'new' by both low and high materialists. Incremental innovations, however, leave more room for interpretation. We predict that materialistic consumers will be motivated to perceive incremental innovations as more new than low-materialism consumers. We assess these predictions in studies 1-3; in study 4, we also investigate the moderating role of risk perceptions.

In Study 1, two hundred six Mturk participants completed a 2 (innovation type: incremental vs. radical) by materialism (measured; Richins and Dawson 1992) study. Participants viewed a description of an incremental [radical] suitcase (Dose et al. 2019) before completing a newness perception measure (Mugge and Dahl 2013) and the material values scale (Richins and Dawson 1992). A regression revealed the predicted innovation type x materialism interaction ($p = .0001$). Importantly, there was a positive, significant effect of materialism on newness perceptions for the incremental, but not radical, suitcase.

Study 2 followed a similar procedure with a new product, a smartphone, and with an additional measure of purchase likelihood. When participants viewed the incremental innovation, materialism significantly increased purchase likelihood; however, there was no effect of materialism on purchase likelihood when a radical innova-tion was presented. Furthermore, newness perceptions mediated this relationship.

Study 3 introduced a new manipulation of innovativeness, in which the featured product (a smartphone) was given an external 'innovativeness rating' from a consumer rating agency. As in Study 2, materialism significantly heightened both newness perceptions and purchase likelihood, but this effect was isolated to the incremental innovation.

In Study 4, we focus solely on an incremental innovation and introduce a new moderating factor: perceived risk. We propose that while materialism will continue to heighten newness perceptions, risk information will moderate the effect of newness perceptions on purchase likelihood. Specifically, we predicted that when risk was high, materialism would still heighten newness perceptions but the beneficial affect on purchase likelihood would be attenuated.

Study 4 was a 3(perceived risk: control vs. low risk vs. high risk) by materialism (measured) study in which all participants viewed an incrementally innovative washing machine. In the two risk conditions, participants were told that a fictional consumer rating agency considered the washing machine to be a high [low] risk purchase (Gürhan-Canli and Batra 2004). As expected, materialism heightened consumer perceptions of newness in all conditions. Surprisingly, however, a moderated mediation analysis (Hayes 2013, model 14) revealed that, when the innovation was perceived as highly new, purchase likelihood was robust to risk perceptions (+1 SD newness perceptions: $M_{controlrisk} = 77.31$, $M_{lowrisk} = 81.52$, $M_{highrisk} = 75.21$). In other words, materialism increased perceptions of newness, which in turn drove high purchase likelihood despite the risk level of the product. However, risk level did have a detrimental effect when materialism, and thus newness perceptions, were low (-1 SD newness perceptions: $M_{controlrisk} = 57.70$, $M_{lowrisk} = 56.10$, $M_{highrisk} = 33.96$). Though unexpected, these findings further support the motivated perceptions of high materialists when evaluating innovative products.

In four studies, we demonstrate that materialism increases newness perceptions and purchase likelihood for innovative products. We show that this effect is moderated by innovation type (radical vs. incremental), such that radical innovations are perceived as equally new for both low and high materialists. We show additional moderation by risk levels; while risk did not affect newness perceptions for innovations, purchase likelihood was inhibited for low materialists. These findings contribute primarily to the innovation and materialism literatures. Specifically, we contribute to a growing consumer-based view of innovations, which may be distinct from formal theoretical distinctions (e.g., Zhao, Hoeffler, and Dahl 2009, 2012; Zhao, Hoeffler, and Zauberman 2011). We further identify a relevant individual difference driving these perceptions: materialism. Materialism research has largely focused on acquisition, on post-purchase satisfaction, and on wellbeing (e.g., Richins 1994; Richins and Chaplin 2015; Rindfleisch, Burroughs, and Wong 2009). Instead, we suggest that this individual difference may motivate alternative perceptions of products, particularly products that offer the potential for new purchases.

REFERENCES

Chandy, Rajesh K. and Gerard J. Tellis (1998), "Organizing for Radical Product Innovation: The Overlooked Role of Willingness to Cannibalize," *Journal of Marketing Research*, 35(4), 474-87.

Dose, David B., Gianfranco Walsh, Sharon E. Beatty, and Ralf Elsner (2019), "Unintended Reward Costs: The Effectiveness of Customer Referral Reward Programs for Innovative Products and Services," *Journal of the Academy of Marketing Science*, 47(3), 438-59.

Gourville, John T. (2006), "Eager Sellers and Stony Buyers: Understanding the Psychology," *Harvard Business Review*, 84(6), 98-106.

Gürhan-Canli, Zeynep and Rajeev Batra (2004), "When Corporate Image Affects Product Evaluations: The Moderating Role of Perceived Risk," *Journal of Marketing Research*, 41(2), 197-205.

Mugge, Ruth and Darren W. Dahl (2013), "Seeking the Ideal Level of Design Newness: Consumer Response to Radical and Incremental Product Design," *Journal of Product Innovation Management*, 30(S1), 34-47.

Preacher, Kristopher J, Derek D Rucker, and Andrew F Hayes (2007), "Addressing Moderated Mediation Hypotheses: Theory, Methods, and Prescriptions," *Multivariate Behavioral Research*, 42(1), 185-227.

Richins, Marsha L. (2017), "Materialism Pathways: The Processes That Create and Perpetuate Materialism," *Journal of Consumer Psychology*, 27(4), 480-99.

——— (1994), "Special Possessions and the Expression of Material Values," *Journal of Consumer Research*, 21(3), 522-33.

——— (2013), "When Wanting Is Better than Having: Materialism, Transformation Expectations, and Product-Evoked Emotions in the Purchase Process," *Journal of Consumer Research*, 40(1), 1-18.

Richins, Marsha L. and Lan Nguyen Chaplin (2015), "Material Parenting: How the Use of Goods in Parenting Fosters Materialism in the next Generation," Journal of Consumer Research, 41(6), 1333-57.

Richins, Marsha L. and Scott Dawson (1992), "A Consumer Values Orientation for Materialism and Its Measurement: Scale Development and Validation," *Journal of Consumer Research*, 19(3), 303-16.

Rindfleisch, Aric, James E. Burroughs, and Nancy Wong (2009), "The Safety of Objects: Materialism, Existential Insecurity, and Brand Connection," *Journal of Consumer Research*, 36(1), 1-16.

Zhao, Min, Steve Hoeffler, and Darren W. Dahl (2012), "Imagination Difficulty and New Product Evaluation," *Journal of Product Innovation Management*, 29, 76-90.

——— (2009), "The Role of Imagination-Focused Visualization on New Product Evaluation," *Journal of Marketing Research*, 46(1), 46-55.

Zhao, Min, Steve Hoeffler, and Gal Zauberman (2011), "Mental Simulation and Product Evaluation: The Affective and Cognitive Dimensions of Process versus Outcome Simulation," *Journal of Marketing Research*, 48(5), 827-39.

Socioeconomic Status and Consumer Choice: The Role of Cultural Capital

Erick M. Mas, Vanderbilt University, USA
Blair Kidwell, University of North Texas, USA
Aparna A. Labroo, Northwestern University, USA

EXTENDED ABSTRACT

Socioeconomic status (SES)—a person's rank in society based on social and economic resources—is fundamental to who consumers are and how they live their lives (Holt 1998; Veblen 1899). Lower SES consumers face economic constraints triggering a short-term focus (Shah, Mullainathan, and Shafir 2012). Thus, these consumers are more impulsive and prefer immediately pleasurable choices (Shah et al. 2015). As a result, lower SES consumers often make maladaptive decisions, including overeating (Hill et al. 2016), or taking on high-interest debt or payday loans (Griskevicius et al. 2013; Hamilton et al. 2019).

However, past research focused primarily on *economic capital* (i.e., liquid financial resources, including income and accumulated wealth), and consequences of perceived financial constraints—drawing focus to immediate concerns (Roux et al. 2015). These studies may have overlooked a second critical component of SES (Dubois and Ordabayeva 2015)—*cultural capital*. We define cultural capital as a socio-cultural aspect of SES representing a consumer's understanding of the behaviors society deems valuable, in good taste, smart, or "cultured," and the ability to embody these tastes and behaviors to signal class identity and rank to others (Bourdieu 1987; Stephens and Townsend 2013).

Given the pervasiveness of cultural capital in consumers' SES, this is likely to play a larger role in shaping preferences, while the economic capital is likely to merely facilitate (or inhibit) their ability to obtain what they prefer. We examine how SES impacts consumer preferences beyond the influence of economic capital. We predict low SES consumers will favor utilitarian (vs. hedonic) choices because they are congruent with a low cultural capital identity (Stuppy et al. 2020).

In Study 1 (N = 293 undergraduate students, 63.10% female, M_{age} = 24.41, SD = 6.20), we found support for the basic effect. Participants indicated SES on a 10-rung ladder (see Adler et al. 2000) and household income (economic capital), then chose between utilitarian (i.e., conveniently located) and hedonic (i.e., beautiful view) apartment options. Regression revealed the predicted negative effect of SES on utilitarian choice beyond economic capital (see table 1). Thus, lower SES consumers prefer utilitarian (vs. hedonic) choices independent of economic capital.

In study 2 (N = 124 adults, 72.9% female, M_{age} = 42.22, SD = 13.14), we randomly assigned participants to feel lower in SES (following procedures from Dubois et al. 2015) or a baseline. Half of the participants read an article about chocolate framed as utilitarian (e.g., health benefits) and the other half to read about hedonic framed chocolate (e.g., pleasurable). Manipulating SES and product framing with a 2 (SES: low vs. baseline) × 2 (product framing: utilitarian vs. hedonic) between-subjects design allows us to establish causality on preference for chocolate (e.g., I would like some chocolate right now; 1 = not at all, 7 = very much). ANCOVA results revealed that after controlling for economic capital (household income), there was a significant interaction between SES and the product frame (see table 1), such that feeling low in SES increases preference for utilitarian products.

Low SES consumers make utilitarian choices that are consistent with a low cultural capital identity. In study 3 (N = 241 adults; 61.40% female, M_{age} = 36.35, SD = 12.04), we test this process through moderation. First, we measured SES and economic capital (household income). We then manipulated cultural capital by asking participants to identify a well-known portrait (Mona Lisa—control condition) or a similar, but unknown renaissance-style portrait (low cultural capital condition). All participants were told that cultured people with good taste can identify the portrait they reviewed. This was followed by the dependent measure: five choices between utilitarian and hedonic product options (e.g., warm vs. fashionable coat; adapted from Lu et al. 2016). Regression analysis shows that, beyond the influence of economic capital, lower SES consumers prefer utilitarian (vs. hedonic) options consistent with their low cultural capital identity. Higher SES consumers preferred hedonic choices in the control condition, but matched low SES consumers' utilitarian preference when made to feel low in cultural capital (see table 1 and figure 1).

Study 4 was a field experiment, showing that lower SES consumers prefer utilitarian (vs. hedonic) choices consistent with a low cultural capital identity. Participants were shoppers at a discount grocery store (N = 94 adults, 41.5% female) in a neighborhood with chronically low economic capital (median household income of $33,105/year, vs. $52,858/year nationally; U.S. Census 2019). As they entered the grocery store, shoppers were offered a gift after either a low cultural capital prime ("We understand that these days being classy can be difficult."), a low economic capital prime ("We understand that these days money can be tight."), or a no prime (control condition). They were given the choice of a functional black pen (utilitarian option) or fun purple pen (hedonic option). Priming low cultural capital increased the proportion of consumers making a utilitarian choice (14/31) compared to the control (5/29; z = 2.32, p = .023) and the economic capital prime (7/34; z = 2.12, p = .034). The proportion of consumers choosing utilitarian did not differ between the control and the low economic capital condition (z = 0.34, p = .736). Thus, the control and low economic capital conditions are similar in preferences for the utilitarian pen, but priming low cultural capital increases choice of the utilitarian pen. Finally, within the low cultural capital condition, consumers were more likely to make a utilitarian (14/31) compared to hedonic choice (7/31; z = 1.88, p = .061). These results are consistent with findings from studies 1-3, showing that low SES consumers prefer utilitarian (vs. hedonic) choices, not because of their lack of economic capital, but because of their salient lack of cultural capital. Utilitarian choices reflect practical decisions consistent with a low cultural capital identity.

REFERENCES

Adler, Nancy E., Elissa S. Epel, Grace Castellazzo, and Jeannette R. Ickovics (2000), "Relationship of Subjective and Objective Social Status with Psychological and Physiological Functioning: Preliminary Data in Healthy White Women," *Health Psychology*, 19, 586–92.

Bourdieu, Pierre (1987), "What makes a social class? On the theoretical and practical existence of groups," *Berkeley Journal of Sociology*, 32, 1-17.

Cannon, Christopher, Kelly Goldsmith, and Caroline Roux (2018), "A self-regulatory Model of Resource Scarcity," *Journal of Consumer Psychology*, 29(1), 104-27.

Dubois, David, and Nailya Ordabayeva (2015), "Social Hierarchy, Social Status and Status Consumption," in Mike I. Norton, Derek D. Rucker, and Cait P. Lamberton (Eds.), *Cambridge Handbook of Consumer Psychology*. New York: Cambridge University Press, 332-367.

Dubois, David, Derek D. Rucker, and Adam D. Galinsky (2015), "Social Class, Power, and Selfishness: When and Why Upper and Lower Class Individuals Behave Unethically," *Journal of Personality and Social Psychology*, 108(3), 436-51.

Roux, Caroline, Kelly Goldsmith, and Andrea Bonezzi (2015), "On the Psychology of Scarcity: When Reminders of Resource Scarcity Promote Selfish (and Generous) Behavior, *Journal of Consumer Research*, 42(4), 615-31.

Griskevicius, Vladas, Joshua M. Ackerman, Stephanie M. Cantú, Andrew W. Delton, Theresa E. Robertson, Jeffry A. Simpson, Melissa Emery Thompson, and Joshua M. Tybur (2013), "When the economy falters, do people spend or save? Responses to resource scarcity depend on childhood environments," *Psychological Science*, 24(2), 197-205.

Hamilton, Rebecca W., Chiraag Mittal, Anuj Shah, Debora V. Thompson, and Vladas Griskevicius (2019), "How Financial Constraints Influence Consumer Behavior: An Integrative Framework," *Journal of Consumer Psychology*, 29(2), 285-305.

Hill, Sarah E., Marjorie L. Prokosch, Danielle J. DelPriore, Vladas Griskevicius, and Andrew Kramer (2016), "Low Childhood Socioeconomic Status Promotes Eating in the Absence of Energy Need," *Psychological Science*, 27(3), 354-64.

Holt, Douglas B. (1998), "Does cultural capital structure American consumption?," *Journal of Consumer Research*, 25(1), 1-25.

Lu, Jingyi, Zhengyan Liu, and Zhe Fang (2016), "Hedonic Products for You, Utilitarian Products for Me," *Judgment and Decision Making*, 11(4), 332–41.

Roux, Caroline, Kelly Goldsmith, and Andrea Bonezzi (2015), "On the Psychology of Scarcity: When Reminders of Resource Scarcity Promote Selfish (and Generous) Behavior," *Journal of Consumer Research*, 42(4), 615-31.

Shah, Anuj K., Sendhil Mullainathan, and Eldar Shafir (2012), "Some Consequences of Having Too Little," *Science*, 338(6107), 682–85.

Shah, Anuj K., Eldar Shafir, and Sendhil Mullainathan (2015), "Scarcity Frames Value," *Psychological Science*, 26(4), 402-12.

Stephens, Nicole M., and Sarah SM Townsend (2013), "Rank is not enough: Why we need a sociocultural perspective to understand social class," *Psychological Inquiry*, 24(2), 126-30.

Stuppy, Anika, Nicole L. Mead, and Stijn MJ Van Osselaer (2020), "I Am, Therefore I buy: Low Self-Esteem and the Pursuit of Self-Verifying Consumption," *Journal of Consumer Research*, 46(5), 956-73.

Veblen, Thorstein (1899), *The theory of the leisure class: An economic study in the evolution of institutions*. Macmillan.

Dehumanizing Consequences of Anthropomorphism

Alican Mecit, HEC Paris, France
L. J. Shrum, HEC Paris, France
Tina M. Lowrey, HEC Paris, France

EXTENDED ABSTRACT

In this paper, we propose that interacting with anthropomorphized agents can increase one's dehumanization tendencies. As anthropomorphism turns consumer-product relations into quasi-social relations and individuals' behavior in such relations are characterized by their motivation to engage in effective social interactions with the anthropomorphized entities (Aggarwal & McGill, 2012; Eyssel, Kuchenbrandt, Bobinger, de Ruiter, & Hegel, 2012), we expect consumers to also be more likely to behave in ways that are consistent with the characteristics of the anthropomorphized entity to achieve their social interaction goals. Therefore, when they interact with anthropomorphized inanimate objects (e.g. robots), we expect them to assimilate such objects' characteristics, such as rigidity and coldness, in their interactions with these agents, which can further aggravate dehumanization tendencies. Different from consumers' interactions with anthropomorphized inanimate objects, we do not expect their interactions with anthropomorphized animals to increase their dehumanization tendencies, as people tend to consider animals as nonhumans capable of experiencing emotions. Accordingly, we hypothesize that interacting with anthropomorphized inanimate objects, but not with anthropomorphized animals, will increase one's tendency to dehumanize (H1). As the extent to which consumers assimilate the stereotypical characteristics of the target group depends on their attitudes toward the group (Cesario, Plaks, & Higgins, 2006), we propose that implicit attitudes toward the anthropomorphized entity will moderate the effect of interactions with such entities on dehumanization tendencies (H2). We tested these propositions across four studies.

In Study 1 (n = 153), we tested the proposed relation between anthropomorphism and dehumanization by measuring both with well-established scales (Bandura, Barbaranelli, Caprara, & Pastorelli, 1996; Waytz, Cacioppo, & Epley, 2010). As expected, those who indicated greater tendencies to anthropomorphize nonhumans also indicated greater tendencies to dehumanize other humans. Further analyses showed that dehumanization was positively correlated with both anthropomorphizing technological devices and anthropomorphizing nature, but not significantly correlated with anthropomorphizing animals.

In Study 2, we tested our hypothesis indirectly by relying on the use of technological products with humanlike characteristics as a proxy for anthropomorphism. We assumed that the more people use such anthropomorphized products, the more they would anthropomorphize in general. The pre-test (n = 58) showed that people who used PIAs (Personal Intelligent Agents, e.g. Siri) scored higher on anthropomorphism than did those who did not use PIAs. Next, with a separate group of participants (n = 203), we again measured the frequency with which they use technological devices with humanlike characteristics. Next, we measured individual differences in dehumanization tendencies using two different measures. The first measure was the same scale used in Study 1. The second measure was a scale that operationalized dehumanization in terms of agreement with policies that reflected commoditizing humans or human parts (Kopytoff, 1986) and breaching the principle of universalism that is inherent to human rights philosophy (DeBono, 2013). As expected, the use of technological devices with humanlike characteristics was positively correlated with scores on the dehumanization scale as well as with support for dehumanizing policies.

In study 3 (n = 181), we tested the proposition that interacting with anthropomorphized inanimate objects, but not with anthropomorphized animals, increases one's dehumanization tendencies (H1). Accordingly, we created three conditions: anthropomorphized robot, anthropomorphized animal, and the control. We also measured individuals' implicit attitudes toward the anthropomorphized entities and further expected the difference between the anthropomorphized robot and the control conditions in the extent to which they dehumanize others to diminish for people with negative attitudes toward robots (H2).

In the anthropomorphized robot (animal) condition, the instructions were conveyed by a robot (a puppy) named Adrian that had some humanlike characteristics and "spoke" in the first-person. In the control, participants read the instructions without any anthropomorphic agent being present. After presented with the photo of the 12 terrorists, participants answered three questions that measure how acceptable they find the harsh treatments of 9/11 plotters (Waytz & Epley, 2012), which served as our dehumanization measure. We expected participants in the anthropomorphized robot condition would endorse harsher treatments for the terrorists than would those in the control condition. We further expected that this effect to be moderated by participants' implicit attitudes toward robots. As predicted, for participants having favorable attitudes toward robots, those in the anthropomorphized robot condition were more likely to dehumanize others than those in the control condition. As expected, for participants having unfavorable attitudes toward robots, there was no difference between the conditions. Furthermore, as expected, the anthropomorphized puppy condition did not differ from those in the control condition.

In Study 4 (n = 101), we re-tested our hypothesis of a causal relation between anthropomorphism and dehumanization, using a service delivery scenario in which participants were asked to imagine that they had ordered a product online. In both conditions, the delivery person made several mistakes and mixed up a critical package they had been expecting with another one, and thus their package was not delivered on time. Participants were shown a picture of the package to be delivered. In the anthropomorphism condition, the package had an anthropomorphic message cue in which the package "spoke" in the first-person ("I'm carrying your order"), whereas in the non-anthropomorphism (control condition), the message did not have an anthropomorphic cue ("Inside is your order"). For the dependent measure, we operationalized dehumanization in terms of emotions attributed to the delivery person (Haslam, 2006; Leyens, et al., 2001). We expected that those in the anthropomorphism condition would exhibit greater dehumanization by denying secondary emotions to the delivery man compared to those in the control condition. They did. Replicating the findings of the previous studies, increasing anthropomorphic tendencies also increased dehumanization tendencies. Participants in the anthropomorphism condition denied secondary emotions to the delivery man more so than did those in the control condition.

Across four studies, we provided support for our proposition by showing that interacting with anthropomorphized objects increases one's dehumanization tendencies. As the marketplace is abundant

with anthropomorphic cues, it is important that practitioners and policy-makers pay close attention to potential negative consequences of anthropomorphism.

REFERENCES

Aggarwal, P., & McGill, A. (2012). When brands seem human, do humans act like brands? Automatic behavioral priming effects of brand anthropomorphism. *Journal of Consumer Research , 39*(2), 307-323.

Bandura, A., Barbaranelli, C., Caprara, G. V., & Pastorelli, C. (1996). Mechanisms of Moral Disengagement in the Exercise of Moral Agency. *Journal of Personality and Social Psychology, 71*(2), 364-374.

Cesario, J., Plaks, J., & Higgins, E. (2006). Automatic Social Behavior as Motivated Preparation to Interact. *Journal of Personality and Social Psychology, 90*(6), 893-910.

Chandler, J., & Schwarz, N. (2010). Use does not wear ragged the fabric of friendship: Thinking of objects as alive makes people less willing to replace them. *Journal of Consumer Psychology, 20*(2), 138-145.

DeBono, D. (2013). 'Less than human': the detention of irregular immigrants in Malta. *Race & Class, 55*(2), 60-81.

Greitemeyer, T., & McLatchie, N. (2011). Denying Humanness to Others: A Newly Discovered Mechanism by Which Violent Video Games Increase Aggressive Behavior. *Psychological Science, 22*(5), 659-665.

Haslam, N. (2006). Dehumanization: An Integrative Review. *Personality and Social Psychology Review, 10*(3), 252-264.

Kopytoff, I. (1986). The Cultural Biography of Things: Commoditization as process. In *The Social Life of Things: Commodities in Cultural Perspective* (p. 70). New York: Cambridge University Press.

Leyens, J.-P., Rodriguez-Perez, A., Rodriguez-Torres, R., Gaunt, R., Paladino, M.-P., Vaes, J., & Demoulin, S. (2001). Psychological essentialism and the differential attribution of uniquely human emotions to ingroups and outgroups. *European Journal of Social Psychology, 31*(4), 395-411.

MacInnis, D., & Folkes, V. (2017). Humanizing brands: When brands seem to be like me, part of me, and in a relationship with me. *Journal of Consumer Psychology, 27*(3), 355-374.

Moussawi, S., & Koufaris, M. (2019). Perceived Intelligence and Perceived Anthropomorphism of Personal Intelligent Agents: Scale Development and Validation. *Proceedings of the 52nd Hawaii International Conference on System Sciences* (pp. 115-124). HICSS.

Waytz, A., & Epley, N. (2012). Social connection enables dehumanization. *Journal of Experimental Social Psychology, 48*, 70-76.

Waytz, A., Cacioppo, J., & Epley, N. (2010). Who Sees Human? The Stability and Importance of Individual Differences in Anthropomorphism. *Perspectives on Psychological Science*, 219-232.

That's Where I'm From! How Identity-Links Increase Preference for Locally Produced Goods

Matthew D. Meng, Utah State University, USA
Ozgun Atasoy, University of Basel, Switzerland
Miguel Brendl, Universität Basel, Switzerland

EXTENDED ABSTRACT

There is growing interest in locally produced goods. Farmers markets have more than quadrupled in the past 20 years, many grocery stores advertise their locally sourced products, and restaurants emphasize their local offerings. In this research, our objective is to better understand the reasons behind the preference for locally produced goods (Best and Wolfe 2009; Carpio and Isengildina-Massa 2009; Chang et al. 2013).

Preference for local is typically considered a manifestation of concerns related to quality or ethical and sustainable consumption. When people are directly asked, they usually mention supporting the local community, receiving fresher food, or minimizing environmental impact (Darby et al. 2008; Diamond, Barham, and Tropp 2009; Moore et al. 2008; Morland, Wing, and Diez Roux 2002; Zepeda and Li 2006). We suspect that these may be post hoc rationalizations of a tendency driven by a self-related behavioral factor and test the following hypothesis: Because of shared location, a locally produced good is perceived to be connected more strongly to the self than goods made elsewhere. That leads to preference for locally produced goods because people prefer goods connected to their selves (Beggan 1992; Brendl et al. 2005; Perkins and Forehand 2011).

We test this hypothesis in four experiments by measuring preference in the absence of often-cited factors and by measuring and manipulating variables that affect the local product's connection to the self or that connection's influence on preference. We document these effects on preference, willingness to pay, and actual payments.

In Study 1, undergraduate students located in southwest USA (N = 68) indicated their likelihood to purchase locally vs nonlocally (i.e., Massachusetts) grown apples on a scale from 1 (very likely MA apple) to 7 (very likely [local state] apple). They indicated the same preference six more times after assuming circumstances that eliminate each major standard reason to prefer local (taste, nutrients, cost, safeness, carbon footprint, freshness, and the group of farmers who receive the revenue). Participants indicated a preference for the local apple even after learning that none of the standard reasons for choosing local applies ($M = 4.48 > 4.00$ [4.00 indicates indifference]; $t(60) = 3.15$, $p < .01$). All of the mean responses to the other iterations of the preference question also indicated a preference for local (t's$(60) > 4.50$, p's $< .001$).

In Study 2, residents of a Swiss town (N = 146) were randomly assigned to receive chocolate that was made either locally in town or generically in Switzerland and were asked to pay the amount of their choosing (including 0 Swiss francs) for the chocolate. They then indicated their market price estimate for the chocolate and their strength of identification with the town. Participants paid significantly more for the chocolate made locally ($M = 1.17$ CHF, $SD = 1.02$) than for chocolate made generically in Switzerland ($M = 0.66$ CHF, $SD = .62$; partial $\eta^2 = .08$; $t(144) = 3.62$, $p < .001$), even after statistically controlling for their market price estimates ($p = .001$). This effect was moderated by the strength of identification with the local town ($p < .01$) in a manner consistent with our self-connection account. That is, the price premium for locally-produced goods is an increasing function of the strength of identification with the local town.

In Study 3 residents of the northeast USA (N = 203) were recruited through Amazon's Mechanical Turk (MTurk). They were asked to imagine chatting on the phone to a friend. They were randomly assigned to one of four conditions in a 2 (friend's location: local state vs. Oregon) by 2 (product's localness: local vs. nonlocal) between-subjects design. Some participants read that their friend lived in the same state as they do, others in Oregon. All participants read that their friend was at a grocery store and was asking their advice on the price of the apple. Some participants read that the apples were grown locally, others in Nebraska (thus it was nonlocal regardless of where the friend was located). All participants indicated how much they think their friend should pay for a pound of apples. As predicted by our self-connection account, the premium for local depended on the friend's location ($p < .05$). Participants suggested a higher payment for the local apple when the friend was in the same town as the participant ($p < .05$) but not when the friend was in Oregon ($p > .10$), even though the apple was still local to the friend.

In Study 4 US residents (N = 320), recruited through MTurk, were randomly assigned to one of four conditions in a 2 (product's localness: local vs. nonlocal) by 2 (self-threat: present vs. absent) between-subjects design. Those in the self-threat present (absent) condition were asked to write at least 300 characters about an aspect of themselves that they have found difficult to change and would like to be different (about the last movie they saw). They then indicated their willingness to pay for local or nonlocal apples in a manner similar to Study 3. The premium for local depended on the presence or absence of the self-threat manipulation ($p < .05$). Those who completed the control task were willing to pay a premium for local ($p < .10$) whereas those who completed the self-threat task were not ($p > .10$). This effect of self-threat on the price premium for local is consistent with a self-related explanation for the premium and inconsistent with quality-related or ecological/ethical concerns.

These findings have strong managerial implications. Conventional wisdom currently relies on the standard reasons for buying local (e.g., carbon footprint, freshness, and support for local producers). In consequence, marketers of local products are typically advised to emphasize these factors (e.g., "Marketing local products should stress quality, freshness, and price competitiveness, and appeal to environmentalists and those with a favorable attitude towards family farms;" Brown 2003: 213). Based on our findings, however, a perceived product-self connection via shared location emerges as a critical factor. Therefore, trying to establish self-connections for nonlocal products, and emphasizing existing self-connections for local products appear to be promising strategies.

REFERENCES

Beggan, James K. (1992), "On the Social Nature of Nonsocial Perception: The Mere Ownership Effect," *Journal of Personality and Social Psychology*, 62 (2), 229-237.

Best, Michael J. and Kent L. Wolfe (2009), "A Profile of Local Dairy Consumers in the Southeast and the Potential for Dairies to Market Value-Added Products Locally," *Journal of Food Distribution Research*, 40 (1), 22-31.

Brendl, C. Miguel, Amitava Chattopadhyay, Brett W. Pelham, and Mauricio Carvallo (2005), "Name Letter Branding: Valence Transfers when Product Specific Needs Are Active," *Journal of Consumer Research*, 32 (3), 405-415.

Brown, Cheryl (2003), "Consumers' Preferences for Locally Produced Food: A Study in Southeast Missouri," *American Journal of Alternative Agriculture*, 18 (4), 213-224.

Carpio, Carlos E. and Olga Isengildina-Massa (2009), "Consumer Willingness to Pay for Locally Grown Products: The Case of South Carolina," *Agribusiness*, 25 (3), 412-426.

Chang, Kuo-Liang, Pei Xu, Keith Underwood, Carlos Mayen, and George Langelett (2013), "Consumers' Willingness to Pay for Locally Produced Ground Beef: A Case Study of the Rural Northern Great Plains," *Journal of International Food & Agribusiness Marketing*, 25 (1), 42-67.

Darby, Kim, Marvin T. Batte, Stan Ernst, and Brian Roe (2008), "Decomposing Local: A Conjoint Analysis of Locally Produced Foods," *American Journal of Agricultural Economics*, 90 (2), 476-486.

Diamond, Adam, James Barham, and Debra Tropp (2009), "Emerging Market Opportunities for Small-Scale Producers: Proceedings of a Special Session at the 2008 USDA Partners Meeting," US Department of Agriculture, Agricultural Marketing Service, available at https://www.ams.usda.gov/sites/default/files/media/EmergingMarketOpportunitiesForSmall-ScaleProducers.pdf.

Moore, Latetia V., Ana V. Diez Roux, Jennifer A. Nettleton, and David R. Jacobs Jr. (2008), "Associations of the Local Food Environment with Diet Quality: A Comparison of Assessments Based on Surveys and Geographic Information Systems: The Multi-Ethnic Study of Atherosclerosis," *American Journal of Epidemiology,* 167 (8), 917-924.

Morland, Kimberly, Steve Wing, Ana V. Diez Roux (2002), "The Contextual Effect of the Local Food Environment on Residents' Diets: The Atherosclerosis Risk in Communities Study," *American Journal of Public Health*, 92 (11), 1761-68.

Perkins, Andrew W., and Mark R. Forehand (2012), "Implicit Self-Referencing: The Effect of Nonvolitional Self-Association on Brand and Product Attitude," *Journal of Consumer Research*, 39 (1), 142-156.

Zepeda, Lydia and Jinghan Li (2006), "Who Buys Local?" *Journal of Food Distributions Research*, 37 (3), 1-11.

Navigating the Marketplace of Love: Value Conflict in Online Dating Community

Alisa Minina, Ipag Business School, France
Stefania Masè, Ipag Business School, France
Jamie Smith, ISC Paris, France

EXTENDED ABSTRACT

Introduction

Multiple scholars in the field of marketing and service research have dedicated their time and effort to studying the concept of value (Echeverri and Skalen 2011; Gronroos 2011; Kuppelweiser and Finsterwalder 2016; Vargo and Lusch 2004), acknowledging its idiosyncratic and context-dependent nature (Vargo and Lusch 2008). In this work we adopt a social constructionist approach to markets (Penaloza & Venkatesh, 2006), incorporating multiple notions of value (Karababa & Kjeldgaard, 2014) as well as consumer meanings and consumer subjectivity in our investigation of value creation and value destruction processes on the marketplace of love, or a consumption community of users of online dating services.

Building upon theoretical insights from service-dominant logic and transformative service research and broadening our understanding of value beyond the economic perspective, we investigate what happens when multiple notions of value coexist in the same marketplace. Embracing the multiple notions of value allows us to understand how different interpretations of value by market actors contribute to the complexity of value co-creation and co-destruction processes. We complement the extant literature on interactive value creation and destruction (Echeverri and Skalen 2011; Cabiddu, Moreno, and Sebastiano 2019) by introducing the concept of Value Conflict, showing how the conflict between social values and expected use-value in a shared marketplace can lead to ambivalent meanings in the consumption process.

Literature Review

The sociocultural context of value creation

Much of existing analysis in the field, while acknowledging the active role of consumers in value co-creation and co-destruction, concentrates on co-creation of value from service perspective (Echeverri & Skalen, 2011; Grönroos, 2011; Wieland, Polese, Vargo, & Lusch, 2012). Taking the process of value creation beyond the production-consumption dyad, Penaloza and Venkatesh (2006) forwarded a social constructionist view of the markets, arguing for extension of the view of value co-creation to include consumer meanings in exchange and use – that is, the way consumers give meaning to their lives through consumption activities.

Markets are presented as social/cultural constructions, a bundle of resources consumers can use to give meanings and values to their lives (Penaloza and Venkatesh 2006; Venkatesh and Peñaloza 2014). Markets are composed not only of resources, but also by a multiplicity of actors, such as consumers, companies, the government, the media, all of them actively operating in the marketplace to potentially create value. Karababa and Kjeldgaard (2014) highlight the complexity of value creation processes by organizing the multiplicity of conceptions of value into three abstract categories: economic value, social values and value in a semiotic sense, or meaning, arguing that bringing these notions of value into interaction can enrich our understanding of value creation in the market.

In parallel with the suggestions from the field of sociocultural consumer research, the notion of value creation in S-D logic research has moved from a linear perspective, to a network perspective, involving a variety of actors (Vargo and Lush, 2011). Contrary to value-in-exchange, and evolving by the definition of value-in-use, the notion of value-in-context implies that value is not only always systemic and co-created, but also always contextually determined for all the actors belonging to the ecosystem (Chandler and Lusch 2015; Vargo and Lusch 2011; Wieland et al. 2012; Vargo, Maglio, and Akaka 2008; Vargo, Akaka, and Vaughan 2017).

The service ecosystems perspective further highlighted the contextual nature of value creation, where value makes sense only within the social system in which it is created (Lush and Vargo, 2014; Vargo and Lush, 2011). The social system – which comprehends the service ecosystem – is a system of actors in continuous exchange and development. Value creation in these systems are guided by rules, social norms, symbols, in other words institutions, that are continuously transformed and reshaped by both adopters or non-adopters of the service solution (Wieland, 2014). Both streams of research highlight that all actors participate in the value creation and in the market transformation, by modifying and normalizing practices that are common in use in a society. The meeting between consumers and service providers happens in a sociocultural environment; the fruit of this meeting can potentially create or destroy value for one singular actor, or for all of the actors participating in the relationship.

The search of well-being for the actors in the ecosystem

Currently, there is a call for more research into both positive and negative well-being (Kuppelwieser and Finsterwalder, 2016) of market actors. The marketing and service literature has focused especially on value creation and co-creation, while more attention is now asked to better explore the possible negative outcomes of a consumer – service – market relationship (Echeverri & Skålen, 2011; Jarvi, 2018). The literature in value co-destruction is still nascent, and it is presented as a failed interaction where at least the decrease of well-being is observable in one of the actors participating in the relationship (Plé and Cáceres 2010; Akaka, Vargo, and Schau 2015; Järvi, Kähkönen, and Torvinen 2018). This definition is larger than the common definition of service failure, or value destruction, where the provider's processes fail and the customer experiences dissatisfaction because of this failure (Jarvi, 2018). Value co-destruction can be observed in B2B (Cabiddu, et al., 2019) or B2C contexts, and can have a double sense, if for example, the consumer reacts to the service failure (Plé and Cáceres 2010). Some of the reasons of value co-destruction can be mistakes, the inability to serve from the perspective of the service provider, service sabotage from the part of the employees, but also customer misbehavior and blaming the employees from a consumer perspective (Harris and Ogbonna, 2002a; Jarvi, 2018).

In our analysis of consumer online dating experiences, we focus on consumer subjectivity, analyzing the misbehavior of consumers against other consumers, in an interactive co-destruction of value that affects consumer well-being as well as that of a larger society. We focus on the online dating services environment, where a possible negative value of the exchange can be found at the core of the transaction, with the risk of treating people as products (Hirschman 1987; Bagozzi 1974; Lusch, Vargo, and Malter 2006). This risk opens up to the analysis of the ethical impact of transformative services as digital dating apps.

Method

In this study, we investigate the context of online dating with the purpose to gain understanding of the complex interplay of the processes of value creation (Karababa and Kjeldgaard 2014) and destruction (Kuppelweiser and Finsterwalder 2016; Echeverri and Skalen 2011; Grönroos 2011) that occur in consumer-consumer relationships online, that is, where the value creation / destruction processes do not occur through interactions between consumers and the service prodiver, but in the process of consumers interacting with each other. Unlike the case of brand communities (Schau, Muñiz, and Arnould 2009) when consumers unite around shared loyalty to a given brand, online dating app users represent a specific instance of networked consumption community (Chalmers Thomas, Price, and Schau 2013), where individual actors engage in serial one on one encounters with each other ad infinitum until they settle with a chosen partner.

From November 2018 to June 2019 we have conducted semi-structured in-depth interviews (McCracken 1988) with 21 male and female users of online dating apps residing in Paris, falling within the 23-56 age range. Participants were recruited via online calls for participation on Tinder and Facebook. The interviews lasted on average 40-60 minutes. All interviews were recorded, transcribed and analytically coded with the focus on individual consumer experience as part of a complex system of interaction between human actors, service providers and the broader society. The triangulation between researchers throughout the analytical process allowed us to ensure the adequacy of our representation and analysis of studied constructs by constantly comparing and contrasting our interpretation of the data in relation to the literature (Wallendorf and Belk 1989).

Findings

Value conflict

Data analysis revealed that in their interactions with each other in the online dating marketplace, our informants experienced the conflict between multiple notions of value throughout their online dating experience. We define value conflict as the instance of contradictory overlapping notions of value, coexisting in the marketplace and inhibiting processes of value creation, leading to parallel processes of value co-creation and co-destruction as multiple actors negotiate their contesting notions of value in their interactions with each other throughout the service experience. Following the social constructionist approach to value creation in the marketplace (Penaloza and Venkatesh 2006) and embracing complexity of multiple notions of value (Karababa and Kjeldgaard 2014), we have identified several sources of value conflict in the online dating marketplace.

Social values vs Use-value

The first conflict occurred between the social values, or culturally embedded perceptions of desirability (Karababa&Kjeldgaard 2014) and the perceived use-value, or subjectively experienced benefit (Gronroos 2011) of the online dating experience, facilitated by elements of service design as well as users' individual motivations and expectations from their consumption experiences. As negotiation of value by multiple actors throughout the service ecosystem of online dating took place, the social values of monogamy and appropriateness conflicted with the perceived use value of dating experience and associated sexual freedom, triggering simultaneous processes of value creation (when perceptions of social value aligned with perceptions of use value) or value destruction (when social values conflicted with perceptions of use value). When asked about their expectations from an ideal relationship, the informants emphasized trust, care, friendship, loyalty and intellectual compatibility as desired relationship characteristics, however, when discussing relationships in the context of dating apps, a different picture emerged, as we can see from examples below.

> (…) all the people like my relatives, friends and stuff, like you know, you are having a relationship with a girl from Tinder, and then they ask "How did you meet?" On Tinder - I think it's quite..., I don't know, like.... (…) I have tried to find an answer, but… But I know that this is something that disturbs me. So, every time when I am on this app, I hope not to stumble upon a girl to whom I will get attached, this is interesting (Mark, 26)

> I guess when you're meeting someone through Tinder there's a kind of like unspoken not rule, but there's an unspoken sort of fact that like this is probably just gonna be for like a hook up. Do you know what I mean? (Eve, 25)

In this instance the value conflict can occur as an ethical conflict experienced by a consumer, when, for instance, social values conflict with perceived use value, generating frustration and/or morally ambiguous behaviors. It can also occur between different subjects in the consumption community, when different perceptions and expectations of value are not aligned between the potential dating counterparts.

> I also don't think you can really tell what somebody is like when you're talking via any kind of digital media. So I kind of think that you do need to meet them to actually know if you click or if you're even interested. I guess there is also that fear of you don't actually know who you are going to meet. And it's all drilled into us from a young age that you don't know who anyone is on the internet! (Rose, 23)

As consumers of online dating apps engaged in immaterial labor in order to maximise value for themselves as well as, occasionally, for their counterparts, (Cova and Dalli 2009), due to the networked nature of the service offering, the risk of treating people as products (Hirschman, 1987; Bagozzi, 2006; Lusch, Vargo and Malter, 2006) ran high, contributing to the conflicting nature of the experience.

Double standards and moral ambiguity

In their reflections on their service experiences, consumers would apply higher behavioral standards to others than to themselves. The conflicting nature of consumer meanings in the ethical domain manifested as the blurring of ethical boundaries, as the users rationalized their mistreatment of others by treating the digital context where they allowed themselves to behave unethically as an opposite to "real life", where they would be more likely to stick to a more traditional code of conduct. The perception of the digital context as a surreal gamified experience gave them freedom from experiencing the negative consequences of unethical behaviors, in contrast with the hypothetical real-life situations where they would meet potential partners through common social networks of family and friends. At times, the informants rationalized their strategy of withdrawing from communications as a mutual decision to stop talking. They have acknowledged that it was easier to end communications in the online context compared to the situation when the relationship would happen in "real life".

> (…) it is easier to stop (…) because I think in five minutes, take my phone, download the app, match with one or two persons, and have a conversation with them, maybe date the day after… So in 24 hours I can date someone. So easy date, easy stuff…

In real life, do you think that in 24 hours I can walk down the street and ask people about dating me the day after that? No, I can't! (Alan, 28)

The moral ambiguity also related to the uncertainty of knowing the true intentions of a person on the other side of the dating app. For a long time, Alice engaged in non-exclusive relationships with men on dating apps. However, when she found her current long-term partner on Tinder, the deciding factor was their mutual desire for exclusivity.

You meet far more people who want to meet someone. In real life there is always a degree of uncertainty, you never know if that person looking at you wants a relationship or something else. (Alice, 54)

The theme of applying different moral standards to situations in digital versus real life was especially evident in the situations of deciding the exclusivity of the relationships or ending the communications, when the dilemma of whether to be transparent with the other person or whether to just disappear arose.

Reluctant belonging to consumption community

The third source of conflict was the disparity between the factual belonging to consumption community by online dating app users, and their simultaneous rejection of collective identity, related to the stigmatized nature of using dating apps. Alice, a 54-year old woman who started using dating apps in order to date non-exclusively after the dissolution of her long-term relationship, referred to Tinder as "the bargain basement of dating apps where all creeps are spending their time", while Sofia, a 33-year old student, said that she hated Tinder, calling it "the jungle". Nevertheless, just like other informants did, after trying several other apps, they adopted Tinder as the main app that they used for encounters with potential dating partners. While the informants themselves were meeting their potential partners online, at the same time they felt conflicted about the use of the dating apps in general.

I wouldn't want the person I'm seeing in the relationship to be using Tinder, do you know what I mean? Or be intrigued about using it (Eve, 25)

I guess yes, I do look for someone to be in a relationship with because I have enough friends, I'm not really there to make friends (…) Sometimes it does get exhausting because you're always meeting different people (Vero, 29)

Unlike in case of brand communities, subcultures of consumption or other collaborative consumption communities where consumers thrive on sense of unity and belonging when they unite around shared practice or their common preference for a certain brand (Muniz and O'Guinn 2001; Schau, Muñiz, and Arnould 2009; Schouten and McAlexander 1995), the online dating context represents an instance of non-collaborative consumption community, where consumers willingly or unwillingly engage in immaterial labor (Cova and Dalli 2009), primarily acting in own self-interest, eventually creating or diminishing value through their interactions with each other. Much commentary focused on the risks of using dating apps, the potential harm and a sense of vulnerability, the concerns for safely motivated users to develop a range of strategies, such as keeping conversations on the app for as long as possible, not giving their phone number to new acquaintances or not adding people they met on the app on social networks.

Discussion And Conslusion

In this work we draw upon social constructionist view of markets (Penaloza and Venkatesh 2006; Karababa and Kjeldgaard 2014), embracing multiple notions of value in service consumption context. Our findings contribute to extant literature on value co-creation and co-destruction (Echeverri & Skalen, 2011; Grönroos, 2011; Wieland, Polese, Vargo, & Lusch, 2012) by introducing the concept of Value Conflict and by illustrating how multiple notions of value coexisting in marketplace can inhibit the processes of value creation as multiple actors negotiate their contesting notions of value in their interactions with each other throughout the service experience. We show how the conflict between social values and expected use-value can lead to ambivalent meanings in the consumption process and document how perceived use value can be simultaneously co-created and co-destroyed without direct participation of service providers in the process of social interaction between consuming subjects.

While the context of online dating represents a very specific context where value co-creation and co-destruction processes occur simultaneously in the process of social interaction, our theoretical insights can be potentially transferred to other contexts where value is created by users interacting with each other, without direct participation of service providers. Our data shows that value destruction processes can be triggered by the incompatibility of notions of value between users or within the value system of a single user, therefore, managers who want to avoid value conflict and subsequent triggering of the processes of value destruction need to pay attention to alignment of values, either through providing community guidelines and educational content, or by introducing control mechanisms allowing users to report undesirable behaviors that cross the line of appropriateness.

One possible limitation of our study is that our insights about individual users and their service practices are based on the verbal accounts of our informants. Thus, our results will inevitably reflect what the study participants believe they do, rather than their actions on the dating app. Due to a sensitive issue of the topic that is embedded in cultural rules and norms, there is also a possibility of a social desirability effect in our interviews - that is, the informants adjusting their answers to what they believed the interviewer wanted to hear. We encourage future research using observational methods and prolonged engagement with mobile app users that would allow following their consumption habits in real time.

The second potential limitation of this study is that we have only conducted interviews with the users of dating apps, therefore our accounts of the service design elements, such as the applications' interface, promotional communications and functions are based on the experiences of our informants as well as on observations of one of the authors who has created accounts on multiple dating apps in order to explore their functionality. Investigating the service providers could enhance our understanding of what is driving the moral ambiguities users are experiencing and the anguish that it generates.

REFERENCES

Bagozzi, R.P. 1974. "Marketing as an Organized Behavioral System of Exchange." *Journal of Marketing* 38 (4): 77–81.

Cabiddu, Francesca, Frau Moreno, and Lombardo Sebastiano. 2019. "Toxic Collaborations: Co-Destroying Value in the B2B Context." *Journal of Service Research* 22 (3): 241–55. https://doi.org/10.1177/1094670519835311.

Chalmers Thomas, Tandy, Linda L. Price, and Hope Jensen Schau. 2013. "When Differences Unite: Resource Dependence in Heterogeneous Consumption Communities." *Journal of Consumer Research* 39 (5): 1010–33. https://doi.org/10.1086/666616.

Chandler, Jennifer D., and Robert F. Lusch. 2015. "Service Systems: A Broadened Framework and Research Agenda on Value Propositions, Engagement, and Service Experience." *Journal of Service Research* 18 (1): 6–22. https://doi.org/10.1177/1094670514537709.

Cova, B., and D. Dalli. 2009. "Working Consumers: The next Step in Marketing Theory?" *Marketing Theory* 9 (3): 315–39. https://doi.org/10.1177/1470593109338144.

Echeverri, P., and P. Skalen. 2011. "Co-Creation and Co-Destruction: A Practice-Theory Based Study of Interactive Value Formation." *Marketing Theory* 11 (3): 351–73. https://doi.org/10.1177/1470593111408181.

Gronroos, C. 2011. "Value Co-Creation in Service Logic: A Critical Analysis." *Marketing Theory* 11 (3): 279–301. https://doi.org/10.1177/1470593111408177.

Hirschman, E. 1987. "People as Products: Analysis of a Complex Marketing Exchange." *Journal of Marketing*. https://doi.org/10.2307/1251147.

Järvi, Henna, Anni Kaisa Kähkönen, and Hannu Torvinen. 2018. "When Value Co-Creation Fails: Reasons That Lead to Value Co-Destruction." *Scandinavian Journal of Management* 34 (1): 63–77. https://doi.org/10.1016/j.scaman.2018.01.002.

Karababa, Eminegül, and Dannie Kjeldgaard. 2014. "Value in Marketing: Toward Sociocultural Perspectives." *Marketing Theory* 14 (1): 119–27. https://doi.org/10.1177/1470593113500385.

Kuppelweiser, Volker G., and Jorg Finsterwalder. 2016. "Transformative Service Research and Service-Dominant Logic: Quo Vaditis?" *Journal of Retailing and Consumer Services* 28 (1): 91–98.

Lusch, Robert F., Stephen L. Vargo, and Alan J. Malter. 2006. "Marketing as Service-Exchange: Taking a Leadership Role in Global Marketing Management." *Organizational Dynamics* 35 (3): 264–78.

McCracken, Grant. 1988. *The Long Interview*. Newbury Park, CA: SAGE Publications, Inc.

Muniz, Albert M., and Thomas C. O'Guinn. 2001. "Brand Community." *Journal of Consumer Research* 27 (4): 412–432. http://www.jstor.org/stable/10.1086/319618?prevSearch=oguinn.

Penaloza, Lisa, and Alladi Venkatesh. 2006. "Further Evolving the New Dominant Logic of Marketing: From Services to Social Construction of Markets." *Marketing Theory* 6 (3): 299–316.

Plé, Loïc, and Rubén Chumpitaz Cáceres. 2010. "Not Always Co-Creation: Introducing Interactional Co-Destruction of Value in Service-Dominant Logic." *Journal of Services Marketing* 24 (6): 430–37. https://doi.org/10.1108/08876041011072546.

Schau, Hope Jensen, Albert M. Muñiz, and Eric J. Arnould. 2009. "How Brand Community Practices Create Value." *Journal of Marketing* 73 (5): 30–51. http://www.journals.marketingpower.com/doi/abs/10.1509/jmkg.73.5.30.

Schouten, John W., and James H. McAlexander. 1995. "Subcultures of Consumption: An Ethnography of the New Bikers." *Journal of Consumer Research* 22 (1): 43–61. http://www.jstor.org/stable/2489699.

Vargo, Stephen L., Melissa Archpru Akaka, and Claudia M. Vaughan. 2017. "Conceptualizing Value: A Service-Ecosystem View." *Journal of Creating Value* 3 (2): 117–24. https://doi.org/10.1177/2394964317732861.

Vargo, Stephen L., and Robert F. Lusch. 2004. "Evolving to a New Dominant Logic for Marketing." *Journal of Marketing* 68 (1): 1–17.

———. 2008. "Service-Dominant Logic: Continuing the Evolution." *Journal of the Academy of Marketing Science* 36 (1): 1–10. https://doi.org/10.1007/s11747-007-0069-6.

———. 2011. "It's All B2B…and beyond: Toward a Systems Perspective of the Market." *Industrial Marketing Management* 40 (2): 181–87.

Vargo, Stephen L., Paul P. Maglio, and Melissa Archpru Akaka. 2008. "On Value and Value Co-Creation: A Service Systems and Service Logic Perspective." *European Management Journal* 26 (3): 145–52. https://doi.org/10.1016/j.emj.2008.04.003.

Venkatesh, Alladi, and Lisa Peñaloza. 2014. "The Value of Value in CCT." *Marketing Theory* 14 (1): 135–38. https://doi.org/10.1177/1470593113500386.

Wallendorf, Melanie, and Russell W Belk. 1989. "Assessing Trustworthiness in Naturalistic Consumer Research." *Interpretative Consumer Research*, 69–84.

Wieland, Heiko, Kaisa Koskela-Huotari, and Stephen L. Vargo. 2016. "Extending Actor Participation in Value Creation: An Institutional View." *Journal of Strategic Marketing* 24 (3–4): 210–26. https://doi.org/10.1080/0965254X.2015.1095225.

Wieland, Heiko, Francesco Polese, Stephen L. Vargo, and Robert F. Lusch. 2012. "Toward a Service (Eco)Systems Perspective on Value Creation." *International Journal of Service Science, Management, Engineering, and Technology* 3 (3): 12–25. https://doi.org/10.4018/jssmet.2012070102.

"Who" You Rent from Matters: The Differential Effects
in Perceived Ownership When Renting

Nirajana Mishra, Boston University, USA
Sarah Whitley, University of Georgia, USA

EXTENDED ABSTRACT

Renting has become a more prevalent method of accessing products in the last decade, in part because consumer spending capabilities and priorities have changed (Coughlin 2018) but also because consumers now have access to more options and opportunities than ever before with the emergence of the access economy (Eckhardt and Bardhi 2015). With peer-to-peer access-based consumption (e.g., Airbnb, Turo, etc.), consumers now engage in renting products from companies as well as from other people. But, does "who" you rent from matter? Consumers interact differently with companies, which are generally governed by exchange norms (Clark and Mills 2011) than with people who can evoke more communal norms (Aggarwal 2004). However, renting in the access economy embraces both market and social characteristics, so it is not clear if renting a product from a company in an access marketplace differs from renting the product from another person. In the present research, we examine how renting from a company versus a person influences consumers' perceptions of the rented product as well as their post-rental behavioral intentions. We argue that "who" the consumer rents from (a company versus an individual) matters, and suggest that whether a product is rented from a company versus a person influences consumers' perceptions of the product and their behavior with it (e.g., personalization, care). Across four studies, we find that consumers value the same product more highly when renting it from a company than from a person. These results hold across different types of products and when access to the rental product is granted through an online platform. We hypothesize that differences in perceived psychological ownership underlie the differences in valuation and examine its downstream consequences.

In study1A (N = 402), we aimed to explore whether renting a product from a company or a person (which we refer to as the "rental entity") influences how people value the product they rent. Since valuation of an item increases with possession (Peck and Shu 2009; Strahilevitz and Loewenstein 1998; Kahneman et al. 1990), and even imagined possession (Peck et al. 2013), consumers may feel differently about the rental product once they have it in their possession. Consequently, we evaluated consumers' willingness to pay for a rental product and their willingness to accept payment to give up their rental product (Chatterjee et al. 2013; Aggarwal and Zhang 2006). Participants imagined they were either "looking to rent" or had "already rented" a 2-bedroom vacation cabin in Colorado for one night, per assigned rental stage. Participants in "company rental entity" condition were renting from Aspen Management Company, while those in "person rental entity" condition were renting from Donna Smith. A picture of the cabin was displayed across all conditions to hold expectations constant. Participants then indicated their valuation (in $) of a one-night stay in the cabin in an open-ended response box. A 2 (rental entity) x 2 (rental stage) ANOVA on valuation revealed significant main effects of rental stage ($F(1,376)$ = 205.46, $p < 0.001$) and rental entity ($F(1,376)$ = 5.75, $p = 0.017$). Replicating endowment literature, participants valued the cabin more if they had already rented it (M = 284.49) than when looking to rent (M=159.98). Additionally, participants valued the cabin more when renting from a company than from a person ($M_{company}$ = 232.81 vs. M_{person} = 211.55); $p = 0.017$), suggesting that who you rent from matters. We also found a marginally significant two-way interaction

of rental entity and rental stage on valuation ($F(1,376)$ =2.99, p = 0.085). Pairwise comparisons showed participants who were looking to rent the cabin had no differences in their willingness to pay for it ($M_{company}$ = 161.57 vs. M_{person} = 155.63; $p = 0.639$). Instead, this interaction was driven by participants differences' in willingness to accept to give up the cabin they had already rented ($M_{company}$ = 304.05 vs. Mp_{erson} = $267. 46$; p =0.003). These results suggest that the rental entity does not matter in terms of consumers' expectations of the rental product and their willingness to pay, but it does matter with regard to how consumers value the product once it's in their possession. Since possession of an object leads to increased valuation due to feelings of ownership (Reb and Connolly 2000) even when consumers merely possess (Sen and Johnson 1997) but do not legally own the products, we speculate that consumers may feel different levels of psychological ownership over products rented from different rental entities.

Rather than consumers valuing the rental products differently, one potential explanation of the lower WTA amounts observed in the previous study is that participants may feel that the person offering the rental product may have less physical and financial resources than a company. Consequently, consumers may feel empathy for a person supplying the rental product and offer a lower WTA amount. In study 1B (N=365), we evaluate this alternative explanation by including an additional condition equalizing resources between a company and person in the post-rental stage. All participants imagined that they had booked a rental vacation cabin for one night and were informed that the cabin was no longer available, analogous to the "already rented" rental stage condition in Study 1. The first two rental entity conditions (company vs. person), were the same as Study 1. Participants assigned to the third rental condition read that they were renting the vacation cabin from "Donna Smith who had multiple properties in the area." Participants then indicated how much they valued the cabin by reporting their willingness to accept on a sliding scale from $0 to $400. ANOVA results revealed a significant main effect of renting entity on product valuation ($F(2,336)$ = 4.95, $p = 0.008$). Replicating prior results, post-hoc tests (Tukey's HSD) revealed that participants valued the cabin significantly more when renting it from a company (M= 285.84) than from a person (M= 249.21; $p = 0.032$) or a person who explicitly owned multiple properties (= 242.99; p= 0.010). Most important, there was no difference in participants' cabin valuations between the two person-based rental entity conditions (p = .899), dispelling concerns that lower valuation for rental products owned by people, as opposed to a company, is due to a perception of differential resources between the company and the person-based rental entities.

In study 2 (N=609), we sought to replicate our finding that consumers differentially value products rented from companies versus people in a different but externally valid product domain: automobile rentals. Accordingly, we test the premise of renting from a person through an online platform, which not only provides greater external validity for our findings but also addresses the concern that interacting directly with a person may influence consumers' product valuations as opposed to interacting in a more distant manner through an online platform. Similar to Study 1, participants were told to either imagine they were "looking to rent" or had "already rented" a Jeep for one day while on vacation. Per assigned rental stage condition, participants

were told that they had rented the Jeep from either a company (Vieques Jeep Rentals), a person (Alex Smith), or a person (Alex Smith) through an online platform. Lastly, participants indicated their valuation on a slider scale from $0 to $400. A 3 (rental entity) x 2 (rental stage) ANOVA revealed a significant main effect of rental stage on product valuation ($F (1,603) =107.20$, $p<0.001$). While there was no main effect of rental entity on product valuation ($F (2,603) =1.92$, $p=0.148$), there was significant interaction of rental entity and rental stage on product valuation ($F (2,603) =3.82$, $p=0.022$). Pairwise comparisons indicated that while there were no significant differences in product valuation across the rental entities for participants "looking to rent" ($M_{company}= \$153.52$ vs. $M_{person}=\$166.77$ vs. $M_{person-platform}=\$159.50$; $F (2,603) =0.48$; $p=0.622$), product valuation across different rental entities did differ among participants relinquishing a Jeep they had already rented ($F (2,603) =5.27$; $p=0.005$). In "already rented" rental stage condition, participants valued the Jeep (WTA amounts) higher when renting from a company ($M_{company}=\$265.22$) than from a person ($M_{person}=\$236.68$; $p=0.037$) or from a person via an online platform ($M_{personplatform}=\$221.84$; $p=0.001$). However, there was no difference in product valuation among participants who had already rented the Jeep from a person or from a person via an online platform ($p =0.274$). Overall, these results replicate findings from Study 1 and show that difference in valuation when renting from a company versus a person holds even when interactions with the person are via an online platform.

In Study 3 (N=306), we test our proposed mechanism of psychological ownership and evaluate post-rental behavioral consequences emanating from differences in perceived ownership when renting from either a company or a person. In prior studies, we observe a difference in product valuation once participants have rented the item, suggesting that psychological ownership may underlie this effect. Psychological ownership reflects a relationship between an individual and an object (Pierce et al. 2003) and consumers may feel less perceived ownership for a rented product if that product already has a relationship with a person (i.e., the rental entity) compared to a company. Participants were randomly assigned to a company or person rental-entity Jeep rental scenario, analogous to Study 2. To investigate the practical consequences of consumers' renting products from different entities, we examined a measure of perceived control over the rental object (likelihood to personalize the radio preset stations (Bardhi and Eckhardt 2012) on the Jeep; 1=Not at All, 7=Very Much) as well as a measure of intended care for the Jeep (i.e., likelihood to wash before returning; 1=Not at All, 7=Very Much). Participants also completed a measure of psychological ownership, adapted from Shu and Peck (2011), by reporting how much they felt the "jeep was yours" during the time that they were renting it (1=Not at all, 7=Very Much). Rental entity significantly influenced the behavioral control measure ($F (1,260) =13.95$; $p<0.001$): participants were more likely to personalize the Jeep when renting from a company than a person ($M_{company}=4.62$ vs. $M_{person}=3.56$). We also replicated the rental entity effect on valuation ($F (1,260) =20.81$; $p<0.001$): participants valued the Jeep more when renting from a company than a person ($M_{company}=226.27$ vs. $M_{person}=166.28$). While we initially expected consumers to care more about the product when owned by a company (i.e., psychological ownership is higher), we found the opposite: participants were more likely to care of the product when renting from a person than a company ($M_{company}=4.22$ vs. $M_{person}=4.76$; $F (1,260) =4.62$, $p=0.032$). This result may still be due to perceptions of psychological ownership, in that consumers are more likely to bring about self-initiated changes in the product they feel "is theirs" (Pierce, Kostova and Dirks 2001) rather than keeping it in its original form. Rental entity had a significant effect

on psychological ownership (F ($1,260$) =4.69 $p=0.031$): participants felt the Jeep was "theirs" more when it was rented from a company ($M_{company}=4.16$) versus a person ($M_{person}=3.62$). We ran a separate mediation analysis for each dependent variable; psychological ownership partially mediated personalization (95% CI: -0.48; -.02), care (95% CI: -0.26; -.01), and product valuation (95% CI: -17.52; -.62). Lastly, to examine alternative explanations, we measured feelings of responsibility and accountability to the rental entity, but found no differences between rental entities for either variables.

Across 4 studies, two different product categories, and three different dependent variables (valuation, control/personalization, and care) we find that consumers feel differently about the products they rent depending on who rented it to them: a company versus a person. As research on the access economy is still in its early stages, we provide insight on how consumers perceive the products they rent from different entities (i.e., they feel less ownership of products rented from people), and suggest the importance of this work given the downstream consequences these different perceptions have on consumers' behaviors with the rental product.

REFERENCES

Aggarwal, P. (2004). The effects of brand relationship norms on consumer attitudes and behavior. *Journal of consumer research, 31*(1), 87-101.

Aggarwal, P., & Zhang, M. (2006). The moderating effect of relationship norm salience on consumers' loss aversion. *Journal of Consumer Research, 33*(3), 413-419.

Bardhi, F., & Eckhardt, G. M. (2012). Access-based consumption: The case of car sharing. *Journal of consumer research, 39*(4), 881-898.

Clark, M. S., & Mills, J. R. (2011). A theory of communal (and exchange) relationships. *Handbook of theories of social psychology, 2*, 232-250.

Chatterjee, P., Irmak, C., & Rose, R. L. (2013). The endowment effect as self-enhancement in response to threat. *Journal of Consumer Research, 40*(3), 460-476.

Coughlin, J. (2018, August 12), *Having It All, But Owning None Of It: Welcome To The Rentership Society*. Forbes. https://www.forbes.com/sites/josephcoughlin/2018/08/12/having-it-all-but-owning-none-of-it-welcome-to-the-rentership-society/#1140b871a32a

Eckhardt, G. M., & Bardhi, F. (2015). The sharing economy isn't about sharing at all. *Harvard business review, 28*(1), 2015.

Gandini, A. (2019). Reputation: the fictitious commodity of the sharing economy?. In *Handbook of the Sharing Economy*. Edward Elgar Publishing.

Liu, S. Q., & Mattila, A. S. (2017). Airbnb: Online targeted advertising, sense of power, and consumer decisions. *International Journal of Hospitality Management, 60*, 33–41.

Paulauskaite, D., Powell, R., Coca-Stefaniak, J. A., & Morrison, A. M. (2017). Living like a local: Authentic tourism experiences and the sharing economy. *International Journal of Tourism Research, 19*(6), 619-628.

Peck, J., Barger, V. A., & Webb, A. (2013). In search of a surrogate for touch: The effect of haptic imagery on perceived ownership. *Journal of Consumer Psychology, 23*(2), 189-196.

Peck, J., & Shu, S. B. (2009). The effect of mere touch on perceived ownership. *Journal of consumer Research, 36*(3), 434-447.

Pierce, J. L., Kostova, T., & Dirks, K. T. (2001). Toward a theory of psychological ownership in organizations. *Academy of management review, 26*(2), 298-310.

Reb, Jochen and Terry Connolly (2007), "Possession, Feelings of Ownership, and the Endowment Effect," *Judgment and Decision Making,* 2 (2), 107–14.

Sen, Sankar and Eric J. Johnson (1997), "Mere-Possession Effects without Possession in Consumer Choice," *Journal of Consumer Research, 24* (1), 105–17.

Strahilevitz, M. A., & Loewenstein, G. (1998). The effect of ownership history on the valuation of objects. *Journal of consumer research, 25*(3), 276-289.

Perception of Innovation:
How to Attract Non-Early Adopters to Adopt Earlier

Sarit Moldovan, The Open University of Israel, Israel
Ruth Zwick, Ben-Gurion University, Israel
Liat Hadar, Coller School of Management, Tel Aviv University, Israel

EXTENDED ABSTRACT

Early adopters (EAs) are the first to adopt new products and are highly crucial to the successful diffusion of innovations (Dowling and Midgley 1993; Goldsmith and Flynn 1992; Mahajan, Muller, and Srivastava 1990; Rogers 2003). Much research has explored how to recognize and approach EAs (Bartels and Reinders 2011; Midgley 1987), though EAs consist of only a small fraction of the market (Goldsmith and Flynn 1992; Mahajan, Muller, and Srivastava 1998). In this research we explore several ways in which non-early adopters (non-EAs) may be encouraged to adopt innovative products earlier than they otherwise would have.

EAs often seek innovations whereas non-EAs focus on utilities and avoid risks (Goldenberg, Libai, and Muller 2002; Goldsmith and Flynn 1992; Lambert 1972; Li, Zhang, and Wang 2015). Drawing on findings that consumers with clear preference between products are less likely to be affected by marketing tactics such as adding an undesirable decoy (Huber, Payne, and Puto 2014), we hypothesize that EAs will show innovation preference while non-EAs will show innovation aversion that will be difficult to quell, irrespective of persuasion attempts.

Hypothesis 1: *EAs will show innovation preference whereas non-EAs will show innovation aversion that is difficult to reduce.*

Consumers are four times less likely to adopt a radical than an incremental innovation (Alexander, Lynch, and Wang 2008). However, people have different status quos when it comes to innovations and technology and reference points mark each individual's point of relative gains and losses. Consumers with a lower reference point perceive innovations as incurring a huge cost of learning and investment (Gourville, 2004). We therefore suggest that if we change the reference point, by presenting an even more innovative product, non-EAs will perceive the innovation as relatively less innovative, thus will be less averse to selecting the innovative product.

Hypothesis 2: *Non-EAs innovation aversion will be reduced when the perceived relative product innovativeness is decreased. This will not influence EA adoption intentions.*

We explore these hypotheses in three studies.

Study 1 explored the innovation aversion of non-EAs toward innovative products in the face of a well-known marketing tactic, the *attraction effect* (Huber, Payne, and Puto 1982). 598 Amazon MTuker workers were presented with a tradeoff between two non-innovative products or between a non-innovative and an innovative product. Each set included a dominated product aimed at increasing the choice share of the target product. Consistent with H1, a logistic regression revealed a significant *early adoption* by *innovative target* interaction on choice (β = .66, p < .001). In the absence of a highly innovative product in the choice set, the choice share of the dominant option was influenced by the addition of a dominated option for both EAs and non-EAs (EAs: $\chi^2(1)$ = 12.04; non-EAs: $\chi^2(1)$ = 15.43, p's < .001). However, when a highly innovative product was included,

neither EAs nor non-EAs were influenced by the dominated option (EAs: $\chi^2(1)$ =.39; non-EAs: $\chi^2(1)$ =.36, *NS*).

Study 2 (n=159, MTurk) demonstrated that reducing the perceived innovativeness of an innovative product through the presentation of a highly innovative but unavailable phantom option (Scarpi and Pizzi 2013), encourages adoption among non-EAs but does not change EAs' adoption (H2). The presence of the phantom option had a stronger effect on non-EAs, increasing the choice share of the innovative option by 25% ($\chi^2(1)$ = 5.66, p = .017), than on EAs whose choice share of the innovative option increased by 14%, a non-significant increase ($\chi^2(1)$ = 1.72, p = .19). A logistic regression revealed main effects of early adoption (β = .50, p < .001) and of the phantom presence (β = .90, p = .01), but no interaction between them (β =.03, *NS*). Thus, the phantom increased non-EAs' choice share of the innovative product but did not reduce EAs' choice share.

Study 3 influenced product innovativeness by manipulating whether the presentation of the innovative product followed a relatively less or more innovative product. 216 MTurkers were presented with either a *non-innovative* product or a *super-innovative* product, then viewed the innovative target product. Participants indicated their attitude toward the target product (α = .90) and rated their early adoption tendencies (α = .91). There was a significant interaction between early adoption and attitudes toward the target product (β = -.28, p = .048). Non-EAs' attitudes toward the target product significantly increased when primed with a super innovative product (M = 3.61) than when primed with a less innovative product (M = 2.89, $t(211)$ = 2.35; p = .019). This priming did not significantly affect EAs' attitudes $t(211)$ = -.46, p = .648).

Our results confirm that non-EAs hold strong negative attitudes toward innovations (H1). However, when the perceived relative innovativeness of the product was reduced by presenting it next to an even more innovative product, non-EAs report more positive product evaluations and higher choice share, compared to when the innovation is presented next to a less innovative product (H2). This technique of reducing perceived product innovativeness is beneficial to non-EAs while maintaining EAs' interest in the product.

These results have important theoretical and practical implications for the development and marketing of new products. Considering the amount of research conducted on EAs despite their small proportion in the market, and their limited potential influence on non-EAs as suggested by the chasm theory (Tellis and Chandrasekaran 2011; Goldenberg et al. 2002; Libai, Mahajan, Muller 2009; Moore 2014), we suggest that marketers and new product developers should focus on the "continuum" of the product. If non-EAs are made aware that more innovative products exist, even if they are not yet available in the market, their attitudes and choice-likelihood for the target increase. This strategy could potentially attract non-EAs to adopt innovative products earlier, and skip the chasm.

REFERENCES

Alexander, David L., John G. Lynch, and Qing Wang (2008), "As Time Goes by: Do Cold Feet Follow Warm Intentions for Really New versus Incrementally New Products?" Journal of Marketing Research, 45 (3), 71-84.

Bartels, Jos and Machiel J. Reinders (2011), "Consumer Innovativeness and Its Correlates: A Propositional Inventory for Future Research," Journal of Business Research, 64 (6), 601-609.

Dowling, Grahame R., and David F. Midgley (1993), "The Decision Processes of Innovative Communicators and Other Adopters," Marketing Letters, 4 (4), 297-308.

Goldenberg, Jacob, Barak Libai, and Eitan Muller (2002), "Riding the Saddle: How Cross-Market Communications Can Create a Major Slump in Sales," Journal of Marketing, 66 (2), 1-16.

Goldsmith, Ronald, and Leisa R. Flynn (1992), "Identifying Innovators in Consumer Product Markets," European Journal of Marketing, 26 (12), 42-55.

Gourville, John T. (2004), "Why Consumers Don't Buy: The Psychology of New Product Adoption," Harvard Business School Background Note, 504 (November), (Revised April 2004), 1-17.

Huber, Joel, John W. Payne, and Christopher Puto (1982), "Adding Asymmetrically Dominated Alternatives: Violations of Regularity and the Similarity Hypothesis," Journal of Consumer Research, 9 (1), 90-98.

_____ (2014), "Let's Be Honest about the Attraction Effect," Journal of Marketing Research, 51 (4), 520-525.

Lambert, Zarrel V. (1972), "Perceptual Patterns, Information Handling, and Innovativeness," Journal of Marketing Research, 9 (4), 427-431.

Li, Guoxin, Ruijin Zhang, and Chao Wang (2015), "The Role of Product Originality, Usefulness and Motivated Consumer Innovativeness in New Product Adoption Intentions," Journal of Product Innovation Management, 32 (2), 214-223.

Libai, Barak, Vijay Mahajan, and Eitan Muller (2009), "Can You See the Chasm?" Review of Marketing Research, 5 (January), 38-57.

Mahajan, Vijay and Eitan Muller (1998), "When Is It Worthwhile Targeting the Majority Instead of the Innovators in a New Product Launch?" Journal of Marketing Research, 35 (4), 488-495.

Mahajan, Vijay, Eitan Muller, and Rajendra K. Srivastava (1990), "Determination of Adopter Categories by Using Innovation Diffusion Models," Journal of Marketing Research, 27 (1), 37-50.

Midgley, David F. (1987),"A Meta-Analysis of the Diffusion of Innovations Literature", in Advances in Consumer Research, Vol. 14, ed. Melanie Wallendorf and Paul Anderson, Provo, UT: Association for Consumer Research, 204-207.

Moore, Geoffrey A. (2014), *Crossing the Chasm*, 3rd ed, New York, NY: Harper Business.

Rogers, Everett M. (2003), *Diffusion of Innovations*, 5th Ed*, New York, NY: Simon and Schuster.

Scarpi, Daniele and Gabriele Pizzi (2013), "The Impact of Phantom Decoys on Choices and Perceptions," Journal of Behavioral Decision Making, 25 (5), 451-461.

Tellis, Gerard J. and Deepa Chandrasekaran (2012), "Getting a Grip on the Saddle: Chasms or Cycles," Journal of Marketing, *75* (4), 21-34.

Too Much of a Good Thing? How Misaligned Signals of Popularity Diminish Product Appeal

Sarit Moldovan, The Open University of Israel, Israel
Meyrav Shoham, Tel Aviv University, Israel
Yael Steinhart, Coller School of Management, Tel Aviv University, Israel

EXTENDED ABSTRACT

Consumers generally prefer to buy products that were previously adopted and recommended by others, in order to reduce product risk (e.g., Godes and Mayzlin 2004; Hellofs and Jacobson 1999). Product popularity and quality are often inferred from the volume of sales (Banerjee 1992; van Herpen, Pieters, and Zeelenberg 2009) and online reviews (Babić Rosario et al. 2016; Huang and Chen 2006; Park, Lee, and Han 2007). Thus, both of these metrics can serve as indicators of product popularity and appeal, increasing the likelihood that it will be purchased.

Displaying both the volume of sales and the volume of reviews provides consumers with two distinct signals of popularity, which may be aligned with one another (review-sales fit) or misaligned (few/many reviews compared to sales). Previous works suggests that consumers react negatively when faced with non-fit compared with fit situations between purchasing cues or their content and the consumer's state of mind (Hong and Lee 2008; Park and Kim 2008; Steinhart, Mazursky, and Kamins 2013). We expect the different types of non-fit between product popularity signals to lead to different inferences that reduce product appeal.

A low volume of reviews compared to sales should lead consumers to reconsider the product's popularity. People take pleasure in expressing their opinions and prefer to generate positive word of mouth and reviews about their experiences (Babić Rosario, de Valck, and Sotgiu 2020; De Angelis et al. 2012; He, Melumad, and Pham, 2019). Consequently, online reviews tend to be largely positive (e.g., Chevalier and Mayzlin 2006; Kupor and Tormala 2018). We expect consumers to assume that if people who have purchased a product had something nice to say about it, they would do so. Thus, a low volume of reviews compared to sales should decrease perceptions of product popularity and reduce its appeal.

Consumers can also encounter a higher than expected number of reviews. While consumers may typically assume that online reviewers are credible (Schlosser 2011), a relatively high number of reviews compared to sales could undermine this perception. Consumers may assume that some of the reviewers did not actually purchase and consume the product, or that they are linked to the seller (Jiménez and Mendoza 2013) When reviewer credibility is called into question, their opinion should carry less weight (Schlosser 2011). Therefore, a high number of reviews compared to sales should undermine perceptions of reviewer trustworthiness and reduce product appeal.

In sum, we expect consumers to prefer products for which the two signals of popularity – the volume of reviews and the sales volume – are aligned, compared to situations in which the signals are misaligned. This effect is driven by (1) diminished perceptions of product popularity when there are few reviews compared to sales; and (2) reduced reviewer trustworthiness when the there are many reviews compared to sales. Four studies provide support for this effect and the dual paths that drive it.

In Study 1, participants rated a fitness tracker ring more positively when the sales volume and review volume fit ($F_{(2, 390)} = 8.47$, $p < .001$; $M = 5.41$, $SD = 1.16$) compared to when there were few reviews vs. sales ($M = 4.78$, $SD = 1.20$; ($F_{(2, 390)} = 16.36$, $p < .001$) and many reviews vs. sales (M = 5.01, SD = 1.40; $F_{(2, 390)} = 6.86$, $p = .002$). The two non-fit conditions did not differ significantly ($F_{(2, 390)} = 2.15$, $p = .14$).

In Study 2, participants in the fit condition evaluated a book more positively ($M = 5.58$, $SD = 1.12$) compared to those in the non-fit condition (low reviews compared to sales; $M = 5.08$, $SD = 0.93$; $t_{(117)} = 2.62$, $p = .010$). Participants in the fit condition also perceived the book to be more popular ($M = 4.97$, $SD = 1.72$) compared to the non-fit condition ($M = 4.17$, $SD = 1.72$; $t_{(117)} = 2.54$, $p = .013$). Perceived popularity mediated the effect of review-sales fit on product evaluation ($b = .23$, $SE = .10$; 95% CI: .0428 to .4545).

In study 3, evaluations of a jacket were more positive in the fit condition ($M = 5.77$, $SD = 0.94$) than in the non-fit condition (high reviews vs. sales; $M = 5.25$, $SD = 1.20$; $t_{(106)} = 2.50$, $p = .014$). Reviewers were considered more trustworthy when the volume of reviews fit the sales volume ($M = 4.69$, $SD = 1.02$) rather than exceeding it ($M = 3.93$, $SD = 1.59$; $t_{(106)} = 2.94$, $p = .004$), and perceived reviewer trustworthiness mediated the effect of review-sales volume fit on product evaluation ($b = .32$, $SE = .13$; 95% CI: .1002 to .6086).

Study 4 tested both mediation pathways in a single design, and revealed a significant effect of review-sales volume fit on evaluations of a book ($F_{(2, 328)} = 9.38$, $p < .001$). Evaluations were higher in the fit condition ($M = 5.68$, $SD = .95$) compared to both the low reviews vs. sales condition ($M = 5.25$, $SD = 1.00$; $F_{(1, 328)} = 9.58$, $p = .001$) and the high reviews vs. sales condition ($M = 5.05$, $SD = 1.33$; $F_{(1, 328)} = 19.73$, $p < .001$). The high and low non-fit conditions did not differ significantly ($F_{(1, 328)} = 1.80$, $p = .18$). The effects were mediated by perceived popularity and perceived trustworthiness, respectively.

Higher sales and more reviews are known to heighten product appeal. We explored what happens when these two indicators of product popularity are misaligned, and show that this lack of fit can diminish product appeal. The effect is driven by different inferences based on the type of non-fit: a low volume of reviews compared sales may lead to a perception that people who bought the product were not sufficiently impressed with it to recommend it to others, while a high volume of reviews compared to sales lowers reviewer credibility. Our research provides a demonstration of the potential downsides of using multiple indicators of popularity to guide consumer decision-making, and points to the need for a more precise approach.

REFERENCES

Babić Rosario, Ana, Kristine de Valck, and Francesca Sotgiu (2020), "Conceptualizing the electronic word-of-mouth process: What we know and need to know about eWOM creation, exposure, and evaluation," *Journal of the Academy of Marketing Science*, *48*(3), 422-448.

Babić Rosario, Ana, Francesca Sotgiu, Kristine De Valck, and Tammo H. A. Bijmolt (2016), "The Effect of Electronic Word of Mouth on Sales: A Meta-Analytic Review of Platform, Product, and Metric Factors," *Journal of Marketing Research*, *53*(3), 297–318.

Banerjee, Abhijit V. (1992), "A Simple Model of Herd Behavior," *The Quarterly Journal of Economics*, *107* (3), 797-817.

Chevalier, Judith A., and Dina Mayzlin (2006), "The Effect of Word of Mouth on Sales: Online Book Reviews," *Journal of Marketing Research*, *43*(3), 345–354.

De Angelis, Matteo, Andrea Bonezzi, Alessandro M. Peluso, Derek D. Rucker, and Michele Costabile (2012), "On Braggarts and Gossips: A Self-Enhancement Account of Word-of-Mouth Generation and Transmission," *Journal of Marketing Research*, *49*(4), 551–563.

Godes, David, and Dina Mayzlin (2004), "Using Online Conversations to Study Word-of-Mouth Communication," *Marketing Science*, *23*(4), 545-560.

He, Daniel, Shiri Melumad, and Michel Tuan Pham (2019), "The Pleasure of Assessing and Expressing Our Likes and Dislikes," *Journal of Consumer Research*, *46*(3), 545-563.

Hellofs, Linda L., and Robert Jacobson (1999), "Market Share and Customers' Perceptions of Quality: When can Firms Grow their Way to Higher versus Lower Quality?," *Journal of Marketing, 63*(1), 16-25.

Huang, Jen-Hung, and Yi-Fen Chen (2006), "Herding in Online Product Choice," *Psychology & Marketing, 23*(5), 413–28.

Jiménez, Fernando R., and Norma A. Mendoza (2013), "Too Popular to Ignore: The Influence of Online Reviews on Purchase Intentions of Search and Experience Products." *Journal of Interactive Marketing*, *27*(3), 226–35.

Kupor, Daniella, and Zakary Tormala (2018), "When moderation fosters persuasion: The persuasive power of deviatory reviews," *Journal of Consumer Research, 45* (3), 490-510.

Park, Do-Hyung, and Sara Kim (2008), "The Effects of Consumer Knowledge on Message Processing of Electronic Word-of-Mouth via Online Consumer Reviews," *Electronic commerce research and applications, 7*(4), 399-410.

Park, Do-Hyung., Jumin Lee, and Ingoo Han (2007), "The Effect of On-line Consumer Reviews on Consumer Purchasing Intention: The Moderating Role of Involvement," *International Journal of Electronic Commerce, 11*(4), 125–48.

Schlosser, Ann E. (2011), "Can Including Pros and Cons Increase the Helpfulness and Persuasiveness of Online Reviews? The Interactive Effects of Ratings and Arguments," *Journal of Consumer Psychology, 21*(3), 226–39.

Steinhart, Yael, David Mazursky, and Michael A. Kamins (2013), "The 'Temporal-Processing-Fit Effect': The Interplay between Regulatory State, Temporal Distance, and Construal Levels," *Social Cognition*, *31*(3), 315-335.

Van Herpen, Erica, Rik Pieters, and Marcel Zeelenberg (2009), "When demand accelerates demand: Trailing the bandwagon," *Journal of Consumer Psychology, 19*(3), 302-312.

Examining Online Review Posting Preferences

Jana Möller, Freie Universität Berlin, Germany
Sabrina Gottschalk, City, University of London, UK
Alexander Mafael, Stockholm School of Economics, Sweden

EXTENDED ABSTRACT

Most consumers consult online reviews, yet, only few consumers generate review content (Sun et al. 2014). Given the managerial importance of review rating systems, this research examines review posters. Specifically, we contrast the behavior of frequent posters with less frequent posters.

Prior research indicates that frequent and infrequent review posters differ in how they respond to previously posted content (Schlosser 2005). Frequent posters exhibit more differentiation behavior (Moe and Schweidel 2012). A review environment may thus appear more or less attractive for posting one's opinion, depending on one's posting frequency and to what extent previous ratings signal that a reviewer's opinion belongs to the minority.

In many social contexts, learning that one holds a minority opinion evokes perceptions of social risk (Asch, 1956). Social risk perceptions are often salient in online environments such as review platforms and decrease opinion voicing (Eisingerich et al. 2015).

In the context of reviews, we assume that perceiving one's opinion to belong to the minority will decrease intention to post because of social risk perceptions. However, this should only hold for infrequent posters. Frequent posters care less about fitting in with the 'crowd' (Sunder, Kim, and Yorkston 2019) and more about making their opinion visible and different (Moe & Schweidel 2012). Voicing a deviant opinion serves differentiation (Tuk et al. 2019), hence, we suggest:

Hypothesis 1:   *Frequent (vs. infrequent) online review posters are more intent to post a review when their opinion belongs to the minority (vs. majority) of previously posted ratings.*

Hypothesis 2:   *This effect emerges because frequent (vs. infrequent) online review posters have lower (higher) social risk perceptions when they hold a minority opinion.*

We expect a product's identity-relevance (Berger & Heath, 2007) to magnify these differences. Identity-signaling can be achieved through articulating WoM about products (Berger 2014). For frequent posters, a situation that entails both, holding a minority opinion and an identity-relevant product, should be attractive because it enables them to stand out from the crowd. For infrequent posters, the pressure of being in the minority should increase if this product is used to infer identity.

Hypothesis 3:   *The intention of frequent (vs. infrequent) online review posters to post a review when their opinion belongs to the minority of previously posted ratings is greater (vs. lower) when the product is identity-relevant.*

In Study 1 (N=382, MTurk) respondents participated in a 2 (average rating: positive vs. negative) x 2 (own product experience: positive vs. negative) x 2 (rating dispersion: high vs. low) between-subjects online experiment. Respondents recalled their last online purchase and evaluated the product (1 = very poor to 10 = very good). Next, respondents read that other consumers had rated the product and were shown a positive or negative average rating with high or low rating dispersion. Next, respondents indicated their intention to post a product review (1 = not at all likely to 7 = very likely), the perceived valence of the "average rating" stimulus, their opinion perception (1= my opinion reflects the majority of opinions, 9 = my opinion reflects the minority of opinions), their review posting frequency (1 = never to 7 = always), and control variables. A moderation analysis (PROCESS model 1, 5000 bootstrap samples, heteroscedasticity-consistent inference parameters) with posting frequency (IV), opinion perception (moderator), and review posting intention (DV) was conducted. A significant interaction between posting frequency and opinion perception emerged (b=-.05, SE=.02, CI95 [-.09, -.01], supporting H1. With increasing levels of posting frequency, the effect on intent to post a review was stronger when participants perceived their opinion to be in the minority ($b_{minority}$=.58, SE=.08, CI95 [.43, .73]; $b_{majority}$=.37, SE=.07, CI95 [.23, .51]). The inclusion of the valence of respondents' product experience and dispersion did not reveal any significant main or interaction effects (-.43 < t's < 1.2, p's > .25).

In Study 2 (N=201, Prolific) we first asked respondents in an online study to recall their last Amazon.com purchase that resulted in a positive product experience and to evaluate the product (1 = very poor to 5 = very good). Next, respondents were exposed to an average customer rating of the product (2 out of 5 stars), which put the respondent's evaluation in relation to previous ratings. Next, respondents rated their review posting intention, their opinion perception, their perceived social risk of posting a review (α = .89, adapted from Eisingerich et al., 2015), and control questions. A PROCESS model 7 (5000 bootstrap samples, robust standard errors) revealed a significant indirect effect of posting frequency on intention to post mediated by social risk. In line with H2, social risk perception mediated the relationship between posting frequency and intention to post, but only at low levels of opinion perception (i.e., when respondents perceived their own opinion to be in the minority, b=.05, SE = .02, CI95 [.01; .09]), and medium levels (b=.03, SE=.02, CI95 [.01, .07]).

Study 3 was identical to Study 1, except that respondents (N=251, MTurk) were given an actual writing task. Respondends chose between writing a short account of an average weekday or a short product review. We measured identity relevance with a 1-7 scale (α = .82, adapted from Berger and Heath, 2007). A binary logistic regression (PROCESS model 3) with choice of writing task (1 = review, 0 = average weekday, DV), participant's opinion perception (IV), and posting frequency and identity relevance as moderators supported H3. For frequent posters, being in the majority decreases the probability to write a review if the product is identity-relevant (β = -.27, p = .09), whereas for infrequent posters, the probability increases (β = .28, p = .06).

Overall, we extend prior literature in three important ways. First, we contribute to a better understanding of review writers and empirically show that frequent and infrequent reviewers differ regarding their posting decisions in specific review environments. Second, we add to research on reviewer motivations and show differing social risk perceptions as a driver of posting behavior in opinion settings for frequent and infrequent reviewers. Third, we argue that a product's identity relevance moderates consumers' decision to post a review.

REFERENCES

Asch, S. E. (1956). Studies of independence and conformity: A minority of one against a unanimous majority. *Psychological Monographs*, 70, 9.

Berger, J. (2014). Word of mouth and interpersonal communication: A review and directions for future research. *Journal of Consumer Psychology*, 24, 4, 586-607.

Berger, J., & Heath, C. (2007). Where consumers diverge from others: Identity signalling and product domains. *Journal of Consumer Research*, 34, 2, 121-134.

Eisingerich, A. B., Chun, H. H., Liu, Y., Jia, H., & Bell, S. J. (2015). Why recommend a brand face-to-face but not on Facebook? How word-of-mouth on online social sites differs from traditional word-of-mouth. *Journal of Consumer Psychology*, 25(1), 120-128.

Moe, W. W. & Schweidel, D. A. (2012). Online product opinions: Incidence, evaluation, and evolution. *Marketing Science*, 31, 3, 372-386.

Schlosser, A. E. (2005). Posting versus Lurking: Communicating in a Multiple Audience Context. *Journal of Consumer Research* 32, (2), 260-265.

Sun, N., Rau, P. P. L., & Ma, L. (2014). Understanding lurkers in online communities: A literature review. *Computers in Human Behavior*, 38, 110-117.

Tuk, M. A., Verlegh, P. W., Smidts, A., & Wigboldus, D. H. (2019). You and I have nothing in common: The role of dissimilarity in interpersonal influence. *Organizational Behavior and Human Decision Processes*, 151, 49-60.

Experiential versus Analytical Price Evaluations

Arnaud Monnier, Cornell University, USA
Manoj Thomas, Cornell University, USA

EXTENDED ABSTRACT

This research uncovers subtle quantity framing effects that affect whether price evaluations will be relatively more experiential or more analytical. We propose and show that price evaluations are more experiential when *visual units* are used to describe quantity (e.g., 12 snack bags of chips), and more analytical when *standardized units* of measurement are used (e.g., 12 oz. of chips).

A large body of work has shown that stimuli can be processed in a more or less visualizable manner (see MacInnis and Price 1987; Paivio 1990). Dual Coding Theory (Paivio 1990) suggests that two distinct but interconnected systems form the basis of human cognition: a perceptual, non-verbal system that relies on sensorimotor imagery to mentally represent stimuli in a visualizable manner, and a conceptual, verbal system that relies on semantic knowledge to process stimuli in a less visualizable manner. This theory is supported by neuroscience showing that visualizable and non-visualizable stimuli activate different neural circuits (Montefinese 2019). We therefore posit that *standardized units* (e.g., bags, bars) induce more *analytical processing* by mobilizing the conceptual neural circuitry, while *visual units* induce more *experiential processing* by mobilizing the sensorimotor system. Because experiential evaluations are generally more positive (Adaval and Wyer 1998), visual units improve price evaluations.

In study 1, we start with a marketplace investigation examining whether retailers charge higher price-per-unit for products that are described using visual units. We collected price data on Amazon.com. Independent coders coded whether the top 100 bestsellers of 15 categories used either visual or standardized units to describe quantity. We ended up with a total of 1,389 observations (708 visual and 681 standardized units). We regressed price-per-unit (log) on unit type with two covariates, product weight in ounces (log), and sales ranking (log). We found an effect of unit type, $b = .50$, $p < .001$, such that price-per-unit was higher when visual (vs. standardized) units were used (model-free means: M_{visual} = \$.90 per oz., $M_{standardized}$ = \$.66 per oz.). Unsurprisingly, price-per-unit decreased when weight increased ($b = -.47$, $p < .001$), and price-per-unit increased when ranking increased ($b = .12$, $p < .001$). These results suggest that retailers charge a higher price for products described with visual units. Of course, this study suffers from the limitation that causality cannot be inferred. The controlled experiments that follow aim to address this.

Study 2 ($n = 253$) tests whether visual units improve price evaluations, and whether the effect is moderated by numeracy skills. If visual units facilitate computations, then the effect should be stronger for low-numeracy individuals. Otherwise, this would suggest that visual units improve price evaluation through a more experiential process. We manipulated unit type between participants (with three replicates within). Our stimuli used product presentations that are used on Amazon.com (i.e., with picture and full description). We only manipulated whether the product label depicted quantity in a visual (e.g., Lay's Classic Potato Chips, 12 Singles) or standardized unit (e.g., Lay's Classic Potato Chips, 12 Ounce). We measured price evaluation with three items (e.g., "This pack offers a good value for money"), collected a measure of description informativeness, and administered the abbreviated numeracy scale (Weller et al. 2013). We found an effect of unit type, $F(1, 249) = 7.75$, $p = .006$, such that price evaluations were higher in the visual unit condition (M_{visual}

= 4.93 vs. $M_{standardized}$ = 4.55). We found no effect of numeracy, $F(1, 249) = .16$, $p = .69$, and no interaction between numeracy and unit type, $F(1, 249) = 1.85$, $p = .18$. These results held when controlling for informativeness.

Study 3 ($n = 152$) examines the influence of affective (e.g., brand liking) and analytical (e.g., price sensitivity) processes. We used six real brands as stimuli, with unit and replicate manipulated within participants, and brand liking measured. Therefore, each respondent saw each product twice in a random order (i.e., 12 price evaluations per participant). Price was kept constant across conditions, but varied across replicates. We ran a repeated-measures regression with five predictors: unit type, mean-centered brand liking, the interaction of brand liking and unit type, mean-centered price, and the interaction of price and unit type. We found again a significant effect of unit type, $b = .21$, $p < .001$, and a positive effect of brand liking, $b = .27$, $p < .001$. Importantly, we found a significant interaction between unit type and brand liking, $b = .08$, $p = .050$, such that visual units increased the positive effect of brand liking. We also found a significant negative effect of price magnitude, $b = -.13$, $p < .001$. More importantly, we found an interaction between price and unit type, $b = .07$, $p < .001$, such that visual units reduced the negative effect of price magnitude on price evaluation.

Study 4 ($n = 147$) further tests the association between visual units and feelings using an Implicit Association Test (IAT, Greenwald, McGhee, & Schwartz, 1998). Participants were exposed to words one at a time and asked to categorize them into one of two categories as fast as they could. Seven words or expressions were used for each category: feelings (e.g., happy, delighted), calculation (e.g., addition, subtraction), visual units (e.g., 6 bags of chips), standardized units (e.g., 6 oz. of chips). In congruent (incongruent) trials, the category "visual units" appeared on the same side as the category "feelings" ("calculation"), and the category "standardized units" appeared on the same side as the category "calculation" ("feelings"). We found a robust effect of trial type, such that response time was shorter for congruent trials ($M_{congruent}$ = 898 ms, $M_{incongruent}$ = 1047 ms), $F(1, 142) = 113.50$, $p < .001$. This suggests that visual units are more associated with feelings than standardized units.

This research illuminates under which conditions experiential and analytical processes are relatively more relied upon in the context of price-quantity judgments. We contribute to behavioral pricing research by identifying a subtle framing effect that violates the assumption of description invariance in value judgments. This research also characterizes how managers can subtly alter quantity descriptions to improve perceived value.

REFERENCES

Adaval, Rashmi, and Robert S. Wyer Jr (1998), "The Role of Narratives in Consumer Information Processing," *Journal of Consumer Psychology, 7* (3), 207-245.

Greenwald, Anthony G., Debbie E. McGhee, and Jordan LK Schwartz (1998), "Measuring Individual Differences in Implicit Cognition: The Implicit Association Test." *Journal of Personality and Social Psychology,* 74 (6), 1464.

MacInnis, Deborah J., and Linda L. Price (1987), "The Role of Imagery in Information Processing: Review and Extensions," *Journal of Consumer Research,* 13 (4), 473-491.

Montefinese, Maria (2019), "Semantic Representation of Abstract and Concrete Words: A Minireview of Neural Evidence," *Journal of Neurophysiology,* 121 (5), 1585-1587.

Paivio, Allan (1990), *Mental Representations: A Dual Coding Approach,* Oxford University Press.

Weller, Joshua A., Nathan F. Dieckmann, Martin Tusler, C. K. Mertz, William J. Burns, and Ellen Peters (2013), "Development and Testing of an Abbreviated Numeracy Scale: A Rasch Analysis Approach," *Journal of Behavioral Decision Making,* 26 (2), 198-212.

Consumers' Resistance to the Adoption of Smart Objects: A Relational Perspective

Luigi Monsurrò, Sapienza University of Rome, Italy
Ilaria Querci, Sapienza University of Rome, Italy
Paolo Peverini, Luiss University, Italy
Simona Romani, Luiss University, Italy

EXTENDED ABSTRACT

Despite the emerging attention and the great market potential of Smart Objects (SOs), consumers' adoption of these innovative products is still limited (Kranz 2019). The underlying reason for this is the presence of specific barriers preventing consumers to finalize the purchase: functional (barriers that refer to innovation features), psychological, and individual (those that refer to consumer features) (Mani and Chouk 2018). However, in the SO context, this perspective about resistance is not completely accurate because it neglects SOs' human-like characteristics and their implications, one of which is the fact that SOs can be considered as a part of a close and intimate relationship with the user. This relationship can be referenced as an interpersonal one (Novak and Hoffman 2019). Looking at interpersonal relationship literature, this can entail a dark side: People can be reluctant to start a relationship which entails intimacy because it exposes the individual to certain threats (Reis 1990). So we argue that, as it happens in the interpersonal domain, consumers can be interested in SOs but resistant to adopting them because of the threat of a potential intimate relationship. In this context, a new barrier may emerge: the relational one. This study aims at understanding what are the threats that consumers associate to a possible relationship with a SO, and what kind of fears follow these threats, preventing consumers from entering into a relationship with a SO.

To accomplish the objective of this study, we adopted a qualitative approach based on in-depth individual interviews utilizing the Zaltman Metaphor Elicitation Technique (ZMET) (Zaltman and Coulter 1995). Given the specificity of the research topic, we selected respondents based on a convenience sampling procedure. We selected respondents (N=33) who were sufficiently aware about SOs to be able to consider them as potential partners, and who didn't own any SOs apart from the traditional ones (i.e., smartphone, laptop, and tablet). Interview transcripts were coded in three phases, using the open-coding technique of the grounded theory (Corbin and Strauss 1990). Images played a supporting role helping researchers delve into respondents' words. From the coding, four fears and four respective negative SO social roles emerged: Fear of Being Controlled (SO as a Stalker); Fear of Being Dominated (SO as a Captor); Fear of Being Subordinated (SO as a Master); Fear of Losing Self Control (SO as a Seducer). To report these findings, we created for each fear a persona which narration exemplifies the threats reported by the respondents. Fears, main threats, threat features, interview quotes, and SO social roles are reported in table 1.

Fred feels the Fear of Being Controlled, which is mostly about privacy. Fred thinks that the SO would be constantly observing him. This makes Fred feel exposed to several risks (e.g., hacker attacks, blackmails, or intrusive marketing communication) and influences how he behaves toward his loved ones. The SO is perceived as intrusive, omniscient, and mysterious. Fred does not know what to expect from this relationship since it is characterized by information asymmetry in which Fred is the weakest entity. The characteristics of both the SO and the relationship Fred imagines fit with the characteristics of a specific interpersonal relationship: the stalking relationship (Spitzberg 2002). It follows that, the SO plays the role of the stalker.

Rachel feels the Fear of Being Dominated. She thinks that using a SO can threaten her, both psychologically (e.g., losing autonomy or feeling replaced) and physically (e.g., radiation exposure or being trapped in a smart home due to a blackout). The SO, which is part of the unstoppable process of technological development, is a dominant and violent partner which makes Rachel feel impotent. The characteristics of both the SO and the relationship Rachel imagines fit with the characteristics of a specific interpersonal relationship which is treated in the kidnapping literature (Giebels, Noelanders, and Vervaeke 2005): the captor-hostage relationship. It follows that, the SO plays the role of captor.

Tracy feels the Fear of Being Subordinated. She is concerned mostly about the physical closeness with SOs, especially wearables. She feels that she has no say in whether or not the SO can reach her by sending notifications (e.g., e-mails or deadline reminders). The SO is agentic and its behavior is perceived as annoying rather than authoritative. Tracy, instead, feels frustration, loss of control, and loss of autonomy (i.e., she fears ending up in a situation where her behavior is based on SO notifications). The characteristics of both the SO and the relationship Tracy imagines fit with the characteristics of a specific interpersonal relationship: the master-servant relationship (Coser 1973). Therefore, the SO plays the role of the master.

Finally, Larry feels the Fear of Losing Self Control. He thinks SOs are useful and fascinating to the point that he fears he would start to compulsively use them, thereby losing autonomy, health, and restricting social interactions. In Larry's eyes the relationship is pathological and he cannot opt out: Larry fears becoming dependent on the SO. The characteristics of the SO and the relationship Larry imagines fit with the characteristics of the interpersonal relationship that exists between a person and his seducer which is treated in seduction literature (Greene 2001). It follows that, the SO plays the role of the seducer.

This work contributes to the literature on barriers preventing the adoption of SOs. We examined the relational dynamics that can lead to resistance. The social roles attributed to the SO are a threat, eliciting fears, and can eventually represent a new barrier: the relational barrier.

This work also contributes to the consumer-SO relationship literature identifying four new negative social roles, all additionally validated by the comparison with their corresponding literature on interpersonal relationships. From a managerial point of view, the work suggests some interesting insights about the impact of SOs on potential customers, such as a loss of autonomy, privacy, freedom, and, in general, the backfire effect of anthropomorphism. Indeed, understanding consumer fears and their features can help managers to adjust product design and communication strategy in order to prevent the perception of threats.

REFERENCES

Corbin, Juliet M. and Anselm Strauss (1990), "Grounded theory research: Procedures, canons, and evaluative criteria," *Qualitative sociology*, 13 (March), 3-21.

Coser, Lewis A. (1973), "Servants: The obsolescence of an occupational role," *Social Forces*, 52 (September), 31-40.

Giebels, Ellen, Sigrid Noelanders, and Geert Vervaeke (2005), "The hostage experience: Implications for negotiation strategies," *Clinical Psychology & Psychotherapy: An International Journal of Theory & Practice,* 12 (May), 241-53.

Greene, Robert (2001), *The Art of Seduction*, New York: Viking.

Mani, Zied and Inès Chouk (2018), "Consumer Resistance to Innovation in Services: Challenges and Barriers in the Internet of Things Era," *Journal of Product Innovation Management,* 35 (September), 780–807.

Novak, Thomas P. and Donna L. Hoffman (2019), "Relationship journeys in the internet of things: a new framework for understanding interactions between consumers and smart objects," *Journal of the Academy of Marketing Science,* 47 (March), 216-37.

Reis, Harry T. (1990), "The role of intimacy in interpersonal relations," *Journal of Social and Clinical Psychology*, 9 (March), 15-30.

Spitzberg, Brian H. (2002), "The tactical topography of stalking victimization and management," *Trauma, Violence, & Abuse*, 3 (October), 261-88.

Zaltman, Gerald and Robin H. Coulter (1995), "Seeing the Voice of the Customer: Metaphor-Based Advertising Research," *Journal of advertising research,* 35 (4), 35-51.

"I am not an Average Woman of my Age": Wearable Technology and Daily Practices of the Mature Consumers in Finland and Russia

Daria Morozova, Aalborg University, Denmark
Olga Gurova, Aalborg University, Denmark

EXTENDED ABSTRACT

Wearable technologies, also referred to as wearables, are blend of technology and design, when electronics, sensors and computers are incorporated into clothing, jewelry and accessories that are worn on one's body (Wright and Keith, 2014; Seymour, 2008). So far, smartwatches and fitness trackers have been the most popular wearables among consumers (IDC, 2019) and also as an object of academic research on consumption (for instance, Nascimento et al. 2018, Jung et al. 2016). Thanks to their function of carrying out measurements, these wearables offer potential for improving the wellbeing of different population groups, including ageing people (Buchem et al. 2015). Unlike many other pieces of research that approach wearables with the Technology Acceptance Model (e.g. Choi and Kim 2016, Dutot et al. 2019), we adopt the practice theory framework for scrutinizing relation between personal wellbeing and use of wearable technology.

The research question that we pose is how the use of smartwatch and fitness trackers is connected to wellbeing of users 50+ in Russia and Finland. By wellbeing, we mean "good life" (see Liu et al. 2017), achieved through satisfying specific needs, participating in specific activities and attaining needed resources (e.g. Nieboer et al. 2005, Lindenberg 1996). This includes, in addition to physical and subjective qualities such as health and income, more subtle and subjective qualities as feeling of acceptance by others, access to social ties and having hobbies (Liu et al. 2017, Lindenberg 1996). We are also interested in differences and similarities in usage of wearables between Russian and Finnish 50+ consumers.

The 50+ segment is considered worth studying because these consumers have often suffered from ageism (Holliday et al. 2015, Ahmad 2002), are considered ill-equipped for adopting new technologies (Lee and Lyu 2019) or regarded as particularly vulnerable, though these assumptions are not necessarily true (e.g. Berg 2015). Russia and Finland are chosen as two contrasting contexts regarding possibilities for employment, sufficient medical help, and independent living for an ageing population (e.g. Eurostat 2020, Kolev and Paskal 2002). However, nowadays, a neo-liberal discourse that emphasizes self-reliance and self-responsibility over one's life and health instead of relying on welfare state has been gaining popularity in both countries (e.g. Pulkki and Tynkkynen 2016, Chudakova 2016).

Drawing on the practice theory (Shatzki 1996, Reckwitz 2002, Shove et al. 2012), we conceptualize a wearable device as an integrated part of different daily practices. This way, both ageing and wellbeing are not pre-given, but co-evolving when users of wearables engage in situated practices (e.g. Gherardi 2012: 20). We assume that the new device may alter the way these consumers perceive themselves, ageing and wellbeing. Since our perspective differs from a more traditional chronological approach, we hope to answer a call for a different perspective on ageing (see Zniva and Weitzl, 2016: 290).

We collected 17 semi-structured interviews (nine people from Finland and eight from Russia) with nine men and eight women aged between 50 and 73. The shortest period of owning and using a smartwatch/fitness tracker was four months, while the longest was over three years. The devices used by the interviewees were manufactured by Samsung, Apple, Garmin, Fitbit, Polar, Suunto and other less-known brands. The functions of the devices were relatively similar to each other.

According to our results, the practices featuring the smartwatch or fitness tracker are similar among Russian and Finnish consumers, and range from dietary and health (measuring calories and sleeping hours) to experience- and culture-related (keeping an audio diary, listening to audiobooks). However, we argue that the users 50+ in Finland and Russia differ in a way they see themselves in comparison to other people of their age thanks to their wearable devices. In Russian case, this possession can signal one's social distance from an "average" older person and thus becomes a distinctive mark within the age group. In contrast, Finnish interviewees regard their wearables as a "normal" part of the daily life of an ageing individual.

Further, the results of this research suggest that a wearable device holds potential to improve not just physical activeness of an ageing individual, but also other aspects important for their wellbeing. Thanks to the practices with the smartwatch or fitness tracker, our interviewees are able to enhance interactions with others, to avoid stigma of old age, and to maintain continuity between their practices. Specifically, the device allows staying connected when a smartphone is out of reach. Also, the wearable might help engage other people into different activities that it measures, for example, walking or doing sports together. These practices have a potential to enhance one's feeling of togetherness (Nyman et al., 2012) that is paramount for mental health and prevention of depression, especially among ageing individuals.

Since the wearable measures health-related parameters discreetly (compared to a larger blood pressure meter with a sleeve), it helps sustain "the image of normality by following the rules" in everyday situations (Misztal 2001: 317) as it does not put additional emphasis on one's physical condition connected to ageing. Next, thanks to visualization of data by the wearable, the interviewees are able to distinguish between different patterns of their practices, recognize disturbing patterns (such as lack of sleep or over-training) (see also Zhou et al. 2018), and make adjustment in the future routine. Since these characteristics are part of wellbeing, by keeping them in control, one can ensure more efficient handling of their wellbeing. Additionally, some participants regard Apple devices as conspicuous products with high symbolic value (Veblen [1899] 1994) that increase one's perceived self-esteem (Jaikumar et al. 2018).

As for practical implications, we focus on what happens after a wearable is purchased; therefore, designers, engineers and marketing professionals can gain insights from our analysis of using wearables in real life situations. Finally, policy makers can use our findings on the wellbeing of ageing groups for improving social policy.

REFERENCES

Ahmad, Rizal (2002), "The older or ageing consumers in the UK: are they really that different," *International Journal of Marketing Research*, 44 (3), 337-362.

Berg, Lisbet (2015), "Consumer vulnerability: are older people more vulnerable as consumers than others?" *International Journal of Consumer Studies*, 39 (March), 284-293.

Buchem, Ilona, Agathe Merceron, Joern Kreutel, Marten Haesner, and Anika Steinert A (2015), "Gamification designs in Wearable Enhanced Learning for healthy ageing," in *International Conference on Interactive Mobile Communication Technologies and Learning* (IMCL), Thessaloniki, Greece, 19 – 20 November 2015.

Chudakova, Tatiana (2016), "Caring for Strangers: Ageing, Traditional Medicine, and Collective Self-care in Post-socialist Russia," *Medical Anthropology Quarterly*, 31 (January), 78-96.

Dutot, Vincent, Veera Bhatiasevi, and Nadim Bellallahom (2019), "Applying the technology acceptance model in a three-countries study of smartwatch adoption," *Journal of High Technology Management Research*, 30 (May), 1–14.

Eurostat (2020), "Life expectancy by age and sex," http://appsso.eurostat.ec.europa.eu/nui/show.do

Gherardi, Silvia (2012), *How to conduct a practice-based study. Problems and Methods,* Cheltenham, UK.

Holliday, Nikki, Gillian Ward, and Simon Fielden (2015), "Understanding younger older consumers' needs in a changing healthcare market – supporting and developing the consumer market for electronic assisted living technologies," *Journal of Consumer Studies*, 39 (April), 305 –315.

IDC (2019), "Worldwide Quarterly Wearable Device Tracker," https://www.idc.com/getdoc.jsp?containerId=prUS45712619

Jaikumar, Saravana, Singh Ramendra, and Sarin Ankur (2018), "I show off, so I am well off": Subjective economic well-being and conspicuous consumption in an emerging economy," *Journal of Business Research* 86 (May), 386-393.

Jung, Yoonhyuk, Seongcheol Kim, and Boreum Choi (2016), "Consumer Valuation of the Wearables: The Case of Smartwatches," *Computers in Human Behavior*, 63 (October), 899–905.

Kolev, Alexandre, and Anne Pascal (2003), "What keeps pensioners at work in Russia? Evidence from Household Panel Data," *Economics of Transition and Institutional Change*, 10 (January).

Lee, Hyun-Joo, and Jewon Lyu (2019), "Exploring factors which motivate older consumers' self-service technologies (SSTs) adoption," *The International Review of Retail, Distribution and Consumer Research*, 29 (February).

Lindenberg, Siegwart (1996), "Continuities in the theory of social production functions," in *Verklarende Sociologie: Opstellen Voor Reinhard Wippler,* ed. Ganzeboom H. and S. Lindenberg, Amsterdam: The Netherlands.

Misztal, Barbara A. (2001), "Normality and Trust in Goffman's Theory of Interaction Order," *Sociological Theory*, 19 (December), 312-324.

Nascimento, Bruno, Tiago Oliveira, and Carlos Tam (2018), "Wearable technology: What explains continuance intention in smartwatches?" *Journal of Retailing and Consumer Services*, 43 (July), 157–169.

Nieboer, Anna, Siegward Lindenberg, Anne Boomsma, and Alinda C. van Bruggen (2005), "Dimensions of well-being and their measurement: The Spf-Il scale," *Social Indicators Research*, 73, 313–353.

Nyman, Anneli, Staffan Josephsson, and Gunilla Isaksson (2012), "Being part of an enacted togetherness: Narratives of elderly people with depression," *Journal of aging studies*, 26 (December), 410-418.

Pulkki, Jutta, and Liina-Kaisa Tynkkynen (2016), "All elderly people have important service needs: A study of discourses on older people in parliamentary discussions in Finland," *Ageing and Society*, 36 (January), 64-78.

Reckwitz, Andreas (2002), "Toward a theory of social practices: a development in culturalist theorizing," *European Journal of Social Theory*, 5 (2), 243–263.

Schatzki, Theodore R. (1996), *Social Practices: A Wittgensteinian approach to human activity and the social,* Cambridge: Cambridge University Press.

Seymour, Sabine (2008), *Fashionable technology: The intersection of design, fashion, science, and technology,* NY: Springer Vienna Architecture.

Shove, Elisabeth, Mika Pantzar, and Matt Watson (2012), *The dynamics of social practice,* SAGE: London.

Veblen, Thorstein (1899/1994), *The theory of the leisure class: An economic study of institutions,* London: Unwin Books. Reprinted New York: Dover Publications.

Wright, Robin, and Latrina Keith (2014), "Wearable Technology: If the Tech Fits, Wear It," *Journal of Electronic Resources in Medical Libraries*, 11 (December), 204 – 216.

Zhou, Siyu, Atsushi Ogihara, Shoji Nishimura, and Qun Jin (2018), "Analyzing the changes of health condition and social capital of elderly people using wearable devices," *Health Information Science and Systems*, 6 (4).

Zniva, Robert, and Wolfgang Weitzl (2016), "It's not how old you are but how you are old: A review on aging and consumer behavior," *Management Review Quarterly*, 66 (January), 267–297.

This Way Up: The Effectiveness of Mobile Vertical Video Marketing

Lana Mulier, Ghent University, Belgium
Hendrik Slabbinck, Ghent University, Belgium
Iris Vermeir, Ghent University, Belgium

EXTENDED ABSTRACT

Today's mobile environment currently experiences a vertical video revolution. The new portrait or vertical screen format is replacing the traditional landscape or horizontal format to become the default for mobile video content (Williams 2019). A vertical video is intended for viewing in portrait mode on full-screen. Until recently, vertical videos were considered unusual, amateur, unpleasing, and wrong, because they violate technical video standards and the laws of nature on human sight, as we see the world in a horizontal panorama (Ryan 2018). Accordingly, horizontal displays should be easier to process than vertical displays (Deng et al. 2016).

However, smartphones were designed to be held vertically (Canella 2017). Mobile users hold their phones upright 94% of the time (ScientiaMobile 2017). This native upright mobile screen position stimulated vertical video content, which is attractive for mobile users because they can shoot and consume videos without rotating their phone 90 degrees (Jabbari 2017). Less than 30% of mobile users turn their smartphones to watch horizontal videos; and when they do, they view only 14% of the content (Martin 2017).

These changes in the mobile video environment align with mobile becoming the dominant way to consume content (Scott 2017). Smartphones now drive the overall increase in consumers' digital time (McLean et al. 2020), and mobile is the fastest growing venue within digital marketing (Smith 2017). More than 75% of all video viewing is now mobile (Doyle 2018), and mobile video spend is expected to reach $16.2 billion by 2021 (MediaRadar 2017). Therefore, video marketers need to follow mobile trends (Sedej 2019). As business insights predict that mobile vertical videos could yield three times the return of horizontal videos (Martin 2017), companies have started to embrace the vertical video trend. Social media apps Facebook, Instagram, Twitter, and TikTok have vertical video-friendly interfaces, the movie industry explores the tall screen with vertical film festivals, and music artists release vertical videos on Spotify and YouTube. Recently, Samsung has launched the first vertical television (Dent 2019), and mobile streaming application Quibi automatically flips between vertical and horizontal viewing mode when rotating your smartphone (Welch 2020).

Considering this increasing use of vertical videos, an important yet unanswered question is how mobile users respond to this new screen format. Despite extensive research on video marketing and mobile marketing, there is a lack of empirical research on the effectiveness of mobile vertical video marketing. We fill this research gap by examining (1) the effectiveness of mobile vertical video marketing in terms of consumer interest, engagement, and processing fluency, (2) the underlying mechanism of the effort of watching the video advertisement on the smartphone, and (3) the moderating effect of mobile users' age.

Mobile vertical videos are immersive (filling the entire mobile screen), intimate (showing people/places close up), and immediate (easy to record/post; Jabbari 2017; Coppola 2018). Therefore, we propose that mobile vertical (vs. horizontal) video advertisements increase mobile users' interest and engagement (H1). Building on the hedonic marking hypothesis, which argues that items that are processed effortlessly and fluently are judged as more positive and desirable (Winkielman et al., 2003), we further expect that mobile vertical (vs. horizontal) video advertisements take less effort to watch on the smartphone (H2), and increase processing fluency of the video advertisement (H3). We expect a mediation effect of effort for the effect of mobile vertical (vs. horizontal) video ads on processing fluency (H4). Finally, we propose a moderated mediation effect by mobile users' age (H5). Young smartphone owners are more familiar and experienced with watching mobile (vertical) videos than older generations (Canella 2017). Therefore, we expect the indirect effect of mobile vertical (vs. horizontal) video advertisements on processing fluency, through the effort of watching the video advertisement on the smartphone, to be positive for younger mobile users (Generation Z) and negative for older mobile users (Generations X and Y).

Study 1 (N = 2,377), testing H1, was a large-scale field study with real Facebook user data. Using an A/B split test, Facebook mobile users were randomly exposed to a fictive mobile vertical (n = 1,266) or horizontal (n = 1,111) promotional video ad, embedded in a sponsored Facebook newsfeed advertisement. We find that mobile vertical (vs. horizontal) video advertisements generate higher consumer interest (more (full) video plays) and post engagement (more likes, clicks, comments, and shares; ps < .001).

In Study 2 (N = 110, M_{age} = 20.39, ages 17–29), testing H2–H4, participants were recruited in a university campus hall for a short mobile test and were randomly assigned to watch an existing mobile vertical (n = 57) or horizontal (n = 53) video advertisement for Nike (2015). We assessed processing fluency on a two-item, 7-point bipolar scale (Lee & Aaker, 2004), and effort of watching the video on the smartphone on a two-item, 7-point Likert scale. To control for general smartphone usage, we assessed the Smartphone Usage scale (Rosen et al. 2013). A Tobit mediation model shows that the effect of mobile vertical (vs. horizontal) video ads on processing fluency of the video ad is mediated by the effort to watch the video ad on the smartphone (ab = 0.20, SE = 0.06, 95 % CI = [0.0069; 0.3603]).

Study 3 (N = 109, M_{age} = 23.37, ages 18–65), testing H2–H5, extended these findings in a lab setting. Participants were randomly assigned to watch a mobile vertical (n = 60) or horizontal (n = 58) video advertisement from Animaker (2017) on their mobile. We assessed processing fluency and effort similar to Study 2. A Tobit moderated mediation model shows that the indirect effect of mobile vertical (vs. horizontal) video ads on processing fluency through the effort of watching the video ad on the smartphone is moderated by mobile users' age (ab = –0.17, SE = 0.01, 95% CI = [–0.1798; –0.0150]).

Our findings contribute to research on mobile video marketing, consumer effort and processing fluency, and generational marketing. We further provide clear managerial implications in terms of the design and target audience of mobile vertical video advertising campaigns.

REFERENCES

Animaker (2017, June 1), "Men Vs Women (Comparison Video)," Retrieved April 1, 2019 from https://www.youtube.com/watch?v=mXnI2Ojpvyo&t

Canella, Gino (2017), "Video Goes Vertical: Local News Videographers Discuss the Problems and Potential of Vertical Video," *Electronic News*, 1-19. doi:10.1177/1931243117705417

Coppola, Jenny (2018, July 11), "How to Tell an Effective Story With Vertical Video," Retrieved December 8, 2019 from https://wistia.com/learn/marketing/effective-storytelling-with-vertical-video

Deng, Xiaoyan, Barbara E. Kahn, H. Rao Unnava, and Hyojin Lee (2016), "A "Wide" Variety: Effects of Horizontal Versus Vertical Display on Assortment Processing, Perceived Variety, and Choice," *Journal of Marketing Research*, 53 (5), 682-98. doi:10.1509/jmr.13.0151

Dent, Steve (2019, April 29), "Samsung's Vertical Sero TV Brings Insta Stories to a Big Screen," Retrieved November 25, 2019 from https://www.engadget.com/2019/04/29/samsung-the-sero-vertical-tv/?guccounter=1

Doyle, Sheelagh (2018, February 7), "More Than 75% of Worldwide Video Viewing is Mobile," Retrieved May 4, 2020 from https://www.emarketer.com/newsroom/index.php/threequarters-video-viewing-mobile/

Jabbari, Sara (2017, June 14), "Vertical or Horizontal video on Mobile?," Retrieved November 26, 2019 from https://www.pulpix.com/insights/blog/vertical-or-horizontal-video-mobile/

Lee, Angela Y., and Jennifer L. Aaker (2004), "Bringing the Frame Into Focus: The Influence of Regulatory Fit on Processing Fluency and Persuasion," *Journal of Personality and Social Psychology*, 86 (2), 205-18. doi:10.2139/ssrn.452084

Martin, Erik J. (2017), "Marketers Turn up the Volume on Vertical Video," *EContent*, 40 (6), 6–8.

McLean, Graeme, Kofi Osei-Frimpong, Khalid Al-Nabhani, and Hannah Marriott (2020), "Examining Consumer Attitudes Towards Retailers' M-Commerce Mobile Applications – an Initial Adoption vs. Continuous Use Perspective," *Journal of Business Research*, 106, 139-57. doi:10.1016/j.jbusres.2019.08.032

MediaRadar (2017, July 17), "How Vertical Video Is Changing the Mobile Ad Landscape," Retrieved November 22, 2019 from https://mediaradar.com/trend-reports/how-vertical-video-is-changing-the-mobile-ad-landscape/

Nike (2015, November 4), "Nike: Last," Retrieved October 25, 2019 from https://www.youtube.com/watch?v=m8WAYF5_NEM

Rosen, Larry, Kelly Whaling, Mark Carrier, Nancy A. Cheever, and Jeffrey Rokkum (2013), "The Media and Technology Usage and Attitudes Scale: An Empirical Investigation," *Computers in Human Behavior*, 29 (6), 2501-11. doi:10.1016/j.chb.2013.06.006

Ryan, Kathleen M. (2018), "Vertical Video: Rupturing the Aesthetic Paradigm," *Visual Communication*, 17 (2), 245-61. doi:10.1177/1470357217736660

ScientiaMobile (2017), "Smartphone and Tablet Portrait Orientation Usage 2017 Q3," Retrieved November 29, 2019 from https://www.scientiamobile.com/smartphone-tablet-portrait-orientation-usage-2017-q3/

Scott, David Meerman (2017), *The New Rules of Marketing & PR: How to Use Social Media, Online Video, Mobile Applications, Blogs, Press Releases, and Viral Marketing to Reach Buyers Directly,* New Jersey: John Wiley & Sons, Inc.

Sedej, Tanja (2019), "The Role of Video Marketing in the Modern Business Environment: A View of Top Management of SMEs," *Journal for International Business and Entrepreneurship Development*, 12 (1), 37-48. doi:10.1504/JIBED.2019.10024902

Smith, Katherine Taken (2017), "Mobile Advertising to Digital Natives: Preferences on Content, Style, Personalization, and Functionality," *Journal of Strategic Marketing*, 27 (1), 67-80. doi:10.1080/0965254x.2017.1384043

Welch, Chris (2020, April 6), "Quibi App Review: Shifting Landscape," Retrieved May 4, 2020 from https://www.theverge.com/2020/4/6/21208932/quibi-app-review-price-short-form-video-content-features-streaming-rotation

Williams, Owen (2019), "How to Master Vertical Video," Retrieved November 6, 2019 from https://buffer.com/vertical-video

Winkielman, Piotr, Norbert Schwarz, Tedra A. Fazendeiro, and Rolf Reber (2003), "The Hedonic Marking of Processing Fluency: Implications for Evaluative Judgment," in *The Psychology of Evaluation: Affective Processes in Cognition and Emotion*, ed. Jochen Musch and Karl C. Klauer, Mahwah, NJ: Lawrence Erlbaum Associates Publishers, 189-217.

Children and Meat Consumption: Perception and Socialization

Isabelle Muratore, University of Toulon, Cergam, France

EXTENDED ABSTRACT

Meat is related to a cultural and/or a religious dimension (Treich, 2018). However, studies show a consensus on the need for a transition concerning meat eating because of its impact on the environment (*e.g.* Graça, Godinho and Truninger, 2019), health (*e.g.* Godfray *et al.*, 2018) or animal suffering (*e.g.* Treich, 2018). Moreover, it has been demonstrated that an exclusive vegetable diet is not risky from a health perspective whatever the period of life (Espinoza, 2019).

If the eating habits of French people seem to be changing, these changes are not the norm. A double trend is emerging: welfarists and flexitarians. The welfarists focus on the conditions of animals' breeding, transport and slaughter and want the animal welfare to be taken into account without questioning the consumption of animal origin food. 82% of French people want an improvement in the protection of farm animals (Anses, 2018). Furthermore, flexitarians, representing 30% of the population (Ifop, 2017), tend to reduce their consumption of food of animal origin. In 2018, vegetarian products' market has grown by 28% and vegetable protein market (Xerfi, 2018).

Graça *et al.* (2019) underline that "One of the challenges in terms of market and consumption seems to be how to promote vegetalian food practices in order to attract an increasing number of consumers". On managerial and societal levels, children appear to be a potential lever able to modify eating practices because of their triple role as actors of consumption: they are currently consumer, influencers and future consumers. So the present study examines the child representation of meat and animals in terms of beliefs, attitude and behavior and identify the socialization agents influencing their representation. Finally, justifications, motivations and obstacles relating to their potential behaviors change make it possible to estimate to what extent the child can become an agent of change in a resocialization perspective.

A qualitative study based on 18 individual interviews has been achieved with French children (8-12 years old). Below are the main results.

Meat consumption: beliefs, attitudes and behaviors

For children "*it is normal*" to eat meat. They love meat and "*don't see how to do without it*".

Ecological consequences of meat consumption are not addressed spontaneously. Meat is not at all correlated to ecological problems. On the contrary it is a healthy and natural product.

Animals are important in society, there is a hierarchy between animals. Furthermore, children are speciesists (Ryder, 1970). Making suffer or killing an animal for useful purposes (*e.g.* to eat it) is acceptable and is not considered as suffering. Suffering is linked to mistreatment (*e.g.* not feeding an animal, beating it). Three profiles emerge: the ignorant-unconscious; the welfarist; the abolitionist.

Socialization agents

When it is question of children and food, it is impossible to ignore the socialization theory. Socialization is defined by Ward (1974) as "the processes by which young people acquire skills, knowledge and attitudes useful for their functioning in the market". Eating behaviors are largely the result of social learning (*e.g.* Hogg *et al.* 2018).

At school, meat and animals are seen through the biodiversity perspective and the food chain. From a health point of view, meat is presented as an essential product. Problems of ecology, health and animal suffering are not addressed.

Concerning peers, the children interviewed do not talk about animals among themselves. The affection for animals is widely shared, especially for pets. The shared social norm is clearly characterized by the consumption of "animal product".

The media mainly contribute to increased knowledge about wild animals or news relating to mistreatment, but do not educate children in terms of ecology or health.

Parents teach by imitation and interaction what to eat. The norm teached is the meat consumption without highlighting environmental problems and animal suffering. If the nutritional dimension of meat is addressed, it remains cacophonic (Fischler, 2006).

Behavior justifications and obstacles to behavior change.

The upstream results attest to the fact that ecological and health issues are not taken into account. Children come within the "meat paradox" scope (Vandermoere *et al.*, 2019). In connection with Bandura's theory of moral disengagement (1999) and the neutralization theory of Sykes and Matza (1957) several strategies (Rothgerber, 2014) emerge regarding the existing cognitive dissonance:

- those which tend to avoid recognizing the problem: *avoidance* and *dissociation*.
- those linked to denigration: *denial of animal pain; denial of animal mind*; *pro-meat justification*
- those allowing the elimination of inconsistencies: *reduced perceived choice*; *vegetarians as reminders*

Motivations for adopting animal-friendly behavior

Two types appear: *perceived effectiveness of their behavior* (some children are aware that they can change things at their level); *desire to be in accordance with his values* (it is when the child has a no animal friendly behavior because he does not have enough information).

The school can be a mean of examining the meat consumption from the perspective of ecology, health and animal suffering. Finally, if other standards are passed on by the school, resocialization process could be done (children could introduce new knowledge and maybe new practices within the family).

REFERENCES

ANSES (2018) : *Avis de l'ANSES relatif au bien-être animal : Contexte, définition et évaluation*, https://www.anses.fr/fr/system/files/SABA2016SA0288.pdf

Bandura, A. (1999), "Moral Disengagement In The Perpetration Of Inhumanities", *Personality and Social Psychology Review*, 3, 193-209.

Espinosa, R. (2019), "L'Eléphant Dans La Pièce. Pour Une Approche Economique De l'Alimentation Végétale Et de La Condition Animale", *Revue d'économie politique*, 129(3), 287-324.

Fischler C. (2006), "Le Point de Vue Sociologique: Partage du Plaisir et Plaisir du Partage", *Actes du colloque de l'Institut Français pour la Nutrition*, décembre.

Godfray, H. C, Aveyard, P, Garnett, T, Hall, J. W., Key, T. J., Lorimer, J., Pierrehumbert, R. T., Scarborough, P., Springmann, M. and Jebb, S, A. *(2018),* "*Meat Consumption, Health And The Environment*"? *Science, 361(6399).*

Graça, J., Truninger, M., Junqueira, L. and Schmidt, L. (2019), "Consumption Orientations May Support (Or Hinder) Transitions To More Plant-Based Diets", *Appetite*, 190, 16-26.

Hogg, M. K., Davis, T., Marshall, D., Petersen, A. and Schneider, T. (2018), "Families and Food: Marketing, Consuming and Managing, *European Journal of Marketing*, Introductory viewpoint, Special Issue Intersectional research stories of responsibilising the family for food, feeding and health in the twenty-first century.

Rothgerber, H. (2014), "Efforts to Overcome Vegetarian-Induced Dissonance Among Meat Eaters", *Appetite*, 79, 32-41.

Ryder, R. D. (1970), *Speciesism*, privately printed leaflet, Oxford.

Sykes, G. M. and Matza, D. (1957), "Techniques of Neutralization. A Theory of Delinquency". *American Sociological Review*, 22, 664-670.

Treich, N. (2018), "Veganomics : Vers une Approche Economique du Véganisme **?** ", *Revue française d'économie*, 36, 3-48.

Vandermoere, F., Geerts, R., De Backer, Erreygers, S. and Doorslaer, E. V. (2019), "Meat Consumption and Vegaphobia: An Exploration of the Characteristics of Meat Eaters, Vegaphobes, and Their Social Environment", *Sustainability*, MDPI, Open Access Journal, 11, 14, 1-15.

Ward, S. (1974), "Consumer Socialization", *Journal of Consumer Research*, 1, 1-16.

Celebrity Gossip Consumption as an Affiliation-Based Means of Coping

Jayant Nasa, Indian Institute of Management Udaipur, India
Tanuka Ghoshal, Baruch College, USA
Raj Raghunathan, University of Texas at Austin, USA

EXTENDED ABSTRACT

Despite the immense popularity of celebrity gossip magazines and websites, little research exists on people's motivations for consuming celebrity gossip as compared to the substantial literature on interpersonal gossip (e.g., Fine and Rosnow 1978; Martinescu, Janssen, and Nijstad 2014; Wert and Salovey 2004). Gossip, defined as evaluative talk about absent third parties (Eder and Enke 1991; Foster 2004), is considered a good means to obtain private and secret information about persons that may not be accessible via a direct conversation. This is particularly true for celebrity gossip since most people cannot engage in one-on-one conversations with celebrities. While it may seem that people would not consider celebrities a part of their social circle and thus should not be interested in their personal lives, it has been argued that people often develop "parasocial" – one-sided – relationships with celebrities, as a consequence of being repeatedly exposed to them on mass and social media (Horton and Wohl 1956; Labrecque 2014). They become as invested in the celebrities' personal lives as they would be in their friends' (McAndrew and Milenkovic 2002). Could celebrity gossip consumption further this process of parasocial bonding and provide emotional comfort when one needs it? That is the question we address in this research.

Based on De Backer et al. (2007) and McDonnell (2014), we define celebrity gossip as speculative media content about relatively unknown aspects of celebrities' personal lives, presented in an evaluative manner. Since knowledge of intimate details about celebrities' lives could make people feel closer to these celebrities, we conjecture that celebrity gossip consumption may serve as an affiliation-based coping mechanism – especially in response to social exclusion threats.

It is well-known that people seek affiliation, particularly with close others, after social exclusion experiences (Bernstein et al. 2010; Maner et al. 2007; Park and Maner 2009). Thus, to the extent that celebrities are perceived as "friends" (parasocial relationship; Giles 2002; Peng et al. 2015), people may seek affiliation with celebrities too when under an exclusion threat. Through our three experimental studies, we show that learning about the celebrities' personal lives by consuming gossip articles is not only a means to satisfy this affiliation desire but is also a means of subconsciously reinforcing the parasocial bond with them.

In study 1, we investigate the impact of an affiliation-related threat (social exclusion) and two affiliation-unrelated threats (intelligence, personal control) on participants' proclivity for celebrity gossip (vs. non-gossip) articles. Three-hundred-eleven MTurk participants were randomly assigned to one of the three threats or a baseline/no threat condition – all manipulated using an experience recall task (Han, Duhachek, and Rucker 2015). In a second "unrelated study," they were asked to choose between four article titles for reading – two gossip (e.g., "Jennifer Aniston hasn't given up on love after Justin Theroux split") and two non-gossip (e.g., "Bohemian Rhapsody is now the highest-grossing musical biopic") – pretested to be equally interesting, entertaining, etc. This article choice (gossip vs. non-gossip) served as our dependent variable. In line with our theorizing, we found that the preference for celebrity gossip was significantly higher for the participants under the exclusion threat than those under the two affiliation-unrelated threats ($M_{affiliation-related-threat}$=38.5%, $M_{affiliation-unrelated-threats}$=24.7%; $\chi^2(1,N=232)$=4.749, p=0.029), and also

than those in the baseline condition ($M_{baseline}$=12.7%). Study 1 thus suggests that celebrity gossip consumption might be an affiliation-related means of coping.

In study 2, we explicitly test the underlying process – specifically whether a desire to affiliate with close others (DACO) mediates the impact of social exclusion on celebrity gossip consumption. The design was similar to study 1 but with additional measures for DACO (e.g., "Right now how much would you like to:" "Hang out with friends?," "Make plans with a significant other?;" Park and Maner 2009) and for escapism (adapted from Duhachek and Oakley 2007) as potential mediators. Again, the proportion of participants choosing a gossip article was significantly higher in the social exclusion condition than in the baseline condition ($M_{exclusion-threat}$=40.8%, $M_{baseline}$=22.9%; $\chi^2(1,N=208)$ =7.71, p=0.005). The effect of exclusion on gossip article choice was partially mediated by DACO (coefficient=0.088, SE=0.078, 90% CI=0.003 to 0.268; PROCESS Model 4, Hayes, 2013) but not by escapism (coefficient=0.046, SE=0.055, 90% CI=-0.006 to 0.194), thus ruling the latter out as an alternate process explanation. Studies 1 and 2, therefore, demonstrate that celebrity gossip offers an avenue for affiliation-based coping post certain self-threats and that people can seek emotional comfort in parasocial relationships with celebrities – much like they do in regular interpersonal relationships. We further explore this in study 3.

In study 3, we examine whether consuming celebrity gossip (following social exclusion) actually makes people feel closer to the target celebrity (the subject of the gossip). In other words, we assess how celebrity gossip vicariously fulfills the desire for social affiliation activated after a self-threat. Two-hundred-thirteen undergraduate participants, all primed to experience social exclusion, were randomly assigned to read a gossip article about a popular celebrity (Ariana Grande) or a non-gossip one. They were then asked to indicate their closeness with Ariana on the "Inclusion of Other in the Self" scale (Aron, Aron, and Smollan 1992). They were also asked about her perceived relatability and authenticity. As expected, we found that those who read the gossip article felt significantly closer to Ariana than those who read the non-gossip article (M_{gossip}=2.45, $M_{non-gossip}$=2.07; $F(1,211)$ =4.06, p=0.045), and also perceived her to be more relatable and authentic than the participants in the non-gossip condition. The effect of gossip consumption on the closeness felt with the celebrity was mediated by perceived relatability but not by perceived authenticity.

Taken together, our studies provide insights into why celebrity gossip consumption is higher following social exclusion threats, and how this consumption vicariously satisfies the desire for social affiliation. This research thus gives further credence to the idea that people engage in one-sided/parasocial relationships with celebrities (Horton and Wohl 1956; Labrecque 2014), which is facilitated via celebrity gossip articles. We also contribute to the literature on compensatory consumption (Mandel et al. 2017) by demonstrating celebrity gossip consumption as a previously unexplored form of coping behavior.

REFERENCES

Aron, Arthur, Elaine N Aron, and Danny Smollan (1992), "Inclusion of Other in the Self Scale and the Structure of Interpersonal Closeness.," *Journal of Personality and Social Psychology*, 63(4), 596–612.

Bernstein, Michael J., Donald F. Sacco, Christina M. Brown, Steven G. Young, and Heather M. Claypool (2010), "A Preference for Genuine Smiles Following Social Exclusion," *Journal of Experimental Social Psychology*, 46(1), 196–99.

De Backer, Charlotte J. S., Mark Nelissen, Patrick Vyncke, Johan Braeckman, and Francis T. McAndrew (2007), "Celebrities: From Teachers to Friends," *Human Nature*, 18(4), 334–54.

Duhachek, Adam and James L. Oakley (2007), "Mapping the Hierarchical Structure of Coping: Unifying Empirical and Theoretical Perspectives," *Journal of Consumer Psychology*, 17(3), 216–33.

Eder, Donna and Janet Lynne Enke (1991), "The Structure of Gossip: Opportunities and Constraints on Collective Expression among Adolescents," *American Sociological Review*, 56(4), 494–508.

Fine, Gary Alan and Ralph L. Rosnow (1978), "Gossip, Gossipers, Gossiping," *Personality and Social Psychology Bulletin*, 4(1), 161–68.

Foster, Eric K. (2004), "Research on Gossip: Taxonomy, Methods, and Future Directions," *Review of General Psychology*, 8(2), 78–99.

Giles, David C. (2002), "Parasocial Interaction: A Review of the Literature and a Model for Future Research," *Media Psychology*, 4(3), 279–305.

Han, DaHee, Adam Duhachek, and Derek D. Rucker (2015), "Distinct Threats, Common Remedies: How Consumers Cope with Psychological Threat," *Journal of Consumer Psychology*, 25(4), 531–45.

Hayes, Andrew F. (2013), *Introduction to Mediation, Moderation, and Conditional Process Analysis: A Regression-Based Approach*, New York, NY: Guilford Press.

Horton, Donald and R. Richard Wohl (1956), "Mass Communication and Para-Social Interaction," *Psychiatry*, 19(3), 215–29.

Labrecque, Lauren I. (2014), "Fostering Consumer–Brand Relationships in Social Media Environments: The Role of Parasocial Interaction," *Journal of Interactive Marketing*, 28(2), 134–48.

Mandel, Naomi, Derek D. Rucker, Jonathan Levav, and Adam D. Galinsky (2017), "The Compensatory Consumer Behavior Model: How Self-Discrepancies Drive Consumer Behavior," *Journal of Consumer Psychology*, 27(1), 133–46.

Maner, Jon K., C. Nathan DeWall, Roy F. Baumeister, and Mark Schaller (2007), "Does Social Exclusion Motivate Interpersonal Reconnection? Resolving the 'Porcupine Problem,'" *Journal of Personality and Social Psychology*, 92(1), 42–55.

Martinescu, Elena, Onne Janssen, and Bernard A. Nijstad (2014), "Tell Me the Gossip: The Self-Evaluative Function of Receiving Gossip About Others," *Personality and Social Psychology Bulletin*, 40(12), 1668–80.

McAndrew, Francis T. and Megan A. Milenkovic (2002), "Of Tabloids and Family Secrets: The Evolutionary Psychology of Gossip," *Journal of Applied Social Psychology*, 32(5), 1064–82.

McDonnell, Andrea M. (2014), *Reading Celebrity Gossip Magazines*, Cambridge, UK: Polity Press.

Park, Lora E. and Jon K. Maner (2009), "Does Self-Threat Promote Social Connection? The Role of Self-Esteem and Contingencies of Self-Worth," *Journal of Personality and Social Psychology*, 96(1), 203–17.

Peng, X., Y. Li, P. Wang, L. Mo, and Q. Chen (2015), "The Ugly Truth: Negative Gossip about Celebrities and Positive Gossip about Self Entertain People in Different Ways.," *Social Neuroscience*, 10(3), 320–36.

Wert, Sarah R. and Peter Salovey (2004), "A Social Comparison Account of Gossip," *Review of General Psychology*, 8(2), 122–137.

Share My Failure, Not My Success: How People Make Ubiquity Judgments Based on Past Events

Mengmeng Niu, University of Mannheim, Germany
Maximilian Gaerth, University of Mannheim, Germany
Florian Kraus, University of Mannheim, Germany

EXTENDED ABSTRACT

Imagine yourself reading a newspaper article about Mike who has been suffering from a rare disease for several years. Before executing the necessary surgery, it is unclear whether the surgery can cure Mike or may cause severe side effects. The present research addresses the following two questions: First, how would the outcome of Mike's surgery affect people's perception of the general ubiquity of his experience? Second, would people's ubiquity judgments be different if they, instead of Mike, were suffering from the disease? Across two studies, we provide empirical evidence to answer these two questions which help understanding consumers' perceptions towards medical issues in their daily decision making. Our findings extend existing literature on health and medical decision making and provide theoretical implications for research on self-other differences, as well as on the evaluation of positive and negative experiences.

Consumers make judgments based on available information. However, they are rarely able to either collect or consider all information necessary to make a well-reasoned judgment, especially when judgments are based on another person's experiences. Recent studies have found that people evaluate their performance on easy tasks better than average but worse than average on difficult tasks (Moore and Small 2007). This occurs as consumers typically have better information about themselves than about others, which they more likely use to update beliefs about performance for themselves (vs. others). Moreover, research has found that consumers show both self-positivity and self-negativity to various health risks when comparing themselves with another person (Yan and Sengupta 2012).

When consumers evaluate positive and negative information they show biased judgments on different aspects. Previous research has demonstrated that, in general, people give greater weight to negative information. Specifically, people believe that negative events, as opposed to positive events, have a stronger impact and the combination of a negative and positive event is seen as more negative than the separate occurrence of the events (Engel and Bless 2017; Rozin and Royzman 2001).

Despite the abovementioned work, research has yet to examine whether and how consumers consider their own (vs. others') experiences when they make judgments concerning the ubiquity of positive (vs. negative) experiences. We hypothesize that consumers' judgments on the ubiquity of positive (vs. negative) experiences differ as a function of whether they (vs. someone else) experienced the event.

Hypothesis 1: *Negative experiences or undesirable outcomes are judged to be more ubiquitous when consumers experienced them themselves than when others experienced them.*

Hypothesis 2: *Consumers judge positive experiences or desirable outcomes as being less ubiquitous when they experienced them themselves than when others experienced them.*

Study 1 (N = 303) was designed to test whether the ubiquity of a positive (vs. negative) experience is judged to be different as a function of the experiencer (self vs. other). Participants were recruited from MTurk and randomly assigned to one of four conditions in a 2 (valence: positive vs. negative) × 2 (experiencer: self vs. other) between-subjects design. Participants were asked to imagine being in a situation in which a new medicine was tested. In the *self and positive* condition, participants imagined that they were cured by using the new medicine, while in the *self and negative* condition, they suffered from side effects. In the *other and positive* condition, participants imagined that Person X was cured, whereas in the *other and negative* condition, Person X suffered from side effects. Then, participants rated how ubiquitous their (or Person X's) experience was (1 = *very rare*, 7 = *very common*). At the end of the survey, participants were asked to evaluate the valence of the experience (1 = *very negative*, 7 = *very positive*).

The results of Study 1 revealed a significant main effect of the valence of the experience (i.e., positive vs. negative), such that participants in the *positive* conditions evaluated the experience to be more positive than did participants in the *negative* conditions ($F(1, 299) = 1116.82, p < .01$). More importantly, the valence experiencer interaction emerged as marginally significant ($F(1, 299) = 3.52, p = .06$). As predicted, people evaluated their own negative experience to be more ubiquitous than the same event experienced by another person ($F(1, 299) = 4.12, p = .04$). In contrast, participants judged others' positive experience to be equally ubiquitous as their own ($F(1, 299) = .39, p = .4$).

Study 2 (N = 307) replicated the interaction in a new scenario. Participants were asked to imagine a similar scenario as in Study 1. Then, participants were asked to evaluate the ubiquity of their (vs. Person X's) experience (1 = *very rare*, 7 = *very common*). At the end of the survey, the valence of the events was measured on three items with 7-point scales (1 = *very negative*, 7 = *very positive*; 1 = *not happy at all*, 7 = *very happy*; 1 = *very bad*, 7 = *very good*) (α = .98).

Study 2 demonstrated a main effect of the valence of the experience ($F(1, 285) = 74.95, p < .001$). Furthermore, the valence experiencer interaction was significant ($F(1, 285) = 7.52, p < .01$). People judged their own negative experience to be more ubiquitous than the same event experienced by another person ($F(1, 285) = 4.41, p = .04$). In contrast, participants judged the positive experience to be less ubiquitous when they (vs. another person) experienced it ($F(1, 285) = 3.01, p = .09$).

Our work proposes that consumers' ubiquity judgments depend on both the valence as well as the subject of the experience. To our knowledge, we are the first to integrate these two aspects and investigate their impact on consumers' ubiquity judgments of an experience. Based on the results of two studies, we provide convergent evidence that people judge their own experience differently from another person's experience, while the direction of the difference depends on the valence of the experience.

REFERENCES

Engel, J., and Bless, H. (2017). The More Negative the More Impact. *Social Psychology, 48*, 148-159.

Moore, D. A., and Small, D. A. (2007). Error and bias in comparative judgment: on being both better and worse than we think we are. *Journal of Personality and Social Psychology, 92*, 972-989.

Rozin, P., and Royzman, E. B. (2001). Negativity Bias, Negativity Dominance, and Contagion. *Personality and Social Psychology Review, 5*, 296-320.

Yan, D., and Sengupta, J. (2012). The influence of base rate and case information on health-risk perceptions: A unified model of self-positivity and self-negativity. *Journal of Consumer Research, 39*, 931-946.

On the Engineering of Fun: Activating Liberation Increases Consumer Fun

Travis Tae Oh, Yeshiva University, USA
Michel Tuan Pham, Columbia University, USA

EXTENDED ABSTRACT

Fun is one of the most pursued and prevalent notions in today's marketplace. A search of the keyword "fun" on Amazon.com returns more than 500,000 results across a broad range of product categories, which is more than four times the Amazon results for either "happy" or "relax." The concept of fun is also common in various advertising messages (e.g., Skippy: "Fuel the Fun!" or Las Vegas: "the Fun Never Sets"), reflective of the central role that fun plays in marketing. Yet, despite high consumer demand for fun, very little is known about how to systematically and effectively create fun experiences.

Only recently, an emerging theory on the consumer psychology of fun states that a sense of liberation—defined as *a temporary release from psychological restriction*—is a key antecedent to the experience of fun (Oh and Pham 2018; Oh 2020). This theoretical proposition, however, has yet to be fully tested. To fill this empirical gap, we aim to achieve two main objectives in this article—(1) investigate the causal relationship between liberation and fun and (2) explore the concept of boundedness as a means to engineer fun—through four studies.

Study 1ᴀ And 1b

In studies 1a and 1b, we prime individuals with the concept of liberation and measure how much fun they had *during* the priming manipulation. While it is customary to measure the effect of priming on a subsequent, unrelated task (i.e., incidental effect), we expect that people will experience more fun when liberation is activated within the task (i.e., an integral effect).

Study Design. Participants were randomly assigned to either a control or liberation word puzzle condition (N=183) in study 1a and one of three (*control vs. liberation vs. achievement*) conditions in study 1b (N=329). All participants solved word puzzles and were asked to find two target words. The target words were adapted from an anagram study that tested the semantic concept of freedom vs. control (Meyers-Levy and Zhu 2007). After completing the word puzzle tasks, participants were measured on fun, engagement, difficulty, valence, and arousal.

Results. A one-way ANCOVA (controlling for education) revealed a significant positive effect of the liberation condition on fun ($p = .029$ in study 1 and $p = .02$ in study 2). All other measures were not significantly different between conditions.

Discussion. Study 1a and 1b show direct evidence on how feelings of liberation can increase the level of fun experienced during a given task. In the next study, we test the effect of liberation on fun in a more content-rich paradigm.

Study 2

We investigate how activating feelings of liberation increases the experience of fun by manipulating hypothetical scenarios, which involve participants to read and project themselves into a situation (e.g., Keltner, Ellsworth, and Edwards 1999). Specifically, we operationalize the strength of liberation by varying the psychological restriction felt prior to a hedonic experience. That is, we test the proposition that felt liberation is directly proportional to the intensity of the temporary "release" from a preceding state (Oh and Pham 2018).

Study Design. Participants were randomly assigned to one of two (*Low vs. High liberation*) conditions (N=146). Participants imagined they were navy sailors sailing on an open deck navy ship (*Low condition*) or in a submarine deep below the sea (*High condition*). After imagining their respective experiences, participants in both conditions imagined stopping by at an island town for a night out. We then measured fun, relaxation, pride, liberation, and effort.

Results. Participants in the submarine condition reported significantly higher fun than the open ship condition ($p = .015$). Levels of relaxation, pride, and effort were not statistically different between conditions. Importantly, felt liberation mediated the relationship between the submarine manipulation and fun.

Discussion. Results from study 2 demonstrate that the temporary release from a more restrictive prior state (i.e., submarine vs. open deck ship) triggers a higher sense of liberation, which positively contributes to the overall fun during hedonic consumption experiences.

Study 3

We move away from online experiments and test how situational cues in actual physical environments influence experienced fun. Specifically, we explore the effect of spatial boundedness on fun, as suggested in prior ethnographic studies of hedonic experiences (e.g., Turner 2018).

Study Design. Ninety three participants were recruited from the university's behavioral lab and randomly assigned to one of two conditions (*boundary vs. no boundary*). The lab was set up with two mini-golf courses. After playing mini-golf, participants filled out a questionnaire which included questions on fun, liberation, and engagement.

Results. Participants in the boundary condition reported to have had more fun than the no-boundary condition ($p = .01$). The number of putts between conditions were not significantly different ($p = .4$), though participants in the boundary condition felt the task was less difficult ($p = .06$). Controlling for number of hits, felt difficulty, familiarity, and past experience did not change the main results and made the boundedness effect stronger ($p = .002$). Liberation and engagement showed mediation on fun, while perceived difficulty did not.

Discussion. Results of study 3 show that creating a salient boundary for a hedonic activity increases the intensity of fun. The effect was robust after controlling for perceived difficulty, familiarity with the task, and other covariates. As such, we expect that perceived boundedness will be an important concept to increase fun in commercial settings.

Discussion

Results from our experimental studies support the hypothesis that activating feelings of liberation increases fun. The current findings are consistent with the propositions set forth by an emerging theory of consumer fun (Oh and Pham 2018), and recent ethnographic evidence of the role of spatial boundedness on hedonic experiences (e.g., Turner 2018). One possible limitation—and a potential future research opportunity—of the current studies is that we do not measure other potential downstream business outcomes. While we suspect that a heightened sense of fun will influence a number of consequences, we limit the scope of this article to test the theoretical connection between feelings of liberation and fun.

REFERENCES

Keltner, Dacher J., Phoebe C. Ellsworth, P. C., and Kerry Edwards (1993), "Beyond Simple Pessimism: Effect of Sadness and Anger on Social Perception," *Journal of Personality and Social Psychology, 64*(5), 740–752.

Meyers-Levy, Joan and Rui (Juliet) Zhu (2007), "The Influence of Ceiling Height: The Effect of Priming on the Type of Processing That People Use," *Journal of Consumer Research, 34*(2), 174–186.

Oh, Travis Tae and Michel Tuan Pham (2018), *"The Psychology of Fun: Inquiry Into Consumers' Fun Experiences,"* in NA - Advances in Consumer Research Volume 46, eds. Andrew Gershoff, Robert Kozinets, and Tiffany White, Duluth, MN : *Association for Consumer Research*, Pages: 726-727.

Oh, Tae Seok (2020), *"The Consumer Psychology of Fun,"* dissertation, Columbia Business School, Columbia University, New York, NY 10025.

Turner, Tim. (2018), "Disneyization: A framework for Understanding Illicit Drug Use in Bounded Play Spaces," *International Journal of Drug Policy, 58*(December 2017), 37–45.

Cultural Effects on Voluntary Simplicity in Japan

Shuji Ohira, Chiba University of Commerce, Japan
Akiko Masuda, Chiba University of Commerce, Japan

EXTENDED ABSTRACT

Voluntary simplicity (VS) refers to consumers experiencing happiness by living simply (Craig-Lees & Hill, 2002). The concept of VS has its roots in the United States of America and Western nations during the 1960s (Elgin 1981). Prior research did not consider how country-specific culture influences VS. This study postulates that there are other types of VS affected by Eastern culture. Japanese people are accustomed to living simply and frugally. This is because historically, Japanese institutions have enforced mandatory simplicity. This study investigates the extent to which the effects of this have remained in consumers' consciousness (the residual institutional effects). This research also explains frugal simplicity, as a form of simplicity, how it is embedded in Japanese culture, and impacted by mandatory simplicity.

Simplicity in Japan has its roots in the middle Nara Period (Takagi 2002). In 721 CE, the Ritsuyo government, an ancient Japanese centralized government, limited the total number of houses in the country (at the time, owning a house was a luxury). Similarly, during the Heian Period (999 CE), the Dajōkan (Grand Council of State) issued official sumptuary documents to ban luxurious living, a response to the ancient Japanese belief that it would bring harm and natural disaster (Sasaki 1992). During the Edo Period (1603-1867 CE), laws and policies enforcing simplicity were frequently implemented to govern society and reconstruct finances. Francks (2009) describes consumers in Japan born in this area. The samurai government aimed to control society by stifling their desire for consumption. Owing to the Second World War, the Japanese government decided to change its economic system from a market economy to a controlled economy, by implementing the National Mobilization Act in 1939 (Nakamura 1974), and then consumers had to live simply and frugally again. The residual institutional effects of mandatory simplicity have influenced modern society in Japan, explaining why its people are accustomed to simple and frugal living.

The theory of neo-institutionalism explains why Japanese people acknowledge simplicity and frugality as their consumption style. DiMaggio and Powell (1983) proposed institutional isomorphism as the reason why organizations exhibit similar behavior. It is possible to apply this theory to consumer research because consumers live in a society where institutional pressure constructs the framework of their behavior; consequently, they exhibit similar behavior. This paper refers to mandatory simplicity as a form of simplicity enforced by institutions. This research also explains the residual institutional effects of mandatory simplicity. Path dependence is defined as the way in which "the past influences the future" (North 1990). Residual institutional effects show how past institutions affect the behavior of present and future consumers. Thus, this study postulates that Japanese consumers prefer to live simply and frugally because of residual institutional effects.

Elgin (2010) pointed out that frugal simplicity is one of the eight types of simplicities. McDonald et al. (2006) categorized three types of VS (non-voluntary simplifiers, beginner voluntary simplifiers, and voluntary simplifiers). The numerous types of VS that exist explain the presence of voluntary simplifiers in the different cultural contexts of each country. Our research also explores frugal simplicity as a form of simplicity, defined as the first behavior to initiate VS, not just through saving money, but economical consumption, and frugal simplifiers as a kind of beginner voluntary simplifier.

This research used a two-tiered purposive sampling method. First, mothers in their 30s–50s were recruited to answer survey questions about their VS lifestyle (Iwata 2006). Consumers with a strong VS lifestyle were invited to participate in a focus group and two in-depth interviews. The semi-structured interviews, which lasted 2–2.5 hours, included questions about simple and frugal living.

Five respondents exhibited frugal simplicity for over five years, and one for over ten years. Respondent D, who took a loan to buy her house, started frugal living. First, because she shopped more than necessary, she cut three credit cards in half with scissors. She then recognized that she had many unused clothes and decided to have just two small wardrobes. All respondents mentioned that there are differences between frugal simplicity and money saving. Respondent F realized that if she bought cheaper products to save money, it led to an increased cost. She indicated that by only saving money, it is difficult to achieve happiness.

All respondents mentioned that by reading a book called Dan-Sha-Ri (Yamashita 2009) inspired them to declutter and organize their possessions. Minimalism is popular in Japan because of Marie Kondo. Her KonMari method presents a way to live simply and frugally by "tidying up"(Kondo 2011). Books about decluttering and tidying up have become very popular in Japan every few years. This phenomenon indicates that Japanese people have an affinity for simple and frugal living. Respondent D mentioned that she was inspired by the ideas of decluttering and tidying up from these books. All respondents have made their own standards for throwing away things, based on these books. Respondent A decided to discard clothes that remained unused for two seasons, Respondent C for one year.

This study illustrates a difference between frugal simplicity and saving money. It considers why Japanese consumers understand simplicity and frugality as virtues and apply these practices to consumption. Three types of alternative consumption patterns were identified. First was a shift to from product to experiential consumption. Second was a decrease in consumption, with the addition of ethical simplicity. Third was increased but more socially responsible consumption.

This study examines frugal simplicity as a form of VS and the residual institutional effects of mandatory simplicity. This research discovered one of the other simplicities in Eastern countries, influenced by their own culture. There are three contributions in this study. The first is to clarifies frugal simplicity as a culture-based aspect of VS and highlights that frugal simplifiers are a type of beginner voluntary simplifier. The second is to change their consumption preferences to alternative consumption through frugal simplicity. The third is to show the residual institutional effects. Thus, Past institutions influence consumers' mindset and contribute to the present framework for their consumption behavior.

REFERENCES

Craig-Lees, Margaret and Constance Hill (2002), "Understanding Voluntary Simplifiers," *Psychology & Marketing*, 19 (2), 187-210.

DiMaggio, Paul J., and Walter W. Powell (1983), "The Iron Cage Revised: Institutional Isomorphism and Collective Rationality in Organization Fields," *American Sociological Review*, 48 (2), 147-160.

Elgin, Duane (1981), *Voluntary Simplicity: Toward a Way of Life That Is Outwardly Simple, Inwardly Rich*, New York: William Morrow.

Elgin, Duane (2010), *Voluntary Simplicity: Toward a Way of Life That Is Outwardly Simple, Inwardly Rich*, Second Revised Edition, New York: HarperCollins.

Francks, Penelope (2009), *The Japanese Consumer: An Alternative Economic History of Modern Japan*, New York: Cambridge University Press.

Iwata, Osamu (2006), "An Evaluation of Consumerism and Lifestyle as Correlates of a Voluntary Simplicity Lifestyle," *Social Behavior and Personality*, 34 (5), 557-567.

Kondo, Marie (2011), *the life-changing magic: the Japanese art of decluttering and organizing*, Tokyo: Sunmark Publish!ng. (in Japanese)

McDonald, Seonaidh, Caroline J. Oates, C. William Young, and Kumju Hwang (2006), "Toward Sustainable Consumption: Researching Voluntary Simplifiers," *Psychology & Marketing*, 23 (2), 515-534.

Nakamura, Takehusa (1974), *Japanese Economic Control*, Tokyo: Nikkei Publishing Inc. (in Japanese)

North, Douglass C. (1990), *Institutions, Institutional Change, and Economic Performance*, United Kingdom: Cambridge University Press.

Sasaki, Fumiaki (1992), "Some Remarks on the Sumptuary Law (Kasa Kinsei) in the Middle and Latter Periods of the Heian Era," *The Bulletin of Hokkaido Musashi Women's Junior College*, 50, 53- 88. (in Japanese)

Takagi, Shosaku (2002), "The Sumptuary Law (in Japan)," in *Encyclopedia of Historiography, Vol. 9: Law and Order*, ed. Hirobumi Yamamoto, Tokyo: Kobundo, 313-314. (in Japanese)

Yamashita, Hideko (2009), *Dan-Sha-Ri: New Tidying Up Method*, Tokyo: Magazine House. (in Japanese)

Doing More Good: On the Process of Constructing Donation Portfolios

Nazli Gurdamar Okutur, London Business School, UK
Jonathan Zev Berman, London Business School, UK

EXTENDED ABSTRACT

Recent innovations in fundraising platforms allow individuals to support a portfolio of charities passively and repeatedly. Yet, while a large body of research focuses on how individuals make donation decisions when faced with a single charitable appeal, we know little about how individuals make donation decisions when able to choose more than one charity at once (cf. Baron & Szymanska, 2011; Sharps & Schroeder, 2019).

The present research investigates individuals' donation decisions when able to support multiple charities at once. We demonstrate that individuals donate more money when are able to first identify which charities to support in advance of determining a total donation amount than if they were to first determine the total amount in advance of identifying which charities to support. We argue and provide evidence that individuals feel greater pain in parting with their money when the target charities are not yet determined, causing them to donate less than they would after they have determined the target charities.

In Study 1 (http://aspredicted.org/blind.php?x=pv78hz, N=368), participants imagined using a hypothetical app that enables users to donate any amount they choose on a regular basis. Users could support up to ten charities from a given list, and if more than one charity was selected, the money would be split evenly across the chosen charities. We manipulated the order in which people selected charities versus determined a total amount to donate. In the Charity Selection First condition, participants first selected the charities in advance of deciding their total donation amount. In the Monetary Allocation First condition, these two decisions were reversed such that participants first indicated their total donation amount in advance of choosing which charities to support. We additionally manipulated whether the app made daily or monthly donations to explore the robustness of the effect. This timing manipulation did not interact with our results, and we collapsed across time horizon.

An ANOVA predicting log-donation amounts revealed a main effect of decision order. Participants who chose their charities first (M=2.01) allocated more money than those who decided their total donation amount first (M=1.68), p=.002.

In Study 2 (N=452), we replicate these results in an incentive-compatible context: Participants donated more of their potential $20 lottery win when determining which charities to support first (M=$6.61) as compared to making the allocation decision first (M=$5.04), p=.004.

One limitation of Study 1 and 2 is that participants in the Monetary Allocation First condition did not see the list of charities until after they have determined their donation amount, which may have made them more reluctant to donate. Study 3A and 3B rule out this possibility by holding information constant across both conditions. The results of Study 3A (http://aspredicted.org/blind.php?x=vq5i4r, N=772) show that participants in the Charity Selection First condition allocated more money (M=2.70) than those in the Monetary Allocation First condition who viewed the list of charities beforehand (M=1.82), p < .001. Additionally, Study 3B (N=391) shows that these results hold also when participants self-determine which charities to support instead of selecting them from a list ($M_{CharitySelectionFirst}$=1.72 vs. $M_{MonetaryAllocationFirst}$=1.26), p=.003.

In previous studies we additionally found evidence that participants in the Charity Selection First condition selected more charities to support than those in the Monetary Allocation First condition. Thus, it is possible that people donated more in the Charity Selection First condition because they picked more charities to support. To investigate this, in Study 4 (http://aspredicted.org/blind.php?x=p7ws2e, N=581), we fixed the number of charities that participants could choose from. We found that the effect of decision order on the total donation amount holds when the number of charities are held constant across conditions ($M_{CharitySelectionFirst}$=2.48 vs. $M_{MonetaryAllocationFirst}$=2.05), p < .001. Hence, the difference in total donation amounts cannot be explained by the number of charities chosen in each condition.

In Study 5 (http://aspredicted.org/blind.php?x=73zd7i, N=1006), we examine whether the relatively low donations in the Monetary Allocation First condition are caused by a lack of deliberation regarding the choice set. In an incentive-compatible design, increasing deliberation by making participants rate all the charities ahead of choosing either a donation amount or their charities first does not eliminate the effect ($M_{CharitySelectionFirst}$=$6.70 vs. $M_{MonetaryAllocationFirst}$=$5.57), p=.003. Thus, the effect is not due to limited deliberation regarding the options in the Monetary Allocation First condition.

Rather, we argue that people have difficulty parting with their money when they have not yet determined the charities. In Study 6 (https://aspredicted.org/blind.php?x=8g5rw3, N=957) we used the same charity app scenario and measured pain of paying immediately following the monetary allocation decision. Participants who had not yet determined the charities to support felt greater pain in donating money (M=0.54) compared to those who determined the charities (M=0.88), p=.016. Furthermore, a mediation analysis revealed a significant indirect effect, suggesting that the effect of decision order on the total donation amount is mediated through the pain people feel when allocating money to charity (B=-0.12, SE=0.05, 95% CI=[-0.21, -0.03]).

In Study 7 (N=280), we asked participants to make a donation decision from a bonus they will receive tomorrow or in two years. If the effect of decision order on the total donation amount is driven by the pain of paying, as the initial payment is moved into the future, people should feel less pain in donating money even when they haven't determined the charities they would support (Thaler & Benartzi, 2004; Breman, 2011). Hence, we expected an attenuation of the decision order effect for donations made from future money. However, we observed a complete reversal of the effect (interaction p<.001). When donating from the bonus received tomorrow participants donated more in the Charity Selection First condition (M=4.33) than in the Monetary Allocation First condition (M=3.01), replicating our previous finding, p=.003. However, when donating from the bonus received in two years, participants donated more in the Monetary Allocation First condition (M=4.07) than in the Charity Selection First condition (M=3.19), p=.045. We discuss potential reasons.

In sum, when supporting a portfolio of charities, asking individuals to select the charities in advance of allocating a total amount of money increases total contribution.

REFERENCES

Baron, J., & Szymanska, E. (2011). Heuristics and biases in charity. *The science of giving: Experimental approaches to the study of charity*, 215-235.

Breman, A. (2011). Give more tomorrow: Two field experiments on altruism and intertemporal choice. *Journal of Public Economics*, *95*(11-12), 1349-1357.

LaBarge, M. C., & Stinson, J. L. (2014). The role of mental budgeting in philanthropic decision-making. *Nonprofit and Voluntary Sector Quarterly*, *43*(6), 993-1013.

Sharps, D. L., & Schroeder, J. (2019). The preference for distributed helping. *Journal of personality and social psychology*.

Thaler, R. H., & Benartzi, S. (2004). Save more tomorrow™: Using behavioral economics to increase employee saving. *Journal of political Economy*, *112*(S1), S164-S187.

The Disproportional Effects of Negative Information on Female Brands

Tim Ozcan, James Madison University, USA
Ahmet M Hattat, Lawrence Tech University, USA
Michael Hair, Southern Illinois University Edwardsville, USA
Daniel A. Sheinin, University of Rhode Island, USA

EXTENDED ABSTRACT

Gender is an important concept in branding. While personality traits can be used to represent brands (Aaker 1997), brand gender is distinct from both brand and human personality, influencing brand judgments via self-concept congruence and brand-extension evaluation (Grohmann 2009). Consumers develop relationships with brands (Fournier 1998), combining their own experiences with external information. Negative information is more important than positive information in judging an object, known as the negativity bias (Baumeister et al. 2001; Rozin and Royzman 2001). Similarly, negative traits are more influential than positive traits in interpersonal perception (Fiske 1980), and negative attributes are more diagnostic for assessments of product quality (Herr, Kardes, and Kim 1991). Further, purchase decisions are influenced more by negative reviews than by positive reviews (Basuroy, Chatterjee, and Ravid 2003; Chevalier and Mayzlin 2006).

Despite the clear importance of brand gender and negative information, these effects have not been explored simultaneously. Does negative information asymmetrically affect attitudes toward gendered brands? Across three studies, including secondary data and experiments, we show evidence that female brands are hurt more than male brands by negative information.

Theoretical Framework

Biases against females, both implicit and explicit, have been demonstrated in a variety of business contexts such as earnings (Blau and Kahn 2017), advertising (Eisend 2019) and career advancement (Tharenou 2010). While there is significant public awareness of gender disparities, our investigation focuses on whether such negative effects occur when consumers evaluate gendered brands. Although human and brand personalities are distinct (Sung and Tinkham 2005), in both cases observers form attitudes via trait inferences (Aaker and Fournier 1995).

The effect of information encountered by consumers varies with several factors, including valence. Negative information is more influential than positive information—a concept labeled "the negativity bias," as shown in numerous settings (Baumeister et al. 2001; Fiske 1980; Herr, Kardes, and Kim 1991; Rozin and Royzman 2001). Critically, purchase decisions are influenced more by negative reviews than by positive ones (Basuroy, Chatterjee, and Ravid 2003; Chevalier and Mayzlin 2006). In electronic word-of-mouth (eWOM), online positive reviews are five times more common than negative reviews (Melián-González et al. 2013). Thus, the abundance of positive reviews renders them less influential than negative reviews (Basuroy, Chatterjee, and Ravid 2003; Chevalier and Mayzlin 2006). More-useful online reviews are also more persuasive, considering source credibility and regulatory focus of the reader (Pentina, Bailey, and Zhang 2018).

Despite the importance of brand gender, relatively little research examines how negative information may differentially affect gendered brands. However, existing research describes asymmetric interpretation of negative information about human males and females. For example, women in leadership positions are judged more negatively than male leaders who make similar decisions, and they are perceived as having fewer leadership capabilities than males (Ea-

gly and Karau 2002). In the domain of human resources, female job candidates must satisfy more criteria than males in order to be assessed as favorably (Moscatelli et al. 2020).

When a male or female name and/or image is associated with a brand, negative information may lead consumers to develop negative attitudes toward the brand, as they would toward an actual person. At the extreme, anthropomorphism (when a brand is viewed as a person) can cause reactions among consumers similar to those of interacting with a persuasive individual (Gabrielli and Baghi 2016). When a brand personality is perceived to have human gender characteristics, consumers may react differently to negative information about a female (vs. male) brand. Therefore,

Hypothesis 1:   *Negative reviews are more useful for female (vs. male) brands.*

Hypothesis 2:   *Brand attitude decreases more sharply for female (vs. male) brands following exposure to negative information.*

Female gender roles traditionally emphasize communal-warmth traits: concern for the welfare of others, morality, and sincerity (Eagly 1987; Eagly and Karau 2002; Fiske, Cuddy, and Glick 2007). Sincerity has strong effects on outcome variables such as attitude change (Eisend and Stokburger-Sauer 2013). Additionally, perceived integrity (fair and ethical behavior) and benevolence (concern for human welfare) are key drivers of consumer trust (Schlosser, White, and Lloyd 2006). Thus, trustworthiness may be a trait that is expected of female brands.

While there is a dearth of research related to trust violations by female brands, similar effects have been studied among females in general. In organizations, ethical failures are judged more negatively for companies led by females (Montgomery and Cowen 2019). Also, female (vs. male) executives are less able to regain public trust by denying wrongdoing (Bansal 2014). As consumers project trust expectations onto female brands, negative information will have a detrimental impact on brand trust perceptions.

Brand trust is a strong predictor of attitude (Chaudhuri and Holbrook 2001), so negative information should cause a much larger decrease in trust for female brands than for male brands, resulting in more negative change in attitudes. Specifically,

Hypothesis 3:   *The effect described in H2 is mediated by brand trust, such that brand trust decreases more sharply for female (vs. male) brands following exposure to negative information, which in turn decreases brand attitude.*

Methodology

We conducted three studies to examine this research question.

Study 1

A 2 (brand gender: female and male) x 1 between-subjects experimental design was used. Review valence was a measured variable. Yelp reviews were made available via the Yelp Dataset Chal-

lenge (https://www.yelp.com/dataset_challenge), which included 4.1 million reviews of 174,000 businesses across 11 metropolitan areas in four countries. We obtained files for the 2017 Yelp Dataset Challenge from Kaggle, a data repository site (https://www.kaggle.com/yelp-dataset/yelp-dataset/version/6#yelp_review.csv). A Yelp review typically includes the reviewer name (with location and activity), review date, rating (number of stars), review text, and reader responses (as described below).

Review valence was operationalized by star rating as a continuous measure (i.e., 1- star as extremely negative and 5-star as extremely positive, as in Chevalier and Mayzlin 2006). To operationalize brand gender, we coded reviews based on gender characteristics of the business name. We based our coding on the 100 most frequently-given names for babies born in the US over the last 100 years according to the Social Security Administration (https://www.ssa.gov/oact/babynames/decades/century.html). A Microsoft Excel formula was used for initial coding, which was verified by two independent human raters. For example, Sarah's Shawarma was coded as a female name; Daniel's Italian Cuisine was a male name; and Ryan & Denise Photography was androgynous. We also calculated the age of the review (in days) at the time of coding. A total of 2,235 business names had invalid/unreadable ID codes and could not be matched to their corresponding Yelp reviews. Additionally, 1,070 businesses with androgynous names were removed, as we focused on female versus male brands. In the analyses that follow, we retained 3,062,410 reviews (30,880 female-named and 86,997 male-named) by 1,042,392 unique reviewers.

Yelp readers may react to each review by clicking one or more different binary- response buttons, "Useful,". We focused on counts of "useful" for each review (Bakhshi, Kanuparthy, and Shamma 2015).

Results

"Useful" was not selected for a majority of the reviews (1,922,452 or 62.7%), but 20.8% (or 637,549) were marked as "useful" by at least one person. Valence was predominantly positive (1-star=455,573;2-star=222,063;3-star=280,296;4-star=610,505;5-star=1,493,973).

To account for excess zeros in the dependent variable ("useful" count), a zero-inflated Poisson regression (Lambert 1992) was run in which female (0 or 1), male (0 or 1), review valence (1-5), and the female*valence and male*valence interactions predicted the "useful" count. Reviews had been on Yelp for an average of 1,338.71 days at the time of analysis.

Review age was used as a predictor of excess zeros.

As shown in Table, all predictors were significant. Providing quantitative evidence of the negativity bias, the effect of review valence was negative (β=-.145), such that every additional "star" made the review less useful.

Following Aiken and West (1991), spotlight analyses were conducted at +1SD (i.e., positive reviews) and -1SD (i.e., negative reviews) of the star-rating measure to determine whether the effects of female and male names differed by valence. At +1SD, the effects of female (β=.027,t(1,493,971)= 2.51, p=.012) and male names (β=.029,t(1,493,971)= 4.17,p<.001) were both significant; at -1SD, the effects were significant, but the coefficient was much larger for female names (β=.520,t(502,357)=33.92,p<.001) than for male names (β=.047,t(502,357)=4.28, p<.001).

As presented in Table, we tested a similar model includes the fractions of one-star and five-star reviews (as in Chevalier and Mayzlin 2006). Critically, the effect of a female name on useful-

ness was negative for extremely positive reviews (β=-.594,p<.001), but positive for extremely negative reviews (β=.866,p<.001), supporting H1. The effect of a male name was not significant for either extremely positive (β=.031,p>.13) or extremely negative reviews (β=-.001,p>.9).

We conducted experiments to further replicate and extend these findings.

Study 2: Experimental Study with Fictitious Brands

A 2 (brand gender:female and male) x 2 (review valence:negative and positive) x 2 (time: pre-review and post-review) mixed design was used. Brand gender and review valence were between-subjects, and time was a repeated measure. One-hundred and eight (62 % male; mean age=34) participated via mTurk in exchange for payment. Brand gender was operationalized by creating two fictitious gendered toothpaste brands: Dr. John's (male) and Dr. Mary's (female). Fictitious brands were used to eliminate any familiarity effects. Stimuli are shown in Figure . The symbols were "average" faces selected from the Face Research Lab at the University of Glasgow Institute of Neuroscience and Psychology (see http://faceresearch.org/). Similar to Study 1, we used the Social Security Administration's name database to select John and Mary.

The negative-review condition used a one-star rating and a statement which read, "I would definitely not recommend this toothpaste. There are many similar products in the market and [Dr. John's/ Dr. Mary's] Toothpaste is no different from them considering its quality." In contrast, the positive-review condition used a five-star rating and a statement which read, "I would definitely recommend this toothpaste. There are no similar products in the market and [Dr. John's/ Dr. Mary's] Toothpaste is unique considering its quality." Time was operationalized by measuring brand attitude prior to the manipulation and then again afterwards. We expected respondents' attitudes to decline more sharply against the female (vs. male) brand after exposure to negative information.

Participants rated their brand attitudes, manipulation check items and were dismissed.

Results

Manipulation checks showed that our manipulations worked as intended (ps<.05) so we continued to test our hypotheses.

Review usefulness. Two-way ANOVA was conducted, with brand gender and review valence as between-subjects factors, to test for differences in perceived review usefulness.

Planned pairwise comparisons revealed that for the female brand, negative reviews (*M*=5.29) were perceived as significantly more useful than positive reviews (*M*=4.70,*F*(1,104)=3.859,*p*=.05, η_p^2=.04), supporting H1. For the male brand, however, review usefulness did not differ with review valence (*p*>.7).

Brand attitude. For both initial and final brand attitude, the three component variables loaded onto one factor and were reliable (α=.95) and thus were aggregated into single measures. A three-way mixed ANOVA was conducted with time as a within-subjects factor, and brand gender and review valence as between-subjects factors. Consistent with H2, planned comparisons confirmed that attitude was more negative toward the female brand after the negative review (*M*=2.99) than before (*M*=3.85,*F*(1,104)=31.23,*p*<.001,η_p^2=.23) but did not change after the positive review (*p*>.6). For the male brand, attitude was more positive after the positive review (*M*=4.76) than before (*M*=4.36,*F*(1,104)=7.12,*p*=.009,η_p^2=.06) but did not change after the negative review (*p*>.7). Subsequent ANCOVA revealed that participant gender did not significantly interact with brand gender, time, valence, or combinations thereof (*ps*>.3).

While these results strongly support our hypotheses, we used fictitious brands that had no prior meanings, and we focused primarily on usefulness and brand attitude. To increase generalizability in Study 3, we use real brands and general negative information; we also explored brand trust as an underlying process for attitude change.

Study 3: Experimental Study with Actual Brands

A 2 (brand gender:female and male) x 2 (time:pre-review and post-review) mixed design was used. Brand gender was between-subjects, and time was a repeated measure. Because we focus on brand gender effects in the presence of negative information, Study 3 did not include a positive-information condition. In addition, having demonstrated the asymmetric effects of negative information on attitude toward female-named brands, in Study 2, we explored the underlying process in Study 3; in particular, we studied the mediating effect of brand trust change on attitude change for female-named brands in the presence of negative information.

The following statement was positioned as current news about the brand: "A recent report from Consumer Reports shows this brand is considered a low-quality frozen pizza and is NOT ranked among their recommended products." Undergraduate students (n=201; 46.8% female; mean age=21.9) at a large midwestern public university participated for course credit. Brand gender was operationalized using real frozen-pizza brands: Red Baron (male) and Celeste (female). See Figure for the stimuli.

Results

Manipulation checks showed that our manipulations worked as intended (ps<.05) so we continued to test our hypotheses.

Brand attitude. For both initial and final brand attitude, the three component variables loaded onto one factor and were reliable (α=.81). A two-way mixed ANOVA was conducted with time as a within-subjects factor, and brand gender as a between-subjects factor.

Consistent with H2, there was a significant time*brand gender interaction ($F(1,199)$=9.12,p=.003,η_p^2=.044); specifically, attitude decreased more after reading the negative news for the female brand (M_{PreFem}=4.44,$M_{PostFem}$=3.20,$F(1,199)$=120.43,p<.001,η_p^2=.377), than for the male brand ($M_{PreMale}$=4.85,$M_{PostMale}$=4.10,$F(1,199)$=42.08,p<.001,η_p^2=.175). ANCOVA revealed that respondent gender did not significantly interact with brand gender, time, or the combination thereof (ps>.2).

Brand trust. For both initial and final brand trust, the four component variables loaded onto one factor and were reliable (α=.88). A two-way mixed ANOVA was conducted with time as a within-subjects factor, and brand gender as a between-subjects factor.

Consistent with our prediction, there was a significant time*brand gender interaction ($F(1,199)$=5.17,p=.024,η_p^2=.025); specifically, trust decreased more after reading the negative news for the female brand (M_{PreFem}=4.25,$M_{PostFem}$=3.38,$F(1,199)$=68.71,p<.001,η_p^2=.257), than for the male brand ($M_{PreMale}$=4.50,$M_{PostMale}$=3.96,$F(1,199)$=24.11,p<.001,η_p^2=.108). ANCOVA revealed that respondent gender did not significantly interact with brand gender, time, or the combination thereof (ps>.3).

Mediation. Next, we examined indirect effects of brand gender on the change in brand attitude, using Hayes' PROCESS Model 4 (Hayes 2017). Delta (change) scores for brand trust and attitude were calculated by subtracting pre-news-exposure scores from post-exposure scores for each measure. In our model, brand gender (0=male, 1=female) was the independent variable, attitude change was the dependent variable, and brand trust change was

the mediator. Supporting H3, female brand gender had a negative, indirect effect on attitude change via brand-trust change (axb=-.240, 95% *CI*[-.46 to -.04]). The direct effect of brand gender was also significant (c=-.284,p=.019). Full results are shown in Table.

General Discussion

In this research, we examined the effects of negative information on gendered brands. After reviewing the extant literature about brand gender and information valence, we proposed that female brands should be disproportionately affected by negative information than male brands. After conducting three studies using a variety of methodologies, we demonstrate this effect. Using a large online review dataset, Study 1 shows that negative reviews about female brands are perceived as more useful than negative reviews about male brands. We extended these findings by conducting experimental studies using fictional and real brands. We also demonstrated that brand trust mediates the decrease in brand attitude.

REFERENCES

Aaker, J. L. (1997). Dimensions of Brand Personality. *Journal of Marketing Research*, 34 (3), 347–56.

Aaker, J. L., & Fournier, S. (1995). A Brand as a Character, a Partner and a Person: Three Perspectives on the Question of Brand Personality. *Advances in Consumer Research*, 22, 391–395.

Aiken, L. S., West, S. G., & Reno, R. R. (1991). *Multiple Regression: Testing and Interpreting Interactions*, Newbury Park: Sage.

Bakhshi, S., Kanuparthy, P., & Shamma, D. A. (2015). Understanding Online Reviews: Funny, Cool or Useful? *Proceedings of the 18th ACM Conference on Computer Supported Cooperative Work & Social Computing*, February, 1270-76.

Bansal, G. (2014). Insider Data Breach and CEO Apology (or Denial): Does CEO Gender Impact Trust Restoration? Proceedings of the Ninth Midwest Association for Information Systems Conference, Ames, Iowa May 15-16, 2014.

Basuroy, S., Chatterjee, S., & Ravid, S. A. (2003). How Critical Are Critical Reviews? The Box Office Effects of Film Critics, Star Power, and Budgets. *Journal of Marketing*, 67 (4), 103–17.

Baumeister, R. F., Bratslavsky, E., Finkenauer, C., & Vohs, K. D. (2001). Bad Is Stronger Than Good. *Review of General Psychology*, 5 (4), 323–70.

Blau, F. D., & Kahn, L. M. (2017). The Gender Wage Gap: Extent, Trends, and Explanations. *Journal of Economic Literature*, 55 (3), 789-865.

Chaudhuri, A., & Holbrook, M. B. (2001). The Chain of Effects from Brand Trust and Brand Affect to Brand Performance: The Role of Brand Loyalty. *Journal of Marketing*, 65 (2), 81–93.

Chevalier, J. A. & Mayzlin, D. (2006). The Effect of Word of Mouth on Sales: Online Book Reviews. *Journal of Marketing Research*, 43 (3), 345–54.

Eagly, A. H. (1987). *Sex differences in social behavior: A social-role interpretation*. Hillsdale, NJ: Erlbaum.

Eagly, A. H., & Karau, S. J. (2002). Role Congruity Theory of Prejudice Toward Female Leaders. *Psychological Review*, 109 (3), 573-598.

Eisend, M. (2019). Gender Roles. *Journal of Advertising,* 48 (1), 72-80.

Eisend, M., & Stokburger-Sauer, N. E. (2013). Brand Personality: A Meta-Analytic Review of Antecedents and Consequences. *Marketing Letters*, 24 (3): 205-216.

Fiske, S. T. (1980). Attention and Weight in Person Perception: The Impact of Negative and Extreme Behavior. *Journal of Personality and Social Psychology*, 38 (6), 889–906.

Fiske, S. T., Cuddy, A. J. C., & Glick, P. (2007). Universal Dimensions of Social Cognition: Warmth and Competence. *Trends in Cognitive Sciences,* 11 (2), 77-83.

Fournier, S. (1998). Consumers and Their Brands: Developing Relationship Theory in Consumer Research. *Journal of Consumer Research*, 24 (4), 343-73.

Gabrielli, V. & Baghi, I. (2016). Online Brand Community within the Integrated Marketing Communication System: When Chocolate Becomes Seductive Like a Person. *Journal of Marketing Communications*, 22 (4), 385-402.

Grohmann, B. (2009). Gender Dimensions of Brand Personality. *Journal of Marketing Research,* 46 (1), 105-19.

Hayes, A. F. (2017)., *Introduction to Mediation, Moderation, and Conditional Process Analysis: A Regression-Based Approach*, Guilford Publications, New York, NY.

Herr, P. M., Kardes, F. R., & Kim, J. (1991). Effects of Word-of-Mouth and Product- Attribute Information on Persuasion: An Accessibility-Diagnosticity Perspective. *Journal of Consumer Research*, 17 (4), 454–62.

Lambert, D. (1992). Zero-Inflated Poisson Regression, with an Application to Defects in Manufacturing. *Technometrics*, 34 (1), 1–14.

Melián-González, S., Bulchand-Gidumal, J., & González López-Valcárcel, B. (2013). Online Customer Reviews of Hotels: As Participation Increases, Better Evaluation Is Obtained. *Cornell Hospitality Quarterly*, 54 (3), 274-83.

Montgomery, N. V., & Cowen, A. P. (2019), "How Leader Gender Influences External Audience Response to Organizational Failures. *Journal of Personality and Social Psychology*. Advance online publication.

Moscatelli, S., Menegatti, M., Ellemers, N., Mariani, M. G., & Rubini, M. (2020). Men Should Be Competent, Women Should Have it All: Multiple Criteria in the Evaluation of Female Job Candidates. *Sex Roles*, January 2020, 1-20.

Pentina, I, Bailey, A. A., & Zhang, L. (2018). Exploring Effects of Source Similarity, Message Valence, and Receiver Regulatory Focus on Yelp Review Persuasiveness and Purchase Intentions. *Journal of Marketing Communications*, 24 (2), 125-145.

Rozin, P & Royzman, E. B. (2001). Negativity Bias, Negativity Dominance, and Contagion. *Personality and Social Psychology Review*, 5 (4), 296–320.

Schlosser, A. E., White, T. B., & Lloyd, S. M. (2006). Converting Web Site Visitors into Buyers: How Web Site Investment Increases Consumer Trusting Beliefs and Online Purchase Intentions. *Journal of Marketing*, 70 (2), 133–148.

Sung, Y., & Tinkham, S. F. (2005). Brand Personality Structures in the United States and Korea: Common and Culture-Specific Factors. *Journal of Consumer Psychology*, 15 (4), 334–350.

Tharenou, P. (2010). Women's Self-initiated Expatriation as a Career Option and Its Ethical Issues. *Journal of Business Ethics,* 95 (1), 73-88.

World of Origin: The Secret Ingredient of Monastic Marketing

Marie-Catherine Paquier, EBS Paris, France
Sophie Morin-Delerm, Université Paris-Saclay, France
Fabien Pecot, TBS Business School Barcelona, Spain

EXTENDED ABSTRACT

Storytelling theory establishes that brands need to give consumers plots, characters… to build their own transporting stories (Van Laer et al., 2014). But what happens when a silent brand generates rich stories? The case of the French monasteries' marketplace can shed light on this paradox. Based on qualitative data collected in the French monastic ecosystem, and in analogy with Country of Origin (COO) (Agrawal and Kamakura, 1999), we put forward the concept of World of Origin (WOO) as an alternative resource for storytelling.

Country of Origin (COO) operates as an informational cue and has multidimensional effects on consumers' perception of the Country Image and of the Country Product Image (Agrawal and Kamakura, 1999; Laroche et al., 2005). Place, more than a physical location for exchange between buyers and sellers, can provide cultural resources (Arnould, 2005), and become a restorative environment (Rosenbaum et al., 2017). The store helps in the transfer of meaning from external contexts to the products sold, particularly in a religious context (Paquier, 2019; Zaidman and Lowengart, 2001). This process resonates with research on contagion (Newman and Dhar, 2014). The place of manufacture or of selling will also influence perceptions of the product's authenticity, especially concerning monastic products (Paquier, 2015).

Today, French contemplative monastic communities still follow the medieval St Benedict precept of *Ora et Labora*. But they currently face a combination of constraints that are challenging their capacity to be self-sufficient, and consequently the real monastic origin of the products they sell. Indeed, these products are sometimes designed or assembled out of the monasteries by lay people. However, the medieval archetypes of the self-sufficient monk activate the imagination and help buyers to construct a transporting story including temporal and spatial references, identifiable characters, verisimilar and meaningful plots, and utopian ambience (Paquier and Morin-Delerm, 2019).

To understand the meaning associated with monastic products purchasing, we conducted 56 semi-structured interviews with people aged 20 to 81, after their purchasing experiences in physical and e-monastic shops. The interviews lasted between 15 and 40 minutes, and they were recorded, then transcribed for data processing and analysis. In a first emic phase, we conducted focused, then axial coding on N'Vivo (Saldaña, 2015). Then, in a second etic phase we built the theoretical coding to finalize the data structure about the image of the monastic WOO. An inferential process of analysis followed by creative interpretation was then adopted, to reveal the dimensions of the monastic WOO perceived by the purchasers, and to highlight the potential of contagion of the purchasing context on the image of monastic products. The key findings revolve around three points:

1) Our participants say very little about the product they have just bought, about the product category, or about the specific monastery that made it. The monastic product consumers primarily talk about their image of the monastic world in general. The product and the *Monastic* brand disappear behind the context of origin.

2) We identify four main themes structuring the image of the monastic world: anchorage as an apart world, monastic work ethics, sincerity, and commitment.

3) Our data shows three essence transfers: from the monastic context to the shop; from the monastic shop to the products; from the product to the consumer. Consumer discourse reveals that the physical abbey shops provide well-being and restorative resources to purchasers, whereas the postal parcel ordered online, with its written messages and prayers from the nuns themselves, pursues transmission of such resources at home.

Building on our findings, we suggest the conceptualization of the WOO. More than just a location, this world apart aggregates beliefs about production practices, but also about the sincere and even engaged intentions of the producers, creating a halo, similar to what happens with the Country Image and with the Country Product Image (Laroche et al., 2005). In this matter, WOO broadens the notion of physical place and could apply to other consumption contexts such as cooperatives, national parks shops or farmers' markets. Furthermore, the contagion process alerts practitioners to their choice of shops' locations, which must be coherent with their contextualized World Image. These findings deepen previous results on the amplificatory role of the purchasing contexts on the experience and on the place-attachment (Debenedetti et al., 2014), enrich the resources-exchange place perspective (Rosenbaum et al., 2017) and extend the two-steps contagion proposal (Newman and Dhar, 2014) towards a three-steps contagion transmitted by the purchasing context.

REFERENCES

Agrawal, J., and Kamakura, W. A. (1999), "Country of Origin: A competitive advantage?", *International Journal of Research in Marketing, 16*, 255-267.

Arnould, E. (2005), "Animating the big middle", *Journal of Retailing, 81*(2), 89-96.

Debenedetti, A., Oppewal, H., and Arsel, Z., (2014), "Place attachment in commercial settings: A gift economy perspective", *Journal of Consumer Research*, *40*(5), 904-923.

Laroche, M., Papadopoulos, N., Heslop, L., and Mourali, M. (2005), "The influence of country image structure on consumer evaluations of foreign products", *International Marketing Review, 22*(1), 96-115.

Newman, G., and Dhar, R. (2014), "Authenticity is contagious: brand essence and the original source of production", *Journal of Marketing Research, LI*(June), 371-386.

Paquier, M. (2015), "Buying monastic products, gift or purchase?", *Journal of Management, Spirituality and Religion, 12*(3), 257-286.

Paquier, M. C. (2019), "The monastic product's biography, a sacralization wave", *Journal of Management, Spirituality & Religion, 16*(1), 76-108.

Paquier, M., & Morin-Delerm, S. (2019), "Le silence monastique, ou les vertus de la sobriété en comunication", *Revue Française de Gestion, 45*(281), 91-104.

Rosenbaum, M. S., Kelleher, C., Friman, M., Kristensson, P., and Scherer, A. (2017), "Re-placing place in marketing: A resource-exchange place perspective", *Journal of Business Research, 79*, 281-289.

Saldaña, J. (2015), "*The coding manual for qualitative researchers",* Sage.

Van Laer, T., De Ruyter, K., Visconti, L., and Wetzels, M. (2014), "The extended transportation-imagery model: a meta-analysis of the antecedents and consequences of consumers' narrative transportation", *Journal of Consumer Research, 40*, 797-817.

Zaidman, N., and Lowengart, O. (2001), "The Marketing of Sacred Goods: Interaction of Consumers and Retailers", *Journal of International Consumer Marketing, 13*(4), 5-26.

The Numerical Precision Effect: How Precision of Attribute Information Affects Adoption of New-Technology Products

Hanyong Park, Michigan State Univeristy, USA
Jaehwan Kwon, Baylor Univeristy, USA
Rajesh Bagchi, Virginia Tech University, USA

EXTENDED ABSTRACT

Previous research suggests that consumers are more likely to adopt tech-products that are less risky, although ease of use can lower risk perceptions and increase adoption (Featherman and Pavlou 2003; Hirunyawipada and Paswan, 2006; Eng and Quaia 2009; Faraji-Rad, Melumad, and Johar, 2017). Ease of mental simulation can also aid adoption (Zhao, Hoeffler, and Dahl, 2009). Thus, risk influences adoption, and consumers' ability to control these products may aid adoption. We demonstrate that an endogenous factor— precision of attribute information (e.g., virtual reality goggles with 39.42 vs. 40.00 megapixels of resolution quality)—affects risk and control perceptions, and thereby adoption. We propose that precise numerical representations of attribute information will boost consumers' perceived control of product usage, which in turn will reduce perceived risks, and increase willingness to purchase.

Study 1a

We test that attribute values of new-technology products expressed with a precise number increases willingness to purchase. We varied the resolution quality of a virtual reality system (goggles) to be either a round number (e.g., 40.00 megapixels) or a precise number (e.g., 39.42 megapixels). We recruited 126 participants and randomly assigned them to either the round number or the precise number condition. We find that willingness to purchase was higher in the precise (vs. round) number condition ($M_{precise}$=4.81, SD=1.60 vs. M_{round}=4.19, SD=1.74; $F(1,116)$=4.16, p=.044, partial =.035). Although inferior to 40 megapixels, we found 39.42 megapixels to elicit higher willingness to purchase.

Study 1b

This study provides process support: we show that precise attribute information increases perceived control, which lowers risk perceptions, and increases willingness to purchase. Second, we show that it is precision of attributes but not non-attributes, such as prices, that drives out effects. 217 participants were randomly assigned intro a 2(attribute: product-specific attribute vs. price) x 2(numerical precision: round number vs. precise number) between-subjects design. All participants were shown a description of a self-driving luggage. In the product-specific attribute condition, participants in the round (precise) number condition were told that the object avoidance rate of the self-driving luggage was 95% (94.7%). In the price condition, participants in the round (precise) number condition learned the price was $550 ($542). A 2x2 ANOVA with willingness to purchase elicited a significant attribute type by numerical precision interaction ($F(1,213)$=11.55, p=.001, partial =.051). When product-specific attributes were provided, precision (M=4.42, SD=1.92) led to higher willingness to purchase relative to roundness (M=3.44, SD=2.14; $F(1,107)$=6.24, p=.014, partial =.055). However, in the price condition, precision (M=3.44, SD=2.07) lowered willingness to purchase relative to roundness (M=4.33, SD=1.93; $F(1,106)$=5.32, p=.023, partial =.048). A mediation analysis shows that numerical precision àperceived control à perceived risk à WTP (95% bias-corrected CI = [.0019, .1948]). They also add conceptual clarity to our theoretical framework by demonstrating that our proposed precision effect only holds for product-specific attributes.

Study 2

Study 2 demonstrates that our effects are more likely to emerge for new-technology products (an A.I. air purifier) rather than equivalent traditional products (a traditional air purifier). 208 participants were randomly assigned into a 2(product type: new-technology product vs. traditional product) x 2(numeric format: precise vs. range) between-subjects design. Participants in the precise number (range) condition read that the air purifier delivers 45 liters (40-50 liters) of clean air per second. A 2x2 ANOVA with willingness to purchase elicited a significant product type by numeric format interaction ($F(1,192)$=4.12, p=.044, partial =.021). For new-technology products, willingness to purchase was lower in the range condition (M=4.89, SD=1.71) relative to the precise number condition (M=5.58, SD=1.18; $F(1,93)$=5.25, p=.024, partial =.053). In contrast, for traditional products, willingness to purchase did not differ.

Study 3

We manipulated control (Kraus, Piff, & Keltner, 2009) and expect that the effect of our control manipulation overrides the precision effect. 384 participants were randomly assigned into a 3(control manipulation: high vs. low vs. neutral) x 2(numerical precision: round number vs. precise number) between-subjects design. Consistent with our earlier findings, when the level of control was not manipulated, purchase likelihoods were higher when we used a precise number (M=4.68, SD=1.66) relative to when we used a round number (M=3.95, SD=1.80; $F(1,116)$=5.27, p=.024, partial =.043). In contrast, purchase likelihoods were not influenced by precision in either the high control (=4.61, SD=1.57 vs. =4.50, SD=1.79; $F < 1$) or the low control conditions (=4.07, SD=1.59 vs. =3.86, SD=1.65; $F<1$). Also, consistent with our theorizing, in the round number condition, purchase likelihoods were higher when control was manipulated to be high (=4.61, SD=1.57) compared to both when control was low (=4.07, SD=1.59; $F(1,112)$=3.31, p=.071, partial =.029) as well as when control was not manipulated (=3.95, SD=1.80; $F(1,110)$=4.28, p=.041, partial =.037). The neutral control and low control conditions were not different from each other ($F<1$). In the precise number condition too, purchase likelihoods were higher when control was manipulated to be high (=4.50, SD=1.79) relative to when it was manipulated to be low (=3.86, SD=1.65; $F(1,114)$=4.01, p=.048, partial =.034). However, as expected, purchase likelihoods were higher when control was not manipulated (=4.68, SD=1.66) relative to when control was manipulated to be low ($F(1,124)$=7.70, p=.006, partial =.058), but was not different when control was manipulated to be high ($F<1$). These results suggest that experimentally altering the level of control can affect purchase likelihoods in a way consistent with our theoretical account.

General Discussion

The current research contributes to the literature of new-technology adoption. We identify numerical precision as a factor that influences adoption. We also show how precise numbers affect perceptions of control and risk. Together, this suggests that other non-numerical factors that influence precision, could likewise affect control, risk, and adoption of new-technology products. For example, providing specific and precise (vs. general) information about the in-

nerworkings of a product may affect adoption positively. Likewise, enhancing perceptions of control, for example, via advertisements, may also influence adoption. Furthermore, because it is common to express specifications using numbers, our findings suggest that other properties of numbers may also affect adoption and maybe worthy of future investigation.

REFERENCES

Eng, T. Y., & Quaia, G. (2009). Strategies for improving new product adoption in uncertain environments: A selective review of the literature. *Industrial Marketing Management*, *38*(3), 275-282.

Faraji-Rad, A., Melumad, S., & Johar, G. V. (2017). Consumer desire for control as a barrier to new product adoption. *Journal of Consumer Psychology*, *27*(3), 347-354.

Featherman, M. S., & Pavlou, P. A. (2003). Predicting e-services adoption: a perceived risk facets perspective. *International journal of human-computer studies*, *59*(4), 451-474.

Hirunyawipada, T., & Paswan, A. K. (2006). Consumer innovativeness and perceived risk: implications for high technology product adoption. *Journal of consumer marketing*, *23*(4), 182-198.

Zhao, M., Hoeffler, S., & Dahl, D. W. (2009). The role of imagination-focused visualization on new product evaluation. *Journal of Marketing Research*, *46*(1), 46-55.

Alexa, I Want It Now:
How Conversational Artificial Intelligence Agents Shape Consumer Decisions

Sang Kyu Park, University of Florida, USA
Yegyu Han, IE Business School, Spain
Aner Sela, University of Florida, USA

EXTENDED ABSTRACT

AI-enabled conversational platforms such as Amazon Alexa and Google Assistant have begun to permeate consumers' daily lives. Yet, a dearth of research has studied how they affect consumer behavior. We show that consumers make more impulsive and less frugal choices when interacting with a conversational AI platform than when choosing on a computer screen or interacting with a text-based chat-bot. This is because the transient nature of the conversation makes it harder for consumers to process prices and other quantitative details associated with the cost of the transaction.

Although conversations are natural (Garrod and Pickering 2004; Kitayama and Burnstein 1988), they require dedication of attentional resources, because participants must process information in real-time and respond instantaneously (Holtgraves 2008; Rubin, Hafer, and Arata 2000). The transient nature of verbal conversations requires information to be stored in working memory, which further increases the demands on cognitive resources (Bostrom and Waldhart 1988; Leahy and Sweller 2011; Michael et al. 2001; Wong et al. 2012).

The shortage of cognitive capacity during spoken conversation suggests that consumers using conversational platforms may be less likely to engage in careful, precise, and deliberate processing, compared with consumers using screen-based interfaces (Ferreira 2003; Hildyard and Olson 1978; Holtgraves 2008). Consequently, they may be less attentive to harder-to-process details such as quantitative information, including price, calories, and other "fine print" (Lynch and Srull 1982). Based on this analysis, we propose that, compared with those using screen-based interfaces, consumers using conversational platforms will tend to make more impulsive and less frugal decisions, showing a preference for intuitively appealing and hedonically pleasing (albeit costlier) options (Hoch and Loewenstein 1991; Prui 1996; Vohs and Faber 2007). We examine this proposition in the context of intertemporal preference, vice-virtue food choices, and splurging on indulgent options.

Study 1A has a 3(Alexa vs. chatbot vs. web) between-subjects design and tested impulsivity through expedited shipping choice paradigm. The chatbot condition was intended to tease apart the conversational exchange aspect of the interaction from the vocal modality used by Alexa more specifically. Participants imagined buying a new iPad Pro and were asked to choose between normal ($2.75/14 days) and expedited shipping ($11.75/2 days). Those in the Alexa condition orally interacted with Alexa (using an Amazon Echo Dot device) to choose the shipping option (the script for Alexa was coded). Participants in the chatbot condition saw the same script of Alexa's remarks in text form and chose their response among the options shown on the computer screen. Participants in the web condition choose one of the two shipping options on a computer screen without engaging in a conversation, either textually or vocally. Confirming our prediction, expedited shipping option was chosen significantly more in the Alexa condition (Alexa=52.0% vs. chatbot=25.3% vs. web=33.3%; $\chi^2(2)$=15.89, p<.001).

Studies 1B and 1C both have a 2(Alexa vs. web) between-subjects design and conceptually extends the results to vice food choice (1B) and splurging (1C). Demonstrating impulsivity, participants interacting with Alexa were more likely to include chips and a drink for their meal (Alexa=70.4% vs. web=53%; $\chi^2(1)$=3.75, p=.053), and

were more likely to upgrade to a front row seat when attending a football game (Alexa=74.5% vs. web=60.4%; $\chi^2(1)$=5.23, p=.022).

Study 2 uses the same expedited shipping paradigm used in Study 1A but includes two new conditions to isolate the role of speaking versus listening. Participants in the listening-only condition heard each statement spoken by Alexa but responded by typing their response instead of speaking back. In the speaking-only condition, participants read the information on the screen but replied orally to state their choices. Results reveal that the choice of expedited shipping was higher in both the Alexa (35%) and listening-only conditions (34.9%), compared with the web condition (16.7%; p's=.029, .042, respectively), whereas the speaking-only condition was identical to the web condition (20.8%; p=.588). Combined, the Alexa and listening-only conditions were higher than the web and speaking-only conditions (p=.009).

Studies 3 and 4 both use a 2(Alexa vs. web) between-subjects design to examine the same conceptual mediator: attention to details. Study 3 directly asked participants to recall and report the price of shipping and the fictitious product number listed, whereas Study 4 indirectly asked them to indicate how big the price difference between standard and expedited shipping seemed to them. Preference for expedited shipping option in the Alexa condition was replicated in both studies and the effect was mediated by reduced recall accuracy (study 3) and sensitivity (study 4).

Study 5 provides further evidence for the underlying mechanism through moderation. If conversations limit deliberative capacity and consequently lead to impulsive choices, as we argue, then manipulating cognitive deliberation should lead to impulsive choices for those interacting non-orally without significantly affecting people interacting with Alexa. In line with this prediction, when participants were under time pressure, those in the web condition chose expedited shipping option as much as those in the Alexa condition (Alexa=38.6% vs. web=53.1%, $\chi^2(1)$=2.54, p=.11). When no time pressure was imposed, the previous results replicated (Alexa=46.3% vs. web=25.8%, $\chi^2(1)$=5.7, p=.017).

In study 6, we directly test two potential alternative explanations for the effect: impression management (i.e., spending more to avoid looking cheap) and a general increased tendency to comply with spoken requests (Mariadassou, Bechler, and Levav 2019). To tease apart insensitivity to quantitative information (which results in splurging) from social desirability and a general compliance tendency, we tested the willingness to donate. We found that participants were *less* likely to donate money when Alexa made such request - inconsistent with an impression-management account and a compliance account – and were equally less likely to donate regardless of whether the asked amount was relatively big or small – consistent with our conceptualization.

The results across eight studies robustly demonstrates that interacting with conversational agents increases impulsive and non-frugal choice. While the emerging research has primarily focused on antecedents of consumers' use of AI technology (Foehr and Germelmann 2020), we enrich the literature by demonstrating its behavioral consequences. Furthermore, we contribute to research on expression modality (Klesse, Levav, and Goukens 2015), new channels, and price sensitivity.

REFERENCES

Bostrom, Robert N., and Enid S. Waldhart (1988), "Memory Models and The Measurement of Listening," *Communication Education*, 37(1), 1-13.

Ferreira, Fernanda (2003), "The Misinterpretation of Noncanonical Sentences," *Cognitive Psychology*, 47(2), 164-203.

Foehr, Jonas, and Claas Christian Germelmann (2002), "Alexa, Can I Trust You? Exploring Consumer Paths to Trust in Smart Voice-Interaction Technologies," *Journal of Association for Consumer Research*, forthcoming.

Garrod, Simon, and Martin J. Pickering (2004), "Why Is Conversation So Easy?," *Trends in Cognitive Sciences*, 8(1), 8-11.

Hildyard, Angela, and David R. Olson (1978), "Memory and Inference in The Comprehension of Oral and Written Discourse," *Discourse Processes*, 1(2), 91-117.

Hoch, Stephen J., and George F. Loewenstein (1991), "Time-Inconsistent Preferences and Consumer Self-Control," *Journal of Consumer Research*, 17(4), 492-507.

Holtgraves, Thomas (2008), "Automatic Intention Recognition in Conversation Processing," *Journal of Memory and Language*, 58(3) 627-645.

Kitayama, Shinobu, and Eugene Burnstein (1988), "Automaticity in Conversations: A Reexamination of The Mindlessness Hypothesis," *Journal of Personality and Social Psychology*, 54(2), 219-224.

Klesse, Anne-Kathrin, Jonathan Levav, and Caroline Goukens (2015), "The Effect of Preference Expression Modality on Self-Control," *Journal of Consumer Research*, 42(4), 535-550.

Leahy, Wayne, and John Sweller (2011), "Cognitive Load theory, Modality of Presentation and the Transient Information Effect," *Applied Cognitive Psychology*, 25(6), 943-951.

Lynch Jr, John G., and Thomas K. Srull (1982), "Memory and Attentional Factors in Consumer Choice: Concepts and Research Methods," Journal of Consumer Research, 9(1), 18-37.

Mariadassou, Shwetha, Christopher Bechler, and Jonathan Levav (2019), "Recommendation Modality Affects Choice: Auditory Recommendations are Followed More Than Visual," *working paper*.

Michael, Erica B., Timothy A. Keller, Patricia A. Carpenter, and Marcel Adam Just (2001), "fMRI Investigation of Sentence Comprehension by Eye and by Ear: Modality Fingerprints on Cognitive Processes," *Human Brain Mapping*, 13(4), 239-252.

Puri, Radhika (1996), "Measuring and Modifying Consumer Impulsiveness: A Cost-Benefit Accessibility Framework," *Journal of Consumer Psychology*, 5(2), 87-113.

Rubin, Donald L., Teresa Hafer, and Kevin Arata (2000), "Reading and Listening to Oral-Based Versus Literate-Based Discourse," *Communication Education*, 49(2), 121-133.

Vohs, Kathleen D., and Ronald J. Faber (2007), "Spent Resources: Self-Regulatory Resource Availability Affects Impulse Buying," *Journal of Consumer Research*, 33(4), 537-547.

Wong, Anna, Nadine Marcus, Paul Ayres, Lee Smith, Graham A. Cooper, Fred Paas, and John Sweller (2009), "Instructional Animations Can Be Superior to Statics When Learning Human Motor Skills," *Computers in Human Behavior*, 25(2), 339-347.

Does the New iPhone Determine How Much I like my iPhone?
The Influence of Upgrades on the Hedonic Decline for the Status Quo

Maria Alice Pasdiora, UFRGS, Brasil
Vinicius Andrade Brei, UFRGS, Brasil

EXTENDED ABSTRACT

Past research has shown that exposure to upgrades influence comparisons between upgrades and status quo (Sela and LeBoeuf 2017), consumers' sensibility to determined attributes (Okada 2001), and how they treat their status quo (Bellezza, Ackerman, and Gino 2017). In this work, we investigate whether consumers' exposure to upgrades influences their hedonic decline for the status quo. Considering that hedonic decline is a malleable process with a psychological component (Galak and Redden 2018), we propose that consumers exposed to upgrades present a more accelerated hedonic decline for the status quo than those not exposed to upgrades.

We investigated this proposition through five studies. In Study 1, we endowed 65 undergraduate students with a blue plastic pen (status quo). Participants rated their liking and desire for the status quo four times along three weeks. Between the second and third rates, they viewed either a blue soft-grip retractable pen (upgrade) or a black plastic pen (no upgrade). For liking, results from growth curve modeling showed a significant interaction between the number of trials and the upgrade presence ($F(1, 193) = 7.45$, $p < .01$) and no further effects. For desire, we found a similar pattern.

Study 2 controls for potential differences in new versions by manipulating the framing of the same product. 199 Prolific panelists rated twelve times their enjoyment and desire for a black and white picture (status quo). Between the second and third trials, participants viewed a colored version of the same picture. In the cued condition, we described it as an enhanced version of the status quo. In the no cued condition, as another version of the status quo. For enjoyment, results showed a significant interaction between the number of trials and the upgrade presence ($F(1, 2187) = 5.41$, $p < .03$) and a main effect for number of trials ($F(1, 2187) = 1362.76$, $p < .001$). For desire, we found main effects for number of trials ($F(1, 2187) = 1386.75$, $p < .001$) and upgrade presence ($F(1, 237.67) = 2.74$, $p = .09$).

In Study 3A, 80 Prolific panelists played and rated ten times a status quo game. Between the fifth and sixth trials, they viewed either an enhanced (upgrade) or similar game (no upgrade). Finally, subjects chose for replacement. For enjoyment, results show a significant interaction between the number of trials and the upgrade presence ($F(1, 718) = 16.45$, $p < .001$) and a main effect for number of trials ($F(1, 718) = 235.65$, $p < .001$). We found a similar pattern for desire. Further, more participants chose to replace in the upgrade condition ($\chi2(1) = 3.83$, $p < 0.06$).

In Study 3B, 102 Prolific panelists rated six times a black and white picture (status quo). Between the third and fourth trials, they viewed either a colored picture (upgrade) or a sepia picture (no upgrade) and indicated their remembered enjoyment for the status quo. Finally, participants chose for replacement. For enjoyment, there was a significant interaction between the upgrade presence and the number of trials ($F(1, 508) = 16.90$, $p < .001$), and main effects for number of trials ($F(1, 508) = 178.96$, $p < .001$) and upgrade presence ($F(1, 126.88) = 4.17$, $p < .05$). We found a similar pattern for desire. For remembered enjoyment, there was no difference between conditions ($t < 1$). Further, more participants chose to replace in the upgrade condition ($\chi2(1) = 6.00$, $p < .02$).

So far, results support our prediction, but these findings could be driven by contrast effects (Novemsky and Ratner 2003). Study 4 seeks for support against this effect. We assigned 123 Prolific panelists to three between-subjects conditions: upgrade (colored picture), no upgrade (black and white), and downgrade (pixelated). If participants exposed to upgrades presented a more accelerated hedonic decline due to contrast effects, those exposed to a downgrade should present a more slow hedonic decline. Respondents rated six times a black and white picture (status quo). Between third and fourth trials, they viewed either the upgrade, no upgrade, or downgrade, indicating their remembered enjoyment for the status quo. After the last trial, we told subjects they would rate a picture three more times and they chose between being paid a 5 cents bonus and repetitively view the upgrade (x no upgrade x downgrade) instead of the status quo or be paid a 10 cents bonus and repetitively view the status quo instead of the upgrade (x no upgrade x downgrade).

For enjoyment, results showed a significant interaction between the number of trials and the upgrade presence ($F(2, 612) = 7.28$, $p < .001$) and a main effect for the number of trials ($F(1, 612) = 142.05$, $p < .001$). We found a similar pattern for desire. Planned contrasts showed that presenting an upgrade leads to less remembered enjoyment than no presenting it ($t(120) = 3.66$, $p < .001$) and that there was no difference between no upgrade and downgrade conditions ($t < 1$). Further, more participants replaced in the upgrade than in no upgrade and downgrade conditions ($\chi2(2) = 12.77$, $p < .002$).

Our findings provide evidence that consumers exposed to upgrades present a more accelerated hedonic decline for their status quo. Study 1 demonstrated this effect in a real consumption setting, while Study 2 showed it holds when a product is simply framed as an upgrade. Further, participants in the upgrade condition were more likely to replace both in hypothetical (Studies 3A and 3B) and real-consequence (Study 4) scenarios.

Our work offers a new perspective to research exploring the influence of upgrade exposure on how consumers perceive the status quo. Bellezza et al. (2017) argued they ruled out hedonic decline as an alternative explanation by controlling for a few variables. Our results, however, show that the exposure to upgrades leads consumers to experience a more accelerated hedonic decline for the status quo. Further, we go beyond past research by testing our downstream consequences through a real replacement decision. Finally, we contribute to the literature on hedonic decline by presenting upgrade exposure as an antecedent for this phenomenon.

REFERENCES

Bellezza, Silvia, Joshua M. Ackerman, and Francesca Gino (2017), "'Be careless with that!' Availability of product upgrades increases cavalier behavior toward possessions," Journal of Marketing Research, 54 (5), 768-784.

Galak, Jeff, and Joseph P. Redden (2018), "The properties and antecedents of hedonic decline," Annual Review of Psychology, 69, 1-25.

Novemsky, Nathan, and Rebecca K. Ratner (2003), "The time course and impact of consumers' erroneous beliefs about hedonic contrast effects," Journal of Consumer Research, 29 (4), 507-516.

Okada, Erica M. (2001), "Trade-ins, mental accounting, and product replacement decisions," Journal of Consumer Research, 27 (4), 433-446.

Sela, Aner, and Robyn A. LeBoeuf (2017), "Comparison neglect in upgrade decisions," Journal of Marketing Research, 54 (4), 556-571.

Enabling Participation in a High-Competence Cultural Community of Practice: Negotiating the Inclusion-Exclusion Dilemma

Carol Kelleher, Cork University Business School, Ireland
Lisa Peñaloza, KEDGE Business School, France
Hugh N. Wilson, Warwick Business School, UK
Emma K. Macdonald, Warwick Business School, UK

EXTENDED ABSTRACT

Introduction

 … at the heart of the LSO is the orchestra and the musicians that comprise the orchestra. That orchestra's principal role and principal strength is performing symphonic concerts. (Shane, Financial Director, London Symphony Orchestra)

When I actually realised it more, it (orchestral concert going) was exactly the same hierarchy, with status involved, and sometimes it can feel quite alienating for other people... What I fundamentally felt strong about was if I could help to break down some of those barriers so that fantastic music, whether it be from the Western classical tradition or any other tradition, is absolutely music for everyone and people feel that they can have ownership and be involved. (Jasmine, LSO's 'Discovery' education unit)

Major urban symphony orchestras were once at the pinnacle of consumer culture. Today, as measured by streaming, concert attendance and CD sales, classical music is number four in music consumption, well behind rap, rock and country (Mulligan, Joplin, and Fuller 2019). Research has noted barriers to entry as one of several distinctions demarcating consuming communities and tribes (Thomas, Price and Schau 2013), and has explored how collaborative efforts help overcome them (Schau, Muñiz and Arnould 2009). As examples, Tumbat and Belk (2011) noted the knowledge and physical prowess required for expert mountain climbing, as well as the tensions between those more/less skilled, while Goulding, Shankar and Canniford (2012) elaborated how clubbers initiate people into club culture by sharing knowledge and appropriate activity.

For some scholars, such entry barriers are a matter of taste distinctions that accomplish social status (Holt 1998) as well as identity and community (Arsel and Thompson 2011). Some practices help consumers acquire competences in integrating into a discursive taste regime (Arsel and Bean 2013), including sensory proclivities and meaning-making judgements in discerning material (Maciel and Wallendorf 2017). Yet consumption accounts for only part of many consuming communities. Production is equally important in its cultural merging with consumption (Firat and Venkatesh 1995), in the blurring of producer and consumer roles (Cova and Dalli 2009), and in how some consumers support their activity by transforming into producers (Kjeldgard et al. 2017; Weijo, Martin and Arnould 2018).

The community-of-practice literature (COP hereafter) has made theoretical headway by downplaying differences between consumers and producers, instead emphasizing doings, sayings and meanings within a single COP, such as gardening or guitar playing (Hartmann 2016). Wenger-Trayner and Wenger-Trayner (2015, 13) further emphasize the *social* dimension of COP entry barriers, adding that such "identity of knowlegeability" involves a multiplicity of practices "modulated" across a pertinent "landscape".

The London Symphony Orchestra (LSO) is a cultural COP where participation requires high competence. As such, it is par-

ticularly prone to what we term the inclusion-exclusion dilemma that challenges many consuming communities and tribes. To thrive, CsOP (s designates plural) need a consistent inflow of people (Thomas et al. 2013); at the same time their dynamics of selectivity and hierarchy provide distinctive identity and social structure favored by members and repellant to nonmembers (Arsel and Thompson 2011; Bourdieu 1993; Holt 1998). The high competence required is not just daunting to nonmembers; their inclusion can damage the cultural experience of members, who thus are disincentivized from allowing new members in (Kelleher et al. 2019).

Our study explores the means by which a COP with an exclusionary high level of competence enables inclusivity, the exclusions such inclusionary efforts overcome, and the attempts to balance the tensions between such exclusions and inclusions. Our research hence contributes to knowledge of how CsOP diffuse and integrate competences and thereby manage their boundary.

Literature Review

Scholars have explained the heterogeneity and aestheticization of consumption that has fragmented contemporary societies as resulting from technologies spurring media specialization and aiding market fragmentation, and from the contemporary search for authenticity and community that has accompanied the diffusion of education and earnings, migration and urbanization (Campbell 2004; Firat and Venkatesh 1995). Building on Bourdieu's (1993) triad of economic, social and especially cultural capital, Holt (1998) documented the social structuring constituted in consumption, that, while less institutionalized in schools, reproduces a plurality of sociocultural groups featuring novel and emerging hierarchies. Important in the development of such sociocultural formations is shared ritual activity (Rook 1985), collectively acquired via formal and informal initiation activities and accompanying discourses (Turner 1969).

Where these sociocultural groups involve the acquisition of significant competence, the communities-of-practice lens has proved fruitful. In their account of learning in a landscape of practice, Wenger-Trayner and Wenger-Trayner (2015, 19) emphasize the "becoming of a person who inhabits the landscape" and the acquisition of "an identity whose dynamic construction" reflects a "trajectory through that landscape." These authors identify more or less conscious, collaborative processes of engagement, imagination, and alignment into the "regime of competence" of a COP (2015, 20-22). Identity with a practice is crucial (24), may entail conflict (25), and requires reconciliations with preexisting claims to competence in another context (25). The resulting trajectory need not culminate at the center. In this sense, "learning to be" is important in "learning to do." This literature suggests what is involved in joining a community of practice. Remaining to be explored is how the community deals with tensions between the desire to include such new members and pressures to exclude them.

Methods

Employing a practice theory lens and utilizing ethnographic methods, the present research addresses two research questions: 1) How does a COP characterized by an exclusionary high level of

competence enable inclusivity? 2) What exclusions do inclusionary efforts overcome, work around or leave intact? Data collection involved 47 in-depth interviews with LSO musicians and staff, audience members and amateur musicians, together with participant observation at orchestra and choral concerts and rehearsals, and outreach performances and other activities. Interviews were recorded and transcribed. Observations and emergent themes were incorporated into subsequent and follow-up interviews and fieldwork. Practices and themes were derived using Spiggle's (1994) framework for analyzing qualitative data, in conjunction with analytical codes produced by the software package NVivo9.

Findings

It relates back to our mission, which is about making the finest music available to the greatest number of people… It really is about the quality of engagement rather than the number of people we are reaching, but of course there is a huge accolade in thinking we have reached sixty thousand people a year. (Lucia, Head of LSO Discovery)

The LSO community faces an inclusion-exclusion dilemma. Its legitimacy and funding depend on its excellence ethos, and the high-level player and audience competences that support this ethos are the source of exclusionary pressures. Inattentive or inappropriate activity by audiences can affect the quasi-spiritual experience for all. At the same time, its legitimacy and survival depend on attracting, developing, and engaging with players and audiences that do not yet possess these competencies to enable their performance and/or appreciation of classical music.

In response, the COP exhibits a range of practices that enable participation, summarized in Figure 1. Some of these tend to maintain exclusivity, while others tend to promote inclusivity, as indicated with arrows pointing in opposite directions.

First, at the top left of the figure is Excellence Celebration. These practices *reinforce* the COP by revering the expert competences and identities of the musicians and of appreciative audiences at premier concerts. As an example, Frank, a regular LSO concert-goer, related, "I have always compared listening to the LSO as watching Manchester United playing football, you are watching class, you are hearing class." At the top, middle-right in the body of the figure are the practices Selective Integration, Guided Collaboration, and Trial By Invitation. As Lucia notes above, the LSO's mission is "to bring the finest music to the greatest number of people." In accomplishing this mission, the LSO runs a several programs in which a subgroup of LSO professionals Selects and performs with young musicians and somewhat different, accompanying audiences in ways that develop their competences and dispositions. An example is LSO Academy, which *fosters* already experienced musicians by temporarily Integrating them into a professional orchestral environment:

The academy is very much about giving promising musicians access that they wouldn't necessarily be able to get, which is why it is run, led and coached by the LSO principals of that section. It is open to musicians who are aged between 14 and 24… If the principals think the person is showing great promise even though they are not quite there technically, they may well bring them on the course and show them where they need to get to. (Laura, LSO Academy)

Another program is LSO Next Generation, which provides Collaborative orchestral experience to a selective group of young instru-

mentalists from London's poorer East End, *illuminating* orchestral music from the inside, as Amy details:

(LSO Next Generation) is young people who have shown exceptional potential instrumentally, creatively…they go through the selection day with LSO musicians…only 50 kids. ... It sits kind of uncomfortably with some people, but at the same time you need to be able to provide that opportunity for real high flyers.

While less exclusive than these practices, Trial By Invitation practices maintain some exclusivity in the COP.

Practices promoting inclusivity, in ascending order from left to right, include Celebrating Engagement, Skill Stretching, Brokering Knowledge, and Open Experiencing. As an example of Celebrating Engagement, member-only events are provided to high-volume bookers, including privileged mixing with star performers. The LSO Early Years programs include Skill Stretching practices that gently *foster* competence in young musicians unselectively:

I wanted him (my grandson) to enjoy music and really have pleasure with it, we would love him to play an instrument or sing, and we are more excited by him getting familiar with music...Noah is very non-participative. He will just sit there and do nothing and Carla (LSO facilitator) would always say "don't force him, he will participate when he is ready", and it has taken a year and a half for him to do things in the class, even though he did things at home from the beginning. (Emily, accompanying her grandson Noah to Early Years sessions)

Knowledge brokering *illuminates* the music in the form of explanations by conductors, often with illustrative musical extracts, to enhance the concert experience by those lacking the knowledge that would help them access meaning from the music. Finally, the most inclusive category of practices is Open Experiencing. These are demonstrated at free concerts at Trafalgar Square and online, as well as open rehearsal sessions *sampled* by various audiences:

(Open rehearsal) is absolutely more magical (than formal concerts), because you see it all coming together and you realise there is so much interpretation to music, it is so powerful. Especially my children they love music, so for them to see it is not just notes, it is not just that technical ability. There is a mastery that comes beyond the technical ability, that has to do with it coming together and telling a story. (Julie, parent)

'Telling a story' is a phrase indicative of the way technical knowledge and competence converge and are rendered accessible, evident in the associations between the music and people's life experiences. A striking example was recounted by cellist Sebastian, about playing with a group of five disabled students, one of whom was put to the side due to his disturbing habit of grinding his teeth:

It was a Schubert quintet, which is serious music, obviously high-quality music. This kid then with the teacher helping him managed to write down what his feelings about the music were. And he wrote this whole story about how he had imagined how he was with his mother again, floating down this river. Obviously he wasn't with his mother, he was living in a school away from his family...just seeing that, seeing the power music can have to unlock the emotions someone has, I think the teachers were knocked back by the impact it had on this kid.

Returning to the center of the figure, four supra categories designate themes for the practices, in Reinforcing, Fostering, Illuminating, and Sampling competences, albeit in overlapping, yet distinct ways that simultaneously maintain exclusivity and promote inclusivity. To elaborate, Excellence Celebration lauds and hence reinforces exclusivity, while Engagement Celebration rewards participation inclusively; in fostering members' competences, Selective Integration excludes others, while Skill Stretching includes them, albeit with less ambitious aims; Guided Collaboration illuminates music to exclusive groups, while Knowledge Brokering illuminates inclusively; and Trial By Invitation practices provide exclusive sampling of the COP, while Open Experiencing practices allow sampling more inclusively.

Ultimately the dual sets of practices accomplish three goals for the COP and its members: competence alignment, participation legitimacy, and identity diffusion (which we show as outcomes at the bottom of Figure 1). First, these practices align access to participation with the competences individuals demonstrate and develop. Second, the practices signal these diverse extents and natures of participation as being legitimate . Third, the practices facilitate identity diffusion in supporting heterogeneous individual and social identities. There are at once selective and self-selective aspects to the trajectories comprising competence journeys, as Vicky describes:

> From the audition process, we may find someone who plays in a way we are looking for...so various candidates will be chosen and will work within the section, and for quite a long time … you need to give people the opportunity to think, crikey, they play the sort of thing like *this* (her emphasis), not like I do. You need to give people the opportunity to see how we play and fit in with us, not just us but the orchestra as a whole. (Vicky, LSO player)

Discussion

Decrypting the dual forces of exclusion and inclusion is important in documenting the dynamic collaboration required for successful competence journeys into CsOP. This research identifies specific practices and shows their dual work in aggressively developing high competence and being forgiving of lower competence, both of which are necessary in sustaining a high-competence COP. In contributing to the COP literature, our research points to the importance of constructing and populating initiating scenarios that provide guidance in role playing, convey knowledge and ritualized activity, and reward taste dispositions, judgments, and posturings that together structure and reproduce participation. Second, we identify the accomplishments of such simultaneously inclusionary *and* exclusionary practices in aligning competences, legitimizing different levels of participation, and facilitating identity diffusion. Early assumptions were evident in both CCT (Schau et al. 2009; Schouten and McAlexander 1995) and COP (Lave and Wenger 1991) literatures that aspirant community members desire and follow a predictable trajectory from the periphery of the community to its 'expert' center. The variable negotiations of inclusion we have uncovered add substance and nuance to Wenger-Trayner and Wenger-Trayner's (2015) challenges to this myth of an archetypal journey. Finally, we contribute to the CCT literature in highlighting the bidirectional flow merging consumption and production practices that sustains the work, skill and community that make participation in a COP desirable, pleasurable and worthwhile.

REFERENCES

Arsel, Zeynep and Jonathan Bean (2013), "Taste Regimes and Market-Mediated Practice," *Journal of Consumer Research*, 39 (5), 899-917.

Arsel, Zeynep and Craig J. Thompson (2011), "Demythologizing Consumption Practices: How Consumers Protect Their Field-Dependent Identity Investments from Devaluing Marketplace Myths," *Journal of Consumer Research*, 37 (5), 791-806.

Bourdieu, Pierre (1993), *The Field of Cultural Production,* Cambridge: Polity Press.

Campbell, Colin (2004), "I Shop Therefore I Know that I Am: The Metaphysical Basis of Modern Consumerism," in *Elusive Consumption: Tracking New Research Perspectives*, ed. Karin Ekstrom and Helen Brembeck, Oxford: Berg, «n01». &, & of Botox Cosmetic.contributes to the 27–44.

Cova, Bernard and Danielle Dalli (2009), "Working Consumers: The Next Steps in Marketing Theory?" *Marketing Theory,* 9, 315–39.

Firat, A. Fuat and Alladi Venkatesh (1995), "Liberatory Postmodernism and the Reenchantment of Consumption," *Journal of Consumer Research*, 22 (3), 239-267.

Goulding, Christine, Avi Shankar, and Robin Canniford (2012), "Learning to be Tribal: Facilitating the Formation of Participant Tribes," *European Journal of Marketing*, 47 (5–6), 813–32.

Hartmann, Benjamin (2016), "Peeking Behind the Mask of the Prosumer: Theorizing the Organization of Consumptive and Productive Practice Moments," *Marketing Theory,* 16 (1), 3-20.

Holt, Douglas B. (1998), "Does Cultural Capital Structure American Consumption?" *Journal of Consumer Research,* 25 (1), 1-25.

Kelleher, Carol, Hugh N. Wilson, Emma K. Macdonald, and Joe Peppard (2019), "The Score is Not the Music: Integrating Experience and Practice Perspectives on Value Co-creation in Collective Consumption Contexts," *Journal of Service Research*, 22 (2), 120-38.

Kjeldgaard, Dannie, Søren Askegaard, Jannick Ø. Rasmussen, and Per Østergaard (2017), "Consumers' Collective Action in Market System Dynamics: A Case of Beer," *Marketing Theory,* 17 (1), 51–70.

Lave, Jean, and Etienne Wenger (1991), *Situated Learning: Legitimate Peripheral Participation*, Cambridge, UK: Cambridge University Press.

Maciel, Andre and Melanie Wallendorf (2017), "Taste Engineering: An Extended Consumer Model of Cultural Competence Constitution," *Journal of Consumer Research,* 43 (5), 726-46.

Mulligan, Mark, Keith Joplin, and Zach Fuller (2019), *The Classical Music Market: Streamings' Next Genre*, White paper commissioned by IDAGIO, May, retrieved from https://www.midiaresearch.com/app/uploads/2019/06/MIDiA-Research-IDAGIO-Classical-Music-Market_June19.pdf.

Rook, Denis W. (1985), "The Ritual Dimension of Consumer Behavior," *Journal of Consumer Research*, 12 (3), 251–64.

Schau, Hope Jensen, Albert Muñiz Jr., and Eric J. Arnould (2009), "How Brand Community Practices Create Value," *Journal of Marketing,* 73 (5), 30-51.

Schouten, John W. and James H. McAlexander (1995), "Subcultures of Consumption: An Ethnography of the New Bikers," *Journal of Consumer Research*, 22 (1), 43-61.

Spiggle, Susan (1994), "Analysis and interpretation of qualitative data in consumer research," *Journal of Consumer Research,* 21 (3), 491–503.

Thomas, Tandy C., Linda Price, and Hope J. Schau (2013), "When Differences Unite: Resource Dependence in Heterogeneous Consumption Communities," *Journal of Consumer Research*, 39 (5), 1010-33.

Tumbat, Gulner and Russell W. Belk (2011), "Marketplace Tensions in Extraordinary Experiences", *Journal of Consumer Research*, 38 (1), 42-61.

Turner, Victor (1969), *The Ritual Process*, Chicago: Aldine.

Wenger-Trayner, Etienne and Beverly Wenger-Trayner (2015), "Learning in a Landscape of Practice: A Framework", in *Learning in Landscapes of Practice: Boundaries, Identity, and Knowledgeability in Practice-based Learning,* ed. Etienne Wenger-Trayner, Mark Fenton-O'Creevy, Steven Hutchinson, Chris Kubiak, and Beverly Wenger-Trayner, London: Routledge, 13-30.

Weijo, Henri A., Diane M. Martin, and Eric J. Arnould (2018), "Consumer Movements and Collective Creativity: The Case of Restaurant Day," *Journal of Consumer Research*, 45 (2), 251-74.

The Effect of Product Reviews on Post-Purchase Usage:
The Role of Consumer Incompetence Image Concerns

Matthew Philp, Ryerson University, Canada
Marcelo Vinhal Nepomuceno, HEC Montréal, Canada

EXTENDED ABSTRACT

Product reviews, such as expert critiques on news websites, blog posts, or consumer generated comments, are influential and easy to find. Negative reviews specifically, can result in decreasing sales (Reinstein and Snyder 2005), poor product evaluations (Wyatt and Badger 1984), and even harm a firm's net present value (Goldenberg et al. 2007). Product reviews, however, do not only apply to potential consumers *pre-purchase*, as it is common for existing consumers to also seek out and read reviews for the products they already own *post-purchase* (Hennig-Thurau and Walsh 2003). Yet, how product reviews influence consumers post-purchase is not fully understood. What if a consumer is satisfied with the product they purchased, but later discover that it has received negative reviews? How might this influence their interaction with the product going forward?

Fundamentally, product reviews are intended to help *potential* consumers with their choices, helping them assess value prior to spending any money. From this prospective, product reviews should be unnecessary and irrelevant for current owners because they can simply use and assess its functionality themselves. However, given the public nature of reviews, other people will likely formulate opinions of products, and with it, the decision-making abilities of anyone who already purchased that same product. Therefore, for current owners, a negative product review will not only inform them that they possibly made an incompetent consumption choice, but that others will think they are incompetent also.

As for how this could impact product usage, we draw from impression-management theory (Tedeschi 1981) where sometimes creating, managing, or avoiding particular impressions requires inaction. For example, not sharing positive word-of-mouth to preserve an image of uniqueness (Cheema and Kaikati 2010), not sharing negative word-of-mouth to avoid an image of incompetence (Philp and Ashworth 2020; Philp, Pyle, and Ashworth 2018), or not using a product to protect an image of frugality (Philp and Nepomuceno 2020).

Taken together, our formal predictions are based on two central ideas: first, negative reviews can be taken as evidence of the consumer incompetence of those who have already bought that product. Second, is that current owners will anticipate that using the product will portray the negative and undesirable image as an incompetent consumer to others. Therefore, to avoid this possibility, consumers will decrease the usage of their product. More formally,

Hypothesis 1:   *Negative product reviews will decrease the usage of current owners.*

Hypothesis 2:   *Image concerns of appearing as an incompetent consumer will mediate this relationship.*

Method

Study 1 collected data from Steam.com and MetaCritic.com to analyze how expert reviews influenced average videogame playtime of current game owners (i.e., product usage). Our results found that expert reviewers' game ratings from MetaCritic.com were positively associated with the average playtime for each game (β = .242, t(84) = 3.473, p < .001).

Study 2 (N = 47) participants downloaded a cellphone usage application. In a single-factor three-level (Review Valence: Positive, Negative, No-Review) between-subjects design, participants read either a positive, negative, or no-review regarding their cellphone. Results showed that reading a negative review significantly decreased usage in comparison to reading a positive review (Ms = -272.26 vs. -72.59; $t(44)$ = -5.10, $p < .001$) or no-review (Ms = -272.26 vs. -115.46; $t(44)$ = -5.02, $p < .001$). The change in usage did not significantly differ between reading a positive review and no-review (Ms = -72.59 vs. -115.46; $t(44)$ = -1.62, $p = .113$).

Study 3 (N = 85) followed a 2(Review Valence: Positive, Negative) X 2(Product Visibility: High, Low) between-subjects design. Participants read about purchasing a product that was highly visible or not when used, then read a positive or negative review about that product, they then completed measures of usage intentions and incompetence image concerns. Results supported H1, where usage intentions of current owners were lower after reading a negative compared to positive review, but only when the product was more visible (Ms = 4.81 vs. 5.82; $F(1, 81)$ = 6.75, $p = .011$). The same difference did not exist when the product was less visible when in use (Ms = 5.92 vs. 5.65; F (1, 81) = .60, $p = .441$). Furthermore, this difference of high versus low product visibility on usage intentions was larger following negative reviews (Ms = 4.81 vs. 5.92; $F(1, 81)$ = 8.64, $p = .004$) than positive reviews (Ms = 5.82 vs. 5.65; $F(1, 81)$ = .21, $p = .651$). Process evidence (model 7; Hayes 2017) supported that incompetence image concerns mediated the effect (Figure 1).

Study 4 (N = 279), in a 2(Review Valence: Positive, Negative) X 2(Reviewer: Novice, Expert) between-subjects design, participants searched for either positive or negative reviews written by experts or regular consumers about products they already actually own. Participants then completed the same questionnaire as Study 3. The results replicated the previous studies, where usage intention decreased following negative reviews compared to positive, but only when the review was written by an expert (Ms = 6.34 vs. 6.79; $F(1, 275)$ = 12.54, $p < .001$). Identifying a boundary condition, this same effect did not hold for reviews from novice reviewers (Ms = 6.73 vs. 6.58; $F(1, 275)$ = 1.74, $p = .188$). Similarly, process evidence (model 7; Hayes 2017) supported that incompetence image concerns mediated the effect (Figure 1).

General Discussion

The current study presented a theory and empirical evidence that negative product reviews can have an impact on already satisfied consumers. Specifically, negative product reviews can increase image concerns about appearing as an incompetent consumer which diminishes future usage. This research demonstrates that because of negative reviews, current consumers of those products are less likely to get the full life out of their product, likely declining usage prematurely, a behavior that renders otherwise personally satisfactory products into de-facto waste. Overall, this research exposes an interesting paradox, that some people may avoid using the products they own, despite being satisfied with its performance, to avoid the possibility of appearing as an incompetent consumer.

REFERENCES

Cheema, Amar, and Andrew M. Kaikati (2010), "The effect of need for uniqueness on word of mouth," *Journal of Marketing Research,* 67 (June), 533-563.

Goldenberg, Jacob, Barak Libai, Sarit Moldovan, and Eitan Muller (2007), "The NPV of bad news," *International Journal of Research in Marketing,* 24(3), 186-200.

Hayes, Andrew F. (2017), *Introduction to Mediation, Moderation, and Conditional Process Analysis: A Regression-Based Approach*, 2nd Edition, New York, NY: Guildford.

Hennig-Thurau, Thorsten and Gianfranco Walsh (2003), "Electronic word-of-mouth: Motives for and consequences of reading customer articulations on the Internet," *International Journal of Electronic Commerce,* 8(2), 51-74.

Philp, Matthew, and Laurence Ashworth (2020), "I should have known better!: When firm-caused failure leads to self-image concerns and reduces negative word-of-mouth," *Journal of Business Research* 116, 283-293.

Philp, Matthew, and Marcelo Nepomuceno (2020), "When the frugal become wasteful: An examination into how impression management can initiate the end-stages of consumption for frugal consumers," *Psychology & Marketing,* 37, 326-339.

Philp, Matthew, Martin A. Pyle, and Laurence Ashworth (2018), "Risking the self: the impact of self-esteem on negative word-of-mouth behavior," *Marketing Letters,* 29(1), 101-113.

Reinstein, David A. and Christopher M. Snyder (2005), "The influence of expert reviews on consumer demand for experience goods: A case study of movie critics," *The Journal of Industrial Economics,* 53 (1), 27-51.

Tedeschi, James T. (1981), *Impression Management Theory and Social Psychological Research,* New York: Academic Press.

Wyatt, Robert O. and David P. Badger (1984), "How reviews affect interest in and evaluation of films," *Journalism Quarterly,* 61 (4), 874-878.

Sharing Like a Boss: How a Consumer's Position in the Hierarchy Influences Word-of-Mouth Valence

Christilene du Plessis, Singapore Management University, Singapore
Michael Schaerer, Singapore Management University, Singapore
David Dubois, INSEAD, France

EXTENDED ABSTRACT

Understanding WOM is crucial because brand success often depends on the type of information people share. Important to marketers is understanding what causes consumers to share positive or negative information, as WOM valence plays a crucial role in the success of products and services (Chevalier & Mayzlin, 2006). One important factor that shapes WOM valence is with whom consumer are communicating (Berger, 2014). Research has established two important audience characteristics that affect WOM valence: tie strength and audience size. Past research shows that people share more positive information when communicating with strangers than with friends (Dubois, Bonezzi, & De Angelis, 2016; Chen, 2017) as well as with larger (vs. smaller) audiences (Barasch & Berger, 2014).

Although tie strength and audience size are important, we propose a third dimension that can explain when consumers share more positive or negative information: the *hierarchical relationship* between WOM senders and recipients. Social hierarchies, defined as "an implicit or explicit rank order of individuals or groups with respect to a valued social dimension" (Magee & Galinsky 2008, p. 354), permeate almost every aspect of society, and, as a result, people often share WOM with individuals that occupy higher or lower relative rank. Indeed, in a survey of 255 working adults, we found that 90.2% regularly engage in WOM at work – an inherently hierarchical environment.

Given the prevalence of WOM in hierarchies, we investigate *whether*, *when and why* the hierarchical relationship between a WOM sender and recipient influences WOM valence. We propose that consumers share less positive messages with lower (vs. equal or higher) rank recipients. Because higher-ranked people have an increased ability to control their own and others' outcomes, they are less dependent on others (Fiske, 1993). Consequently, higher-ranked people have lower desire to affiliate with those below them in the hierarchy (Lammers, Galinsky, Gordijn, & Otten, 2012) and may even actively engage in distancing behaviors (Earle, Giuliano, and Archer 1983). Since sharing positive information facilitates interpersonal closeness (Brissette, Scheier, & Carver, 2002), and people share positive information to foster social connections (Bell, 1978), we predict that senders will share less positive WOM with recipients who are lower (vs. equal or higher) in rank.

In **Study 1** (*n*=393), participants watched an animated short film and either wrote down their thoughts about the film (baseline condition), or what they would say about it to their peer (equal-rank condition), supervisor (low-rank condition), or subordinate (high-rank condition). We created a positivity index by subtracting the number of negative attributes from the number of positive attributes. Participants in the high-rank condition sent less positive messages (*M*=.82, *SD*=2.15) than participants with low rank (*M*=1.54, *SD*=2.14), *F*(1,391)=4.55, *p*<.05), baseline participants (*M*=1.58, SD=2.82, *F*(1,391)=5.19, *p*<.05), and participants in the peer condition (*M*=1.68, SD=2.27, *F*(1,391)=6.32, *p*=.01).

Study 2 tested the consequences for message reception. In Part 1, participants (*n*=36*)* read a description of car and wrote a message about it to a colleague ranked lower (vs. higher) to them in their team. In Part 2, participants (*n*=368) read one of the messages from Part 1 and indicated how much they would pay, how willing they are

to buy, their intention to inspect and their attitudes towards (α=.96) the car. They also indicated their intention to contact the seller. Multi-level mediation analyses with sender rank as independent variable (1=lower-rank recipient, -1=higher-rank recipient), and WOM valence as mediator, revealed a significant and negative indirect effect of sender rank on recipients' willingness to pay (*ab*=-.31, *S.E.*=.16, 95% LLCI=-.71, ULCI=-.07), willingness to buy (*ab*=-.38, *S.E*=.18, 95% LLCI=-.77, ULCI=-.09), intention to inspect (*ab*=-.38, *S.E*=.19, 95% LLCI=-.78, ULCI=-.08), intention to contact seller (*ab*=-.35, *S.E*=.17, 95% LLCI=-.71, ULCI=-.08) and product attitudes (*ab*=-.37, *S.E*=.16, 95% LLCI=-.73, ULCI=-.11), through WOM valence.

Study 3 tested our proposed mechanism in a competing mediation model. Participants (*n*=203) were randomly assigned to a high or low rank condition. We also measured need for affiliation (*α*=.85), felt responsibility toward interaction partner (*α*=.91), and role expectations (*r*=.44, *p*<.001). Replicating previous studies, participants in the high-rank condition (*M*=.55, *SD*=2.26) wrote less positive messages than participants in the low-rank condition (*M* = 1.19, *SD*=2.03), *t*(201)=2.15, *p*<.05). Importantly, the competing mediation revealed a significant indirect effect through need for affiliation (*ab*=-.11, *SE*=.05, 95% LLCI=-.24, 95% ULCI=-.03), but not through responsibility (*ab*=.003, *SE*=.02, 95% LLCI=-.02, 95% ULCI=.06), or role expectations (*ab*=.003, *SE*=.03, 95% LLCI=-.05, 95% ULCI=.06).

In Studies 4-5 we provide additional process evidence by manipulating need for affiliation. In **Study 4**, participants (*n*=472) watched a short film and wrote down what they would say about it to their supervisor (low-rank condition) or subordinate (high-rank condition). A third condition was included in which participants were instructed to write a message to their subordinate but were told that the goal of writing their message was to bond with the recipient (high-rank + affiliation motive condition). Participants in the high-rank condition wrote less positive messages (*M*=.93, *SD*=1.99) than participants in the low-rank condition (*M*=1.47, *SD*=1.90), *F*(2,469)=6.72, *p*<.01), but not when their affiliation motive was activated (*M*=1.65, *SD*=1.66, *F*(2,469)=.80, *p*=.37). There was no difference in message positivity between the low-rank and the high-rank + affiliation conditions, *F*(1,310)=0.86, *p*=.35.

In **Study 5**, we varied need for affiliation by manipulating whether senders expect to interact with the recipient in the future. In interactions where people expect to depend upon one another in the future (vs. not), the need to affiliate increases (Danheiser & Graziano, 1982). Participants (*n*=394) again watched an animated short and were then randomly assigned to a 2(rank: lower, higher) x 2(expect future interaction: no, yes) between-subjects design. Supporting our hypothesis, when senders did not expect to interact with the message recipient in the future, those with higher rank sent less positive messages (*M*=.41, *SD*=1.91) than those with lower rank (*M*=1.12, *SD*=2.13, *F*(1,393)=5.54, *p*<.05). When senders expected to interact with the message recipient in the future, there was no difference in WOM valence, *F*(1,393)=.04, *p*=.84.

Jointly, these studies contribute by identifying a novel sender characteristic that influences WOM content (hierarchical rank) and suggest that the need for affiliation is a key driver of positive WOM.

REFERENCES

Barasch, A., & Berger, J. (2014). Broadcasting and Narrowcasting: How Audience Size Affects What People Share. *Journal of Marketing Research*, *51*(3), 286-299.

Bell, P.A. (1978). Affective State, Attraction, and Affiliation: Misery Loves Happy Company, Too. *Personality and Social Psychology Bulletin*, *4*(4), 616 619.

Berger, J. (2014). Word of Mouth and Interpersonal Communication: A Review and Directions for Future Research. *Journal of Consumer Psychology*, *24*(4), 586-607.

Brissette, I., Scheier, M. F., & Carver, C.S. (2002). The Role of Optimism in Social Network Development, Coping, and Psychological Adjustment during a Life Transition. *Journal of Personality and Social Psychology*, *82*(1), 102-111.

Chen, Z. (2017). Social Acceptance and Word of Mouth: How the Motive to Belong Leads to Divergent WOM with Strangers and Friends. *Journal of Consumer Research*, *44*(3), 613-632.

Chevalier, J.A., & Mayzlin, D. (2006). The Effect of Word of Mouth on Sales: Online Book Reviews. *Journal of Marketing Research*, *43*(3), 345-354.

Danheiser, P., & Graziano, W.G. (1982). Self-Monitoring and Cooperation as a Self-Presentational Strategy. *Journal of Personality and Social Psychology*, *42*(3), 497-505.

Dubois, D., Bonezzi, A., & De Angelis, M. (2016). Sharing with Friends Versus Strangers: How Interpersonal Closeness Influences Word-of-Mouth Valence. *Journal of Marketing Research*, *53*(5), 712-727.

Earle, W.B., Giuliano, T., Archer, R.L. (1983). Lonely at the Top: The Effect of Power on Information Flow in the Dyad. *Personality and Social Psychology Bulletin*, *9*(4), 629-637.

Fiske, ST. (1993). Controlling Other People: The Impact of Power on Stereotyping. *American Psychologist,* 48 (6), 621.

Lammers, J., Galinsky, A. D., Gordijn, E. H., & Otten, S. (2012). Power Increases Social Distance. *Social Psychological and Personality Science*, *3*(3), 282 – 290.

Magee, J.C., & Galinsky, A.D. (2008). Social Hierarchy: The Self-Reinforcing Nature of Power and Status. *Academy of Management Annals, 2*(1), 351-398.

I Am Too Good to Be True: How Self-Enhancement Motivations Shape Prosocial Behavior of Entitled Individuals

Alexandra Polyakova, University of Sussex Business School, UK

EXTENDED ABSTRACT

In the past decade the level of prosocial behavior has raised some concerns. At the same time, an empathic concern, which is considered to be one of the main predictors of prosocial behavior, is decreasing. Lack of empathy and less forgiving attitudes are one of the main characteristics of entitlement Entitlement, or feeling of deserving more than others, is negatively related to pro-social behavior (Campbell et al., 2004). We suggest that entitled individuals would engage in prosocial behavior more when there is an opportunity to self-enhance compared to when there is no opportunity to self-enhance. Since prosocial behavior is performed to benefit others rather than self, entitled individuals would be unlikely to behave in such a way unless they see a clear opportunity to benefit themselves in such a situation.

> *Hypothesis 1:* *Entitled individuals will exhibit more prosocial behavior when such behavior provides an opportunity for self-enhancement (vs. when there is no opportunity for self-enhancement).*

Individuals act more prosocially in the public sphere than in private settings (Ariely et al., 2009). Since one of the main motivations of entitled individuals is to appear in a positive light in front of others and themselves, they would be even more inclined than other individuals to engage in prosocial behavior when such behavior is observable by others (i.e., public context) rather than when there are no witnesses (vs. private context):

> *Hypothesis 2:* *Entitled individuals will exhibit more prosocial behavior when such behavior is performed in a public (vs. private) context.*

Previous research has demonstrated that entitled individuals are driven by a desire to attain status (Lange et al., 2019). Higher social status fulfills the desires of entitled individuals. Entitlement is correlated with the desire to have high-status symbols, such as a perfect romantic partner

We propose that entitled individuals will be attracted by other possibilities that allow them to feel they belong to a small group of high status people

> *Hypothesis 3:* *Entitled individuals will exhibit greater intention to donate to a charity cause/organization when the social status of other donors is high (vs. low).*

We test our predictions in three studies. We both manipulate (Studies 1 & 2) and measure entitlement (Study 3).

Study 1. 140 US-based MTurk participants completed the study online. This study used a 2 (entitlement: yes vs. no) x 2 (self-enhancement opportunity: yes vs. no) between-subjects design. We adopted entitlement manipulation from Poon et al. (2013). Participants in the self-enhancement condition were told that they could make a donation that would highlight their unique personality: a donation in honor of their friends. Participants in the no_self-enhancement condition were told that their donation would help people in need. Participants indicated their likelihood to donate a portion of the money they would earn through MTurk to the charity. ANOVA results revealed a significant interaction of entitlement and self-enhancement on the likelihood to donate (F(1, 136) = 10.84, p = .001). In the self-enhancement condition, participants were more likely to donate when they were in the entitlement (vs. no_entitlement) condition, Mentitlement = 3.31, SD = 1.92 vs. Mno_entitlement = 2.18, SD = 1.64, F(1, 136) = 6.73, p < .05.

We suggest that another way of increasing the amount of donations from entitled individuals is to give them a chance to make a donation in a public (vs. private) context, which was tested in Study 2. 116 MTurk US-based participants completed the study online.

Study 2 had a 2 (entitlement: yes, no) x 2 (donation context: public, private) between-subjects design. Participants were assigned to public vs. private conditions. Then, participants indicated their likelihood to donate to support the charity. Study 2 results showed that participants in the entitlement public condition were more likely to make a donation (Mpublic = 4.03, SD = 2.00 vs. Mprivate = 2.89, SD = 1.71, F(1,112) = 4.41, p <.05.

Study 3. 120 US-based adults from Amazon MTurk participated in the study. First, we measured participants' level of entitlement (PES, α = .94). Next, participants were randomly assigned to one of two conditions (other donors' status: high vs. low). Participants read a donation appeal describing a charity that raises funds to fight a fictitious disease. Participants in the other donors' status: high condition read that this foundation was previously supported by Leonardo DiCaprio and Taylor Swift, whereas participants in the other donors' status: low condition read that micro-bloggers as Emily Wracker and Elise Young previously donated to this foundation. Then participants indicated their likelihood to donate to the foundation. We ran a regression using PROCESS (Model 1, Hayes, 2013). In the model, other donors' status manipulation (0 = low; 1 = high), sense of entitlement and the interaction between the two, served as the predictors of participants' donation likelihood. The interaction between sense of entitlement and the other donors' status manipulation was significant (b = .465; SE =.233, t(116) = 1.99, p < .05). Results show that the effect is driven by high levels of entitlement (levels above 1.356 for mean-centered scale).

The current research contributes to the literature on prosocial behavior. During the time when more and more individuals demonstrate less concern about others and volunteering and helping behavior is declining understanding ways of influencing such individuals hold particular relevance.Current research demonstrates that if one is not particularly concerned about others' welfare (for example, when someone's level of entitlement is high), their prosocial behavior might be positively influenced by providing an opportunity to self-enhance.

REFERENCES

Ariely, D., Bracha, A., & Meier, S. (2009). Doing good or doing well? Image motivation and monetary incentives in behaving prosocially. *The American Economic Review*, *99*(1), 544-555.

Campbell, W. K., Bonacci, A. M., Shelton, J., Exline, J. J., & Bushman, B. J. (2004). *Psychological entitlement: Interpersonal consequences and validation of a self-report measure. Journal of Personality Assessment, 83(1), 29-45.*

Hayes, A. F. (2013). *An introduction to mediation, moderation, and conditional process analysis*, New York: The Guilford Press.

Poon, K., Chen, Z. & DeWall, N. (2013). Feeling Entitled to More: Ostracism Increases Dishonest Behavior. *Personality and Social Psychology Bulletin*, *39*(9), 1227-1239.

The Theatre of Experience: Brand-Consumer Dynamics in Multimedium Environments

Kimberley Preiksaitis, Siena College, USA
Alex Mitchell, California State Polytechnic University, Pomona, USA

EXTENDED ABSTRACT

Driven by a broader social context of an experience economy (Pine and Gilmore 1999; Schmitt 1999), brands are increasingly offering extraordinary experiences to garner consumer attention and situate themselves in social and cultural life in ways that deeply resonate with consumers. Prior studies of extraordinary experiences largely focus on experiential consumption activities linked with brands' commercial offerings in emplaced servicescapes, however brands increasingly engage with consumers through experiences transcending emplacement (Singh and Sonnenburg 2012). While brands engage with audiences across both emplaced and online settings, consumer research does not fully examine hybrid experiential domains; studies are largely bifurcated into those that focus on emplaced realities of spectacular retail environments (Diamond et al. 2009; Kozinets et al. 2004), contrasted with those that explore digital experiences (Arvidsson and Caliandro 2015; Singh and Sonnenburg 2012).

To examine situations of experiential consumption that span both the emplaced and online, we ground our conceptual framework in theories of performance (Deighton 1992; Giesler 2008; Grove and Fisk 1983; Thompson and Üstüner 2015). Complementing and extending existing perspectives in the marketing literature, we extend the performance paradigm in marketing via social performances (Alexander 2004a, 2004b, 2011, 2017). Social performances are processes by which actors attempt to convey meanings to an audience that are sincere, authentic, and culturally valid in order to achieve a desired outcome.

We analyze consumption of extraordinary experiences in a context that blends both emplaced and online audiences, with a view to understanding how interactions within and across audiences contributes to unity and fragmentation of these groups. We observe the social performance of Taco Bell's *The Bell: A Taco Bell Hotel and Resort*, which promised to provide guests with an immersive, thematic experience. Our data consists of netnographic data in the form of Twitter postings and real-time observation of online social media discourses as well as phenomenological interviews with consumers and media. Our qualitative analysis aggregates our immersive performance observation, Twitter data set, and depth interviews through interactive sensemaking and triangulation (Spiggle 1994). Our goal is to develop an interpretation of how the performance is understood from the perspective of the emplaced and online audience members, as well as how these audience groups interact.

We argue for extending the concept of *brand performances* as a way to theorize the complex social interactions that occur through extraordinary experiences. We theorize brand performances as a particular kind of social performance in which brands attempt to communicate the "meaning of their social situation" (Alexander 2004a) to a target audience. Brand performances are theatrical in the sense that they are purposefully undertaking by a brand, involve a cultural script that aligns with a core identity the brand wishes to convey, and are executed in a time-delimited format (i.e., episodic). The brand's goal is to enact a performance that a target audience interprets as sincere, authentic, and culturally legitimate (Alexander 2004a).

Our findings reveal that brand performances take place over a trajectory composed of discrete periods demarcated by changes in audience interactions. We find these changes are largely the result of brand-initiated actions connected with the performances that serve to fragment the audience. Further, we identify six social mechanisms by which audiences interact throughout the performance periods, linked with audience interpretations of the performance as (in)sincere, (in)authentic, and culturally (in)valid. These mechanisms involve speculating, campaigning for inclusion, recruiting interpreters, articulating the lived experience of the performance, counterperforming and rejecting.

While prior scholarship focuses on communications between brands and consumers in either emplaced or online settings, our study analyzes how consumers consume extraordinary experiences in a context that blends both emplaced and online consumption audiences with a view to understanding how interactions within and across audiences contribute to the unity and fragmentation of these groups. Through our performance framework, we highlight brand performances as a way for brands to communicate the meaning of their social situation with consumers in both emplaced and online settings. Through this lens, we illustrate opportunities of fusion and de-fusion for both emplaced and online audience members. These findings can help better understand brand-consumer dynamics in contemporary market contexts with regards to successful brand storytelling, consumer agency, and cultural memory.

Introduction and Conceptual Integration

Brands in the contemporary "experience economy" (Pine and Gilmore 1999; Schmitt 1999) increasingly develop extraordinary experiences in attempts to break through the noise of the marketplace to provide meaningful experiences for consumers. Prior literature explores consumption of extraordinary experiences offered by service providers to extend our understanding of the experiential dimensions of consumption (Holbrook and Hirschman 1982). For example, in-depth investigations of skydiving (Celsi, Rose, and Leigh 1993), river rafting (Arnould and Price 1993), theme parks (O'Guinn and Belk 1989), mountain climbing (Tumbat and Belk 2011), pilgrimages (Higgins and Hamilton 2019), raves (Goulding et al. 2009), trade shows (Peñaloza 2001) and festivals (Kozinets 2002) have broadened our understanding of meaning-making in extreme consumption experiences.

While this extensive literature provides an understanding that experiences are a medium for cultural communication of meaning between and amongst brands and consumers, this work focuses on consumers and consumption linked with emplaced experiences. This is not surprising. As Diamond et al. (2009) note, the expansion of qualitative explorations into consumer experience coincides with the peak of spectacular "retail theater." However, brands increasingly engage with consumers through experiences transcending emplacement (Singh and Sonnenburg 2012). To paraphrase Gieryn (2000), digital environments are not places in the same way as pilgrimages, river rafting, or themed retail servicescapes. Yet, they are no less important as sites of experiences and communication of cultural meaning between consumers and brands (Arvidsson and Caliandro 2015; Giesler 2008; Holt 2016; Singh and Sonnenburg 2012).

Consumer research has yet to fully develop insights into the nature of consumption experiences in hybrid experiential domains—experiences that are characterized by interactions within and between emplaced and online audiences. Studies are largely bifurcated into those that focus on the emplaced realities of spectacular retail environments (Diamond et al. 2009; Kozinets et al. 2004), contrasted

with those that explore digital experiences (Arvidsson and Caliandro 2015; Singh and Sonnenburg 2012). However, contemporary consumer experiences are manifestly composed of hybrid environments blending emplaced and online mediums. These environments are characterized by an array of social interactions involving a wide range of actors, including consumers of varying degrees of brand affiliation (Arvidsson and Caliandro 2015), the media (Humphreys and Thompson 2014), and brands, to name a few.

To examine situations of experiential consumption that span both the emplaced and online, we ground our conceptual framework in theories of performance (Deighton 1992; Giesler 2008; Grove and Fisk 1983; Thompson and Üstüner 2015). Complementing and extending existing perspectives in the marketing literature, we extend the performance paradigm in marketing via social performances (Alexander 2004a, 2004b, 2011, 2017). Social performances are processes during which actors attempt to create emotional connections between themselves, their script, and an audience in order to "display for others the meaning of their social situation" (Alexander 2004a). A performance is successful to the extent others find the performance sincere and authentic in its portrayal of relevant symbolic cultural content. For Alexander, successful performances achieve fusion between actor and audience consistent with the shared understanding typically ascribed to rituals, where action and cultural scripts are seamlessly woven together (Bradford and Sherry 2015; Rook 1985). Fusion occurs when an actor conveys cultural meaning to an audience and elicits an emotional connection between audience, actor, and script. Such performances are considered to be "real," "authentic," and "truthful" (Alexander 2004a). De-fusion is the failure of the performance to achieve connection and results in audience feelings of disbelief and inauthenticity of the performance and actor(s) involved.

Unsuccessful performances typically spawn attempts by audiences to enact counterperformances designed to articulate alternative cultural meanings (Alexander 2004b, 2004a). Alexander theorizes de-fusion to be the norm, rather than the exception, in complex societies consistent with conditions of social drama (Alexander 2017). Thus, for all performances fusion is not guaranteed. The central issue becomes how actors attempt to achieve fusion during the performance as well as audience dynamics associated with the performance's reception.

In this research, we observe brands behaving as actors enacting social performances to convey cultural scripts for the purpose of convincing consumers that brand actions and behaviors are sincere, authentic, and culturally valid. The extent that fusion occurs between brand and consumer audiences is partially an outcome of dynamics linked with audiences that are multimedium (i.e., emplaced and online). In this project, we address the question: How do consumers consume social performances in both emplaced and online settings, and what audience dynamics emerge as brands conduct social performances?

Context and Method

To explore the consumption of social performances, we employ a multi-methodological approach to analyze Taco Bell's *The Bell: A Taco Bell Hotel and Resort*. Founded in 1962 in Southern California, Taco Bell serves valued-priced Mexican-style food to a devoted fan following. When announced in May 2019, The Bell hotel promised to provide guests with an immersive, thematic experience in Palm Springs, California, which included everything from welcome tote bags, to in-room mini bars stocked with complimentary Taco Bell items, custom 'The Bell' hotel robes, Taco Bell-themed merchan-

dise, on-brand décor, custom menu items, poolside food service, and various poolside entertainment.

Our data consists of Netnographic (Kozinets 2020) data in the form of Twitter postings and real-time observation of online social media discourses, as well as phenomenological depth interviews conducted with consumers and media involved in the performance. We supplement these sources with examination of traditional media content, company reports, and sociohistorical accounts of the brand's history and cultural connections.

We began our immersive performance investigation when the performance was announced by observing The Bell hotel via Twitter (May 16, 2019) and continued observations until the performance ended in August 2019. We did not contribute to the performance but merely observed via out own personal Twitter accounts. Our immersive investigation includes our own attempts to RSVP on June 27, 2019 and field notes generated during the most intense period of the performance – the dates over which The Bell hotel was operational.

Web scraping techniques, consistent with prior work (Arvidsson and Caliandro 2015), captured "online traces" (Kozinets 2020) relevant to the performance of interest. Between May 16, 2019 and September 11, 2019, (approximately one month after The Bell hotel occurred), we gathered tweets via a Python-based script monitoring select terms (e.g., 'taco' and 'bell' and 'hotel'; '#tacobellhotel'); in sum, our Twitter data set contains 15,832 tweets.

Following the conclusion of the performance, iterative analysis of the Twitter data set led us to identify potential individuals for in-depth phenomenological interviews (Thompson, Locander, and Pollio 1989). Between November 2019 and February 2020 we completed ten interviews via a variety of ways (e.g., skype, in-person, email). Interviews were semi-structured, beginning with grand tour questions (McCracken 1988) and collect and preserve the participants' unique lived experience of the performance in rich detail.

Our qualitative analysis of The Bell hotel performance aggregates our immersive performance observations, Twitter data set, and depth interviews, triangulated with media articles and video artifacts. Social media data was examined iteratively as it was gathered. Twitter data was examined both qualitatively for theme derivation and quantitatively. Interview transcriptions were iteratively coded, analyzed, and compared against the interpretive findings from the Twitter data set, offering a rigorous and structured way to deepen our understanding of the online discourses via iterative sensemaking and triangulation (Spiggle 1994). Our goal is to develop an interpretation of how the performance is understood from the perspective of the emplaced and online audience members, as well as how these audience groups interact.

Research Findings

Brands Conducting Social Performances

Social performances express the meaning of one's social situation and are designed to appear sincere, authentic, and appropriate (Alexander 2004a). Our data illustrates Taco Bell conducting a social performance aimed at communicating aspects of the brand's identity and purpose to a target audience. We argue that The Bell hotel constitutes a particular kind of social performance. Taking inspiration from Singh and Sonnenburg (2012), we maintain that this type of experiential event is a brand performance; a social performance in which a brand attempts to communicate the "meaning of their social situation" (Alexander 2004a) to a target audience. Brand performances are theatrical in the sense that they are purposefully undertaking by a brand, involve a cultural script that aligns with a core identity the brand wishes to convey, and are executed in a time-delimited format (i.e., episodic). The brand's goal is to enact a performance that a

target audience interprets as sincere, authentic, and culturally legitimate (Alexander 2004a). In the case of The Bell hotel, this target audience consists of diehard fans who already know and love the brand and who desire an immersive, brand-curated experience that allows them to celebrate their brand affection in novel ways.

Mapping the Brand Performance Conceptual Trajectory

A conventional performance view would view The Bell hotel in terms of the four-day event where the emplaced audience engages with the hotel context face to face. However, a broadened performative view attunes our analysis to the ways the brand performance is consumed before and after this emplaced period by focusing on the broader time frame where the brand performs its core values and identity in relation to the hotel experience (Alexander 2004a). We argue that brand performances are consumed by emplaced and online environments simultaneously and our analysis reveals key events which serve to transition audience composition and interactions throughout the elongated trajectory of the brand performance, dividing the brand performance into distinct periods: awareness, expectation, event, and long tail (Table 1). Throughout the trajectory of the performance, we observe changes in the nature of the audience, both in how audience members communicate to one another, what roles are played by audience members (e.g., emplaced/online) and reflect audience sentiment regarding the sincerity, authenticity, and cultural validity of the performance.

Mechanisms of Brand Performances

Along the trajectory, we observe members of both the emplaced and online audiences interacting in pursuit of their own particular objectives connected with fusion and de-fusion of the performance. Following Gross (2009, 363), we characterize the purposeful interactions amongst audience members as social mechanisms due to their nature as 'intermediary processes' that unfold over specific portions of the brand performance trajectory (see Figure 1).

Speculating. Audience members invoke various cultural myths in discourses with online audience members to imagine what the event will be like. Conversations among online audience members foster speculation of the brand's identity and how it may map onto the hotel concept.

Campaigning for inclusion. Consumers campaign to be included in the event as emplaced audience members. Those that campaign for inclusion unify in their shared belief in the value of public demonstrations of sacrifice to attain access to the hotel experience. These efforts support audience perceptions that the experience will be valuable and unique—as one of the emplaced audience members told us, a "once in a lifetime event." However, campaigning also contributes to audience fragmentation—audience members who do not earn recognition from the brand of their willingness to participate may display dissatisfaction and ultimately exit the performance.

Recruiting interpreters. Following RSVP where a small number of audience members secure bookings at the hotel, those who do not secure a booking begin appealing to certain individuals, typically social media influencers, to act as interpreters and report back to the online audience about the hotel experience. Notably, members of the online audience wish for a vicarious encounter with the hotel through the 'eyes' of the interpreter's individual experience of it and not so much an objective overview of what the hotel experience offers.

Articulating the lived experience of the performance. Emplaced audience members take it upon themselves to report back to the online audience about the lived experience of the event. For each individual who experiences the hotel, there is special consideration as to who their own audiences include and how they think about showcasing their own lived experience of the hotel to their own audiences. Notably, the brand relies on emplaced consumers to understand, see, and interpret the performance for online audience members as they do not engage directly with consumers via the online environment throughout the performance.

Counterperforming. When performances do not fuse for audience members, some may choose to engage in deliberate attempts to question the validity of the performance by demonstrating alternative interpretations of the performance itself (Alexander 2004a, 2004b). In our data, online audience members enact counterperformances by drawing on cultural myths present within the brand performance as a way to resolve their inability to be part of the emplaced audience. Counterperformances target online audience members and present alternative expressions of the brand performance which showcase elements of fragmentation present in the perspectives of the online audience while allowing their own audiences to unify around the intent of their own counterperformances.

Rejecting. While some audience members engage in counterperforming when a brand performance does not fuse, others reject the performance entirely. While emplaced audience members can literally exit the performance (e.g., exit the experience), online consumers also engage in forms of exit, signaled through their rejection of the performance. We see evidence of rejection arising throughout the event period, continuing through the long tail period.

Discussion

While prior scholarship focuses on communications between brands and consumers in either emplaced or online settings, our study analyzes how consumers consume extraordinary experiences in a context that blends both emplaced and online consumption audiences with a view to understanding how interactions within and across audiences contribute to the unity and fragmentation of these groups. By adopting a performance theory framework drawn from cultural sociology (Alexander 2004a, 2004b, 2011, 2017), integrating existing theatrical (Deighton 1992; Grove and Fisk 1983; Humphreys and Carpenter 2018) and performativity views (Giesler 2008; Thompson and Üstüner 2015; Üstüner and Thompson 2012), we extend the nascent concept of brand performances (Singh and Sonnenburg 2012) to theorize complex social interactions occurring in extraordinary experiential contexts.

Our analysis reveals a more complex audience ecosystem than prior examinations of performances, highlighting that performances take place over a trajectory consisting of distinct periods characterized by changes in audience interactions. We identify six social mechanisms capturing audience interactions linked with fusion and de-fusion of the brand performance.

Through our social performance lens, we illustrate consumers asserting their agency through interactions aimed at both online and emplaced audiences. Critical reflection by those members of the audience for whom the performance de-fuses leads them to pursue counterperformances aimed at asserting alterative interpretations of the cultural contents of the original brand performance. Thus, counterperformances share some characteristics with consumer activism (Kozinets and Handelman 2004) and institutional entrepreneurship (Scaraboto and Fischer 2013) yet are not necessarily aimed at subverting the brand's goals—they do however, serve as cultural material that fragments the audience by providing alternative cultural interpretations of the brand performance.

Finally, brand performances live on in the archived memory of online platforms and thus, continue to serve as cultural material that fans draw on during future interactions across emplaced and online audiences (Anderson 2006). Consumers leverage this cultural

material to make sense of future brand performances. We identify opportunities for further research in the domain of consumer-brand dynamics, which must be more inclusive and expansive in exploring the social ecosystem of which consumer-brand interactions occur.

REFERENCES

Alexander, Jeffrey C. (2004a), "Cultural Pragmatics: Social Performance Between Ritual and Strategy," *Sociological Theory*, 22(4), 527–73.

——— (2004b), "From the Depths of Despair: Performance, Counterperformance, and 'September 11,'" *Sociological Theory*, 22(1), 88–105.

——— (2011), *Performance and Power*, Cambridge: Polity.

——— (2017), *The Drama of Social Life*, Cambridge: Polity.

Anderson, Chris (2006), *The Long Tail: Why the Future of Business Is Selling Less of More*, New York: Hyperion.

Arnould, Eric J. and Linda L. Price (1993), "River Magic: Extraordinary Experience and the Extended Service Encounter," *Journal of Consumer Research*, 20(1), 24–45.

Arvidsson, Adam and Alessandro Caliandro (2015), "Brand Public," *Journal of Consumer Research*, 42(5), 727–48.

Bradford, Tonya Williams and John F. Sherry (2015), "Domesticating Public Space Through Ritual: Tailgating as Vestaval," *Journal of Consumer Research*, 42(1), 130–51.

Celsi, Richard L, Randall L Rose, and Thomas W Leigh (1993), "An Exploration of High-Risk Leisure Consumption Through Skydiving," *Journal of Consumer Research*, 20(1), 1–23.

Deighton, John (1992), "The Consumption of Performance," *Journal of Consumer Research*, 19(3), 362–72.

Diamond, Nina, John F. Sherry Jr., Albert M. Muñiz Jr., Mary Ann McGrath, Robert V. Kozinets, and Stefania Borghini (2009), "American Girl and the Brand Gestalt: Closing the Loop on Sociocultural Branding Research," *Journal of Marketing*, 73(3), 118–34.

Gieryn, Thomas F. (2000), "A Space for Place in Sociology," *Annual Review of Sociology*, 26, 463–96.

Giesler, Markus (2008), "Conflict and Compromise: Drama in Marketplace Evolution," *Journal of Consumer Research*, 34(6), 739–53.

Goulding, Christina, Avi Shankar, Richard Elliott, and Robin Canniford (2009), "The Marketplace Management of Illicit Pleasure," *Journal of Consumer Research*, 35(5), 759–71.

Gross, Neil (2009), "A Pragmatist Theory of Social Mechanisms," *American Sociological Review*, 74(3), 358–79.

Grove, Stephen J. and Raymond P. Fisk (1983), "The Dramaturgy of Services Exchange: An Analytical Framework for Services Marketing," in *Emerging Perspectives on Services Marketing*, ed. Leonard L. Berry, American Marketing Association, 45–49.

Higgins, Leighanne and Kathy Hamilton (2019), "Therapeutic Servicescapes and Market-Mediated Performances of Emotional Suffering," *Journal of Consumer Research*, 45(6), 1230–53.

Holbrook, Morris B. and Elizabeth C. Hirschman (1982), "The Experiential Aspects of Consumption: Consumer Fantasies, Feelings, and Fun," *Journal of Consumer Research*, 9(2), 132–40.

Holt, Douglas (2016), "Branding in the Age of Social Media," *Harvard Business Review*, 40–50.

Humphreys, Ashlee and Gregory S. Carpenter (2018), "Status Games: Market Driving through Social Influence in the U.S. Wine Industry," *Journal of Marketing*, 82(5), 141–59.

Humphreys, Ashlee and Craig J. Thompson (2014), "Branding Disaster: Reestablishing Trust through the Ideological Containment of Systemic Risk Anxieties," *Journal of Consumer Research*, 41(4), 877–910.

Kozinets, Robert V. (2002), "Can Consumers Escape the Market? Emancipatory Illuminations from Burning Man," *Journal of Consumer Research*, 29(1), 20–38, https://academic.oup.com/jcr/article-lookup/doi/10.1086/339919.

——— (2020), *Netnography: The Essiental GUide to Qualitative Social Media Research*, 3rd ed., ed. Michael Ainsley, Los Angeles: SAGE Publications.

Kozinets, Robert V. and Jay M. Handelman (2004), "Adversaries of Consumption: Consumer Movements, Activism, and Ideology," *Journal of Consumer Research*, 31(3), 691–704.

Kozinets, Robert V., John F. Sherry Jr., Diana Storm, Adam Duhachek, Krittinee Nuttavuthisit, and Benét Deberry-Spence (2004), "Ludic Agency and Retail Spectacle," *Journal of Consumer Research*, 31(3), 658–72.

McCracken, Grant (1988), *The Long Interview*, Newbury Park, CA: Sage Publications, Inc.

O'Guinn, Thomas C. and Russell W. Belk (1989), "Heaven on Earth: Consumption at Heritage Village, USA," *Journal of Consumer Research*, 16(2), 227–38.

Peñaloza, Lisa (2001), "Consuming the American West: Animating Cultural Meaning and Memory at a Stock Show and Rodeo," *Journal of Consumer Research*, 28(3), 369–98.

Pine, Joseph and James H. Gilmore (1999), *The Experience Economy*, Boston: Harvard Business School Press.

Rook, Dennis W. (1985), "The Ritual Dimension of Consumer Behavior," *Journal of Consumer Research*, 12(3), 251–64.

Scaraboto, Daiane and Eileen Fischer (2013), "Frustrated Fatshionistas: An Institutional Theory Perspective on Consumer Quests for Greater Choice in Mainstream Markets," *Journal of Consumer Research*, 39(6), 1234–57.

Schmitt, Bernd (1999), "Experiential Marketing," *Journal of Marketing Management*, 15, 53–67.

Singh, Sangeeta and Stephan Sonnenburg (2012), "Brand Performances in Social Media," *Journal of Interactive Marketing*, 26(4), 189–97, http://dx.doi.org/10.1016/j.intmar.2012.04.001.

Spiggle, Susan (1994), "Analysis and Interpretation of Qualitative Data in Consumer Research," *Journal of Consumer Research*, 21(3), 491–503.

Thompson, Craig J., William B. Locander, and Howard R. Pollio (1989), "Putting Consumer Experience Back into Consumer Research: The Philosophy and Method of Existential-Phenomenology," *Journal of Consumer Research*, 16(2), 133–46.

Thompson, Craig J. and Tuba Üstüner (2015), "Women Skating on the Edge: Marketplace Performances as Ideological Edgework," *Journal of Consumer Research*, 42(2), 235–65.

Tumbat, Gülnur and Russell W Belk (2011), "Marketplace Tensions in Extraordinary Experiences," *Journal of Consumer Research*, 38(1), 42–61.

Üstüner, Tuba and Craig J. Thompson (2012), "How Marketplace Performances Produce Interdependent Status Games and Contested Forms of Symbolic Capital," *Journal of Consumer Research*, 38(5), 796–814.

Disclosure of Positive and Negative Experiences as Social Utility

Emily Prinsloo, Harvard Business School, USA
Irene Scopelliti, City University of London, UK
Joachim Vosgerau, Bocconi University, Italy
George Loewenstein, Carnegie Mellon University, USA

EXTENDED ABSTRACT

We propose that disclosing one's positive and negative experiences carries social utility for both senders and recipients. We show that consumers consider this utility when deciding whether to disclose their experiences with others. In three preregistered studies, consumers respond in kind to the disclosures of positive and negative experiences by others.

Disclosure of Positive and Negative Experiences as Social Utility

Sharing one's experiences with others, especially on digital platforms, has become an integral and prominent part of many consumers' lives. In this paper, we argue that consumers' decision to disclose their positive or negative experiences to other consumers - for example, by engaging in positive or negative word of mouth - is driven by a form of social utility. Specifically, we argue that context matters, i.e., a consumer's disclosure depends on what type of experiences have been disclosed by others.

Maximizing social utility through the disclosure of personal information requires emotional perspective taking, a task that people are typically not very good at (Scopelliti, Loewenstein, and Vosgerau 2015; Sezer, Gino, and Norton 2018). The disclosure of personal information is governed by two competing needs, the need to instil favorable images in others through impression management (Baumeister 1982; Leary and Kowalski 1990) and the need to belong (Baumeister and Leary 1995; Leary 2010). People often get this tradeoff wrong; self-promoters tend to overestimate recipient's positive emotions and underestimate recipients' negative emotions, and they fail to appreciate the positive effects that sharing personal failures would have on their counterparts (John et al. 2016; Wood-Brooks et al. 2019). Calibrating other's emotions may be easier when one *responds* to the disclosure of personal positive and negative experiences of a conversation partner. In such cases, it is easier to imagine how the counterpart will feel in response to one's own disclosure after having been in a similar situation.

We hypothesize that consumers are likely to respond in kind to the disclosure of personal positive and negative experiences by others. When a conversation partner discloses a personal negative experience (positive experience), the recipient attempts to reduce the social status imbalance by also disclosing a personal negative experience (positive experience) and attempts to prevent the imbalance from deepening by not disclosing a personal positive experience (negative experience). In sum, we hypothesize that in response situations, people are likely to respond in kind to the disclosure of personal positive and negative experiences by others. We tested this prediction in a set of three preregistered experiments.

In a first experiment (N = 812), we randomly assigned participants to one of eight conditions in a 2 (participant's outcome: offer vs. rejection) x 2 (counterpart's outcome: offer vs. rejection) x 2 (relationship: good vs. bad) between-subjects design. In the Participants imagined that they had recently applied to positions at companies in Silicon Valley, and that they had just completed an interview for which they had either secured an offer or received a rejection. Then, participants imagined to have unexpectedly run into Alex, an old acquaintance from college, at the airport on the way home. Alex was

remembered as either likable ("You had good feelings toward him," good relationship condition) or not likable ("The contact you had did not make you like him," bad relationship condition). Next, participants imagined chatting with Alex, who in turn shared that he interviewed for a similar job, and that he was given either an offer or a rejection. To ascertain participant's propensity to disclose, we asked them to distribute 100 percentage points between two response options, (1) a message in which they only acknowledged their counterpart's outcome and (2) a message in which they acknowledged their counterpart's outcome and shared their own.

When the sender disclosed a personal success, recipients were likely to also disclose their own success. More importantly, however, when the sender disclosed a personal failure, recipients were more likely to also disclose an own failure and to not disclose their own success than to disclose their own success. Disclosure of own successes and failures did not depend on the quality of the relationship between the two parties. These results provide initial evidence for social utility maximization.

In a second preregistered experiment (N = 794), we provide more evidence that the disclosure of personal successes/failures is driven by social utility maximization, rather than being the manifestation of a preference for the outcomes themselves captured as recipients' emotional reactions to their own successes and failures. We used the same scenario as in the previous experiment, and examined participants' feelings in response to outcomes (-100 = *Extremely bad*; 0 = *Neither bad nor good;* +100 = *Extremely good*). Participants in the experiment felt better when succeeding and worse when failing, yet these feelings did not translate into corresponding likelihoods of disclosing their successes and failures; these results indicate that the disclosure of outcomes is not a direct consequence of the preference for the outcomes themselves.

In a final experiment (N = 1614), we tested whether recipients' disclosure behavior is a response to the success/failure information per se, or a response to the sender's act of disclosing that information. The results showed that participants were more likely to disclose information on their successes or failures when their counterparts also directly disclosed their successes or failures. The pattern of disclosure observed in the first experiments replicates when the sender disclosed the information herself or himself, but was diminished when the information about the sender was disclosed through a third party. These results corroborate the idea that it is the disclosure of successes and failures within a conversation that carries social utility.

The results of these studies provide a new perspective on information disclosure. Past research suggests that consumers may be motivated by self-enhancement when disclosing their experiences to others in the form of word of mouth or when posting on social media (Hennig-Thurau et al. 2004; De Angelis et al. 2012; Packard and Wooten 2013; Barasch and Berger 2014; Dubois et al. 2016). Our results indicate that consumers are not uniquely motivated by self-promotional motives when choosing to disclose their experiences. Instead, consumers strategically modify their disclosure behavior. Specifically, they share or withhold their negative or positive experiences depending on the context and the requirements of the social situation. These findings enrich our understanding of what type of

experiences consumers disclose, and their reasons for engaging in self-disclosure.

REFERENCES

Barasch, A., & Berger, J. (2014). Broadcasting and narrowcasting: How audience size affects what people share. *Journal of Marketing Research*, *51*(3), 286-299.

Baumeister, R. F. (1982). A self-presentational view of social phenomena. *Psychological Bulletin*, *91*(1), 3–26.

Baumeister, R. F., & Leary, M. R. (1995). Need to Belong: Desire for Interpersonal Attachments as a Fundamental Human Motivation. *Psychological Bulletin*, *117*(3), 497–529.

Dubois, D., Bonezzi, A., & De Angelis, M. (2016). Sharing with friends versus strangers: How interpersonal closeness influences word-of-mouth valence. *Journal of Marketing Research*, *53*(5), 712-727.

Hennig-Thurau, Thorsten, Kevin P. Gwinner, Gianfranco Walsh, and Dwayne D. Gremler (2004), "Electronic Word-of-Mouth Via Consumer-Opinion Platforms: What Motivates Consumers to Articulate Themselves on the Internet?" Journal of Interactive Marketing, 18 (1), 38–52.

John, L. K., Barasz, K., & Norton, M. I. (2016). Hiding personal information reveals the worst. *Proceedings of the National Academy of Sciences*, *113*(4), 954–959.

Kross, E., Verduyn, P., Demiralp, E., Park, J., Lee, D. S., Lin, N.,... Ybarra, O. (2013). Facebookuse predicts declines in subjective wellbeing in young adults. *PLoS ONE*, 8, e69841.

Leary, M. R. (2010). Affiliation, Acceptance, and Belonging: The Pursuit of Interpersonal Connection. In *Handbook of Social Psychology* (pp. 864–897).

Leary, M., & Kowalski, R. (1990). Impression Management: A Literature Review and Two-Component Model. *Psychological Bulletin*, *107*(1), 34-47.

Packard, Grant and David B. Wooten (2013), "Compensatory Knowledge Signaling in Consumer Word-of-Mouth," Journal of Consumer Psychology, 23 (4), 434–50.

Scopelliti, I., Loewenstein, G., & Vosgerau, J. (2015). You Call It "Self-Exuberance"; I Call It "Bragging": Miscalibrated Predictions of Emotional Responses to Self-Promotion. *Psychological Science*, *26*(6), 903–914.

Sezer, O., Gino, F., & Norton, M. I. (2018). Humblebragging: A Distinct—and Ineffective—Self-Presentation Strategy. *Journal of Personality and Social Psychology*, *114*(1), 52-74.

Verduyn, P., Lee, D. S., Park, J., Shablack, H., Orvell, A., Bayer, J., . . . Kross, E. (2015). Passive Facebook usage undermines affective well-being: Experimental and longitudinal evidence. *Journal of Experimental Psychology: General*, 144(2), 480-488.

Wood Brooks, A., Huang, K., Abi-Esber, N., Buell, R., Huang, L., & Hall, B. (2019). Mitigating Malicious Envy: Why Successful Individuals Should Reveal Their Failures. *Journal of Experimental Psychology: General*, 148(4), 667-687.

When Benefactors Backfire: Examining the Interactive Effects of Just World Beliefs and a Benefactor versus Beneficiary Focus

Rebecca Rabino, Texas Tech University, USA
Aparna Sundar, University of Washington Bothell, USA

EXTENDED ABSTRACT

In order to appeal to potential donors, marketers try to determine the most effective strategies for positioning their charitable appeals. One common strategy centers on the beneficiaries of a charitable cause. For instance, a charitable appeal may emphasize a beneficiary's need or highlight their deservingness (Lee, Winterich, and Ross Jr. 2014). Alternatively, charities may choose to highlight the effectiveness of their efforts by describing the contributions or participation of other benefactors – such as other donors or corporate sponsors (Bennet, Kim, and Loken 2013; Reingen 1982). We investigate the effectiveness of these two strategies – a focus on beneficiaries versus benefactors. We suggest that a beneficiary versus benefactor focus represent different stages of justice restoration. A beneficiary focus reminds consumers of the potential, and need, for justice restoration efforts. Alternatively, a benefactor focus indicates that justice restoration efforts have begin.

In order to shed light on the efficacy of these relative foci, we investigate the moderating role of consumer beliefs in a just world (BJW; Lerner 1998; Furnham 2003; White, MacDonnell, and Ellard 2012). Just-world theory proposes that individuals need to believe that the world is a fair, equitable place (Lerner 1980). Individuals 'get what they deserve'; that is, good people and good behavior receive positive outcomes, and bad people and bad behavior receive negative outcomes (Lerner 1980; Hafer and Bègue 2005). By their very nature, charitable appeals threaten justice beliefs by suggesting that all is not well – and, in the case of innocent beneficiaries, that there is injustice in the world.

Notably, however, charitable appeals also offer a route by which to reduce such threat by offering an opportunity to redress the injustice by donations to the charitable cause (Lerner 1998; White et al. 2012). Unfortunately, consumers may instead employ other methods of threat-reduction (Lerner 1980; White et al. 2012). Consumers may rationalize different elements of the situation, reducing perceptions of injustice and thus donations. Contextual considerations influence which threat-reduction strategy is adopted.

We suggest that a beneficiary versus benefactor focus will influence which threat-reduction strategy is enacted. Emphasizing the plight of innocent beneficiaries will result in heightened donations for consumers with high (versus low) belief in a just world. A benefactor focus will instead promote rationalization of the charitable context. While a threat to just world beliefs is still present, the injustice is in the process of being resolved. This rationalization mitigates the need for a consumer to donate to the charitable cause.

Study 1 features a 2(charity focus: beneficiary vs. benefactor) x measured belief in a just world design. Participants were instructed to either focus on "people struggling with hunger" or on "people working to end hunger" before reading a Feeding America appeal. Participants then indicated their support for the charity and completed the Just World Scale (Rubin and Peplau 1975). As predicted, there was a significant charity focus and belief in a just world interaction on charitable support ($p = .004$). When participants focused on beneficiaries, there was a positive effect of BJW ($p = .0008$). The positive effect of BJW was attenuated when participants focused on benefactors ($p = .41$).

Study 2 is a 2(benefactor focus: absent versus present) x measured belief in a just world study. All participants were instructed to focus on the beneficiary before viewing a charitable appeal. The benefactor-absent condition merely included a request, at the bottom of the appeal, to consider supporting the charity. The benefactor-present condition highlighted how easy and accessible such support was for donors. We predict that, when the beneficiary is the sole focus of the appeal, we will replicate the positive effect of BJW on charitable support found in Study 1. However, we predict that the addition of a benefactor focus will reduce donations, as the potential to rationalize other donors' efforts is present. A regression revealed a two-way interaction on charitable support ($p = .02$). There was a positive effect of BJW when a beneficiary was the sole focus ($p = .0006$). This effect was attenuated when a benefactor focus was also included ($p = .72$)

In Study 3, we shed additional light on the moderating role of just world beliefs by manipulating the salience of [un]fairness at a societal level (Lee et al. 2014). In the studies above, we suggest that the threat to just-world beliefs was present in both the beneficiary and benefactor focus conditions, but that the threat-reduction techniques varied. Emphasizing societal unfairness is consistent with this threat and should replicate previous findings. Societal fairness, however, is conceptually similar to a benefactor focus: it should reaffirm that injustices will be redressed by society at large, thus attenuating the positive effect of BJW.

Study 3 features a 2(society cue: fair vs. unfair) x 2 (charity focus: beneficiary vs. benefactor) x measured belief in a just world design. Participants first read a brief article about how American society is becoming more fair [unfair] over time (Laurin, Fitzsimons, and Kay 2011). Participants were then instructed to focus on a beneficiary [benefactor], viewed the charitable appeal, and completed the charitable support and BJW measures.

There was a marginal three-way interaction of societal cue, charity focus, and belief in a just world on charitable support ($p = .06$). The unfairness conditions mirror the results of Studies 1 and 2: there was a significant positive effect of BJW when the appeal focused on beneficiaries ($p = .0016$), but not benefactors ($p = .76$). Emphasizing societal fairness revealed a different pattern, such that BJW no longer increased donations for a beneficiary-focused appeal ($p = .22$), but interestingly had a marginal positive effect on the benefactor-focused appeal ($p = .06$). Overall, these effects offer support for our predictions regarding threat and threat reduction associated with these appeals.

In sum BJW consumers are threatened by injustice and may reduce this threat by redressing or rationalizing injustice. We demonstrate that high (vs. low) BJW consumers provide greater charity support when a beneficiary focus is engaged. However, this effect is attenuated for a benefactor focus, which reflects existing justice restoration efforts.

REFERENCES

Furnham, Adrian (2003), "Belief in a Just World: Research Progress Over the Past Decade," *Personality and Individual Differences*, 34 (5), 795-817.

Hafer, Carolyn L. and Laurent Bègue (2005), "Experimental Research on Just-World Theory: Problems, Developments, and Future Challenges," *Psychological Bulletin*, 131 (1), 128-67.

Laurin, Kristen, Gráinne M. Fitzsimons, and Aaron C. Kay (2011), "Social Disadvantage and the Self-Regulatory Function of Justice Beliefs," *Journal of Personality and Social Psychology*, 100 (1), 149-71.

Lee, Saerom, Karen Page Winterich, and William T. Ross Jr. (2014), "I'm Moral, but I Won't Help You: The Distinct Roles of Empathy and Justice in Donations," *Journal of Consumer Research*, 41 (3), 678-96.

Lerner, Melvin J. (1980), *The Belief in a Just World*, Boston, MA: Springer.

Reingen, Peter H. (1982), "Test of a List Procedure for Inducing Compliance with a Request to Donate money," *Journal of Applied Psychology*, 67 (1), 110-18.

Rubin, Zick and Letitia A. Peplau (1975), "Who Believes in a Just World?" *Journal of Social Issues*, 31 (3), 65-89.

White, Katherine, Rhiannon MacDonnell, and John H. Ellard (2012), "Belief in a Just World: Consumer Intentions and Behaviors Toward Ethical Products," *Journal of Marketing*, 76 (1), 103-18.

Psychosocial Determinants of Children's Healthy Eating Behaviour. The Role of Siblings and Peers

Tija Ragelienė, Aarhus University, Denmark
Alice Grønhøj, Aarhus University, Denmark

EXTENDED ABSTRACT

The prevalence of childhood obesity worldwide has risen several times in the past few decades and is anticipated to grow in the future (OECD, 2017). Obesity-related illnesses bring a large financial, social and psychological burden to individuals and society (Seidell & Halberstadt, 2015; Tremmel et al., 2017). Childhood obesity is often linked with unhealthy diets and consumption of foods high in fat and sugar (Kuzbicka & Rachon, 2013; Setayeshgar et al., 2017) and can be prevented by changing diets, including increasing children's consumption of fruits and vegetables (Tetens & Alinia, 2009).

Since eating is a social activity it is important to consider the socio-cultural context and underlying social relations to understand children's food choice and eating patterns (Delormier, Frohlich, & Potvin, 2009). Parents' influence on children's eating behaviour, has been confirmed in many studies (Scaglioni et al., 2008; Yee, Lwin, Ho, 2017), but peers have also been found to have a significant impact for children's consumer socialization in shaping food preferences and eating patterns (Davidson et al., 2014; Fitzgerald et al, 2009; McClain et al., 2009; Moschis & Churchill, 1978). However, the evidence regarding peers' influence is rather mixed (Coppinger et al., 2010; Stok et al., 2014; Watts et al., 2018), and it is still not clear which psychosocial factors are most important for explaining peers' influence on children's food choice.

Approximately 80 per cent of western children have at least one sibling, and relationships with siblings are considered to be one of the longest-lasting relationships in one's lifetime (Howe & Recchia, 2014). Therefore, siblings perform an important role in children's consumer socialization (John, 1999; Kerrane, Bettany & Kerrane, 2015). Siblings also are considered to have an impact on children's eating behaviour (Datar, 2017; Povey, Cowap & Gratton, 2016; Vanhelst et al., 2018). However, the studies done in this field are very sparse, and further research on siblings' influence is needed to understand the extent to which siblings' influence can be relevant for the development of children's eating habits.

The present study aims to explore the psychosocial factors related with peers and siblings influence on children's eating behaviour and answer the following research questions: 1) How are friends' and siblings' support for healthy eating and the frequency of eating with siblings and friends related to children's eating behaviour and food preferences? 2) How do children perceive healthy eating behaviour in the context of social interactions with siblings and peers?

Consents from parents and participants were obtained before conducting a survey and qualitative interviews. In total there were 278 (46.4% boys) 8-13 years old (M = 10.61, SD = 1.11) children who filled in the questionnaire. Semi-structured interviews were conducted with 20 children (50% boys), whose age varied from 9 to 12 years old (M=10.65, SD=1.09). A mixed-methods convergent parallel design was used in this study (QUAL+QUAN; Morse, 1991). To analyse the qualitative data, thematic analysis was performed using a general inductive approach (Thomas, 2006). The emerged categories were coded using the NVivo software package version 10 (QSR International, 2010). Quantitative data analysis was conducted using SPSS26 for MacOS software.

A food preference questionnaire (Smith et al., 2016) was used to measure preadolescents' preferences for vegetables (16 items, α=0.85) and snacks (9 items, α=0.88). A ten items social support for diet scale (Sallis et al., 1987) was used to measure social support for a healthy diet of siblings (α=0.88) and friends (α=0.86). Relationships with siblings were measured with two separate items representing how well children get along with their siblings and how satisfied they are with the relationships. Eating frequency with siblings and friends and the intake of fruit, vegetables and snacks per day were assessed with separate items using 5-point Likert type responses.

Multiple regression analyses revealed that the frequency of eating with friends (β=.188, p=.002, R^2=.054) was a significant predictor of children's vegetables preferences. Friends' support for healthy eating (β= -.134, p=.027, =.037) and frequency of eating with friends (β= -.121, p=.046, =.037) were significant negative predictors of actual snacks intake. The interaction of friends' support for healthy eating and frequency of eating with friends did not change the significantly (p>.05) and did not predict snacks intake (β= -.043, p=.478, Δ =.002). The regression models on snacks preferences, actual fruit, and vegetables intake were insignificant.

No significant differences in the eating behaviour variables were found between the groups of participants who had siblings and those who did not. There was also no significant difference in the eating behaviour variables between groups of children who had siblings of different age. Analyses of multiple regression models revealed that siblings' gender, number of siblings, as well as sibling support for healthy eating, satisfaction with the relationships with siblings, getting along with siblings, and frequency of eating together with siblings, were not significant predictors of children's vegetables and snacks preferences, and actual snacks intake. However, siblings' support for healthy eating was found to be a significant predictor of actual fruit intake (β=.232, p=.001, =.07). Siblings' support for healthy eating (β=.189, p=.007, =.093) and frequency of eating together with siblings (β=.212, p=.003, =.093) were significant predictors of vegetable intake.

Two main themes representing influence of peers and siblings emerged from the qualitative interviews and are presented in _Table 1_. Siblings' influence was found to be inconspicuous for children's food choice and preferences since eating with siblings was not perceived as important or because of having bad quality relationships with siblings. Peers' influence was found to be more salient for children's eating behaviour, since observing peers consuming snacks sometimes lead to temptation to try these unhealthy food items. Peers' unfavourable reaction to healthy eating was also perceived as a barrier to eat healthily.

The results of this study contribute to our understanding of peers' and siblings' influence on children's eating behaviour and help to identify important aspects of this influence that could be targeted when creating interventions aiming to encourage healthy eating habits among children and for marketing healthy food products to young consumers.

REFERENCES

Coppinger, T., Jeanes, Y. M., Dabinett, J., Vogele, C. & Reeves, S. (2010). Physical activity and dietary intake of children aged 9–11 years and the influence of peers on these behaviours: a 1-year follow-up, _European Journal of Clinical Nutrition_, 64, 776–781.

Datar, A. (2017). The more the heavier? Family Size and Childhood Obesity in The U.S. *Social Science & Medicine,* 180, 143-151. doi.org/10.1016/j.socscimed.2017.03.035.

Davidson E., Smith C., Wyllie J. (2014), Kid's Choice: An investigation into peer influences on children's food choices within school environment, http://www.nutrition.otago.ac.nz/_ data/assets/file/.../DTP _EDavidson_SoF.pdf.

Delormier, T., Frohlich, K. L. & Potvin, L. (2009). Food and eating as social practice - Understanding eating patterns as social phenomena and implications for public health. *Sociology of Health & Illness*, 31, 215-28. Doi: 10.1111/j.1467-9566.2008.01128.x.

Fitzgerald A., Heary C., Kelly C., Nixon E. (2009). Factors influencing the food consumption of children and adolescents: a qualitative investigation, *Proceedings of the Nutrition Society*, 67, 226-237.

Howe, N. & Recchia, H. (2014). Sibling Relations and Their Impact on Children's Development. Encyclopedia of Early Childhood Development, *Peer Relations*, 1-8.

John, D. (1999). Consumer Socialization of Children: A Retrospective Look at Twenty-Five Years of Research. *Journal of Consumer Research*, 26, 183-213. 10.1086/209559.

Kerrane, B., Bettany, S. M., & Kerrane, K. (2015). Siblings as socialization agents: exploring the role of 'sibship' in the consumer socialization of children. *European Journal of Marketing*, 49(5-6), 713-735. https://doi.org/10.1108/EJM-06-2013-0296.

Kuzbicka, K. & Rachoń, D. (2013). Bad eating habits as the main cause of obesity among children. *Pediatric Endocrinology, Diabetes and Metabolism*, 19(3), 106-110.

Morse, J. M. (1991). Approaches to qualitative & quantitative methodological triangulation. *Nursing Research*, 40(2), 120–123. doi.org/10.1097/00006199-199103000-00014.

Moschis, G., & Churchill, G. (1978). Consumer Socialization: A Theoretical and Empirical Analysis. *Journal of Marketing Research, 15*(4), 599-609. doi:10.2307/3150629.

OECD (2017). Obesity Update, Better Policies for Better Lives, www.oecd.org/health/obesity-update.htm (visited 2nd September, 2019).

Povey, R., Cowap, L. & Gratton, L. (2016). "They said I'm a square for eating them". Children's beliefs about fruit and vegetables in England, *British Food Journal*, 118 (12), 2949-2962. DOI 10.1108/BFJ-03-2016-0131.

Sallis, J.F., Grossman, R.M., Pinski, R.B., Patterson, T.L., and Nader, P.R. (1987). The development of scales to measure social support for diet and exercise behaviours. *Preventive Medicine*, 16, 825-836. doi: 10.3945/ajcn.116.133983.

Scaglioni, S., Salvioni, M., & Galimberti, C. (2008). Influence of parental attitudes in the development of children eating behaviour. *Br J Nutr, 99 Suppl 1*, S22-25. doi:10.1017/S0007114508892471.

Seidell, J. C., & Halberstadt, J. (2015). The global burden of obesity and the challenges of prevention. Ann Nutr Metab, 66 Suppl 2, 7-12. doi:10.1159/000375143.

Setayeshgar, S., Ekwaru, J. P., Maximova, K., Majumdar, S. R., Storey, K. E., McGavock, J. & Veugelers, P. J. (2017). Dietary intake and prospective changes in cardiometabolic risk factors in children and youth. *Applied Physiology, Nutrition and Metabolism, 42*(1), 39-45. Doi: 10.1139/apnm- 2016-0215.

Smith, A.D., Fildes, A., Cooke, L., Herle, M., Shakeshaft, N., Plomin, R. & Llewellyn, C. (2016). Genetic and environmental influences on food preferences in adolescence. *American Journal of Clinical Nutrition*, 104, 446–453.

Stok, F. M., de Vet, E., de Wit, J. B. F., Luszczynska, A., Safron, M. & de Ridder, D. T. (2014). The proof is in the eating: subjective peer norms are associated with adolescents' eating behaviour, *Public Health Nutrition*, 18 (6), 1044– 1051. Doi:10.1017/S1368980014001268.

Tetens, I. & Alinia, S. (2009). The role of fruit consumption in the prevention of obesity. *Journal of Horticultural Science & Biotechnology*, ISAFRUIT, Special Issue, 47–51.

Thomas, D. (2006). A General Inductive Approach for Analyzing Qualitative Evaluation Data. American Journal of Evaluation, Vol. 27 No. 2, June 2006 237-246 DOI: 10.1177/1098214005283748

Tremmel, M., Gerdtham, U. G., Nilsson, P. M., & Saha, S. (2017). Economic burden of obesity: A systematic literature review. *International Journal of Environmental Research and Public Health*, 14(4). Doi: 10.3390/ijerph14040435.

Vanhelst, J., Béghin, L., Drumez, E., Duhamel, A., De Henauw, S., Ruiz, J. R., Kafatos, A., Manios, Y., Widhalm, K., Mauro, B., Sjöström, M., Kersting, M. & Gottrand, F. (2018). Adolescents' diet quality in relation to their relatives' and peers' diet engagement and encouragement: the Healthy Lifestyle in Europe by Nutrition in Adolescence (HELENA) study, *Public Health Nutrition,* 1-10. Doi:10.1017/S136898001800178.

Watts, A. W., Miller, J., Larson, N. I., Eisenberg, M. E., Story, M. T., Neumark-Sztainer, D. (2018). Multicontextual correlates of adolescent sugar-sweetened beverage intake. *Eating Behaviors*, 30, 42–48.

Yee, A. Z., Lwin, M. O., & Ho, S. S. (2017). The influence of parental practices on child promotive and preventive food consumption behaviors: a systematic review and meta-analysis. *Int J Behav Nutr Phys Act, 14*(1), 47. doi:10.1186/s12966-017-0501-3.

Persuasion Knowledge Model Reimagined

Vahid Rahmani, Rowan University, USA
Elika Kordrostami, Rowan University, USA
John B. Ford, Old Dominion University, USA

EXTENDED ABSTRACT

Persuasion knowledge (PK) refers to individuals' ability to identify and resist outside agents' purposeful manipulation attempts (Friestad & Wright, 1994). This article investigates the factors that influence consumers' propensity to acquire new knowledge and their ability to use their existing knowledge to protect themselves from marketers' persuasion attempts.

We argue that consumers can learn PK via automatic and effortful cognitive processes. The automatic route to learning PK entails learning PK from experiences of interactions with marketers. Consumers could also learn the PK via external sources of information (e.g., reading books, articles, blogs, or other consumers' reviews to gather information about PK). This process will by cognitively taxing. Consequently, building on the elaboration likelihood model (ELM, Petty & Cacioppo, 1986) and Heuristic-Systematic Model (HSM, Chaiken et al., 1989), we argue that in order to learn from external sources of information, consumers should have motivational and cognitive resources.

Factors Influencing The Learning Process of PK

Gender

According to selectivity model men and women differ in the way that they process the information (e.g., Meyers-Levy, 1988). Women tend to engage in a more detailed elaboration of information and are more likely to recognize subtle cues in a message, while men are inclined to engage in schematic information processing and tend to miss subtle cues (Darley & Smith, 1995). Therefore, we argue that compared with men, women should have a higher motivation to engage in the effortful thinking process and subsequently are more likely to acquire PK via external sources of information.

Involvement

High involvement products are those that are expensive and/or have significant consequences in terms of addressing consumers' belonging/esteem needs. We contend that In high-involvement product categories versus low-involvement ones, people are more inclined to engage in an effortful thinking process, and subsequently, are more prone to acquire PK from external sources of information.

Regulatory focus

The regulatory system refers to the motivation system that drives people's behavior and can be categorized into two main categories of promotion and prevention (Higgins & Crowe, 1997). Compared with promotion-focused people, prevention-focused people are more vigilant against ulterior motives, are more prone to process the information systematically, and are more likely to focus on the negative information when faced with mixed information (Kirmani & Zhu, 2007). Therefore, we argue that compared with promotion-focused people, prevention-focused people should be more motivated to process the information systematically, and subsequently, should be more likely to learn PK using external sources of information.

Factors Influencing Consumers' Ability To Use Their PK

O'Keefe (2013) argues that the common denominator of all persuasion techniques is their explicit or implicit assurance of positive consequences. Recent evidence from the neuroscience literature supports this perspective of "subjective-value-maximization" in persuasion scenarios (Falk & Scholz, 2018). Therefore, a persuasion attempt could be summarized as any direct or indirect insinuation that a certain action (e.g., buying the product) could enhance positive self-related or social consequences. Factors that increase the ability to identify marketers' ulterior motives should enhance consumers' ability to distinguish between the marketing offerings that are likely to result in desirable self-related or social outcomes and the ones that are not. Therefore, we propose that a greater level of acquired PK will positively influence consumers' ability to select desirable marketing offerings.

The depth and the direction of information processing

Existing research suggests both the depth and the direction of information processing should influence the activation process of PK (e.g., Oppenheimer & Kelso, 2015). As ELM and HSM models of persuasion suggest, to identify marketers' subtle manipulative intentions, consumers need to have the motivation and the ability to pay attention to details and process the information at a greater depth. The direction of information processing could also influence consumers' ability to identify marketers' persuasion tactics. When presented with mixed evidence, consumers could focus on positive or negative information. Focusing on negative information could enhance consumers' ability to identify any ulterior motives that may exist in a persuasion scenario.

Emotions

The relationship between PK and emotions is complex and twofold: On one hand, consumers' PK enables them to cope with emotional appeals (Hibbert et al., 2007). On the other hand, emotions and mood affect preference (Lee et al., 2009), memory, evaluation, and information processing (Bagozzi et al., 1999), and subsequently, they affect PK through influencing both direction and depth of processing the information.

The Consequences of Consumer Persuasion Knowledge

Persuasion knowledge enables consumers to resist outside agents' persuasion attempts and successfully demonstrate persuasion coping behavior. Extant literature demonstrates that consumer persuasion knowledge can negatively affect consumers' attitudes toward advertisement messages and appeals (Campbell, 1999; Kirmani & Zhu, 2007), sales techniques (Campbell & Kirmani, 2000; Holmes et al., 2017), brands (Laran et al., 2011; Wei et al., 2008), product placement (Tessitore & Geuens, 2019), CSR claims (Skarmeas & Leonidou, 2013) marketers' persuasion attempts (Kachersky, 2011; Kachersky & Kim, 2011; Nelson et al., 2009), and deceptive pricing strategies (Hardesty et al., 2007; Kachersky, 2011; Kachersky & Kim, 2011).

REFERENCES

Bagozzi, R. P., Gopinath, M., & Nyer, P. U. (1999). The role of emotions in marketing. *Journal of the Academy of Marketing Science*, *27*(2), 184–206. https://doi.org/10.1177/0092070399272005

Campbell, M. C. (1999). Perceptions of price unfairness: Antecedents and consequences. *Journal of Marketing Research*, *36*(2), 187–199. https://doi.org/10.2307/3152092

Campbell, M. C., & Kirmani, A. (2000). Consumers' Use of Persuasion Knowledge: The Effects of Accessibility and Cognitive Capacity on Perceptions of an Influence Agent. *Journal of Consumer Research*, *27*(1), 69–83. https://doi.org/10.1086/314309

Chaiken, S., Liberman, A., & Eagly, A. H. H. (1989). Heuristic and systematic information processing within and beyond the persuasion context. In *Unintentent Thought*. https://doi.org/10.1002/env.670

Darley, W. K., & Smith, R. E. (1995). Gender differences in information processing strategies: An empirical test of the selectivity model in advertising response. *Journal of Advertising*, *24*(1), 41–56. https://doi.org/10.1080/00913367.1995.10673467

Falk, E., & Scholz, C. (2018). Persuasion, Influence, and Value: Perspectives from Communication and Social Neuroscience. *Annual Review of Psychology*, *69*(1), 329–356. https://doi.org/10.1146/annurev-psych-122216-011821

Friestad, M., & Wright, P. (1994). The Persuasion Knowledge Model: How People Cope with Persuasion Attempts. *Journal of Consumer Research*, *21*(1), 1. https://doi.org/10.1086/209380

Hardesty, D. M., Bearden, W. O., & Carlson, J. P. (2007). Persuasion knowledge and consumer reactions to pricing tactics. *Journal of Retailing*, *83*(2), 199–210. https://doi.org/10.1016/j.jretai.2006.06.003

Hibbert, S., Smith, A., Davies, A., & Ireland, F. (2007). Guilt appeals: Persuasion knowledge and charitable giving. *Psychology and Marketing*, *24*(8), 723–742. https://doi.org/10.1002/mar.20181

Higgins, E. T., & Crowe, E. (1997). Regulatory Focus and Strategic Inclinations : Promotion and Prevention in Decision-Making. *Organizational Behavior and Human Decision Processes*, *69*(2), 117–132.

Holmes, Y. M., Beitelspacher, L. S., Hochstein, B., & Bolander, W. (2017). "Let's make a deal:" Price outcomes and the interaction of customer persuasion knowledge and salesperson negotiation strategies. *Journal of Business Research*, *78*, 81–92. https://doi.org/10.1016/j.jbusres.2017.04.009

Kachersky, L. (2011). Reduce Content or Raise Price? The Impact of Persuasion Knowledge and Unit Price Increase Tactics on Retailer and Product Brand Attitudes. *Journal of Retailing*, *87*(4), 479–488. https://doi.org/10.1016/j.jretai.2011.08.001

Kachersky, L., & Kim, H. M. (Christian). (2011). When consumers cope with price-persuasion knowledge: The role of topic knowledge. *Journal of Marketing Management*, *27*(1–2), 28–40. https://doi.org/10.1080/02672571003647719

Kirmani, A., & Zhu, R. (2007). Vigilant against manipulation: The effect of regulatory focus on the use of persuasion knowledge. *Journal of Marketing Research*, *44*(4), 688–701. https://doi.org/10.1509/jmkr.44.4.688

Laran, J., Dalton, A. N., & Andrade, E. B. (2011). The Curious Case of Behavioral Backlash: Why Brands Produce Priming Effects and Slogans Produce Reverse Priming Effects. *Journal of Consumer Research*, *37*(6), 999–1014. https://doi.org/10.1086/656577

Lee, L., Amir, O., & Ariely, D. (2009). In Search of Homo Economicus: Cognitive Noise and the Role of Emotion in Preference Consistency. *Journal of Consumer Research*, *36*(2), 173–187. https://doi.org/10.1086/597160

Meyers-Levy, J. (1988). The Influence of Sex Roles on Judgment. *Journal of Consumer Research*, *14*(4), 522. https://doi.org/10.1086/209133

Meyers-Levy, J., & Sternthal, B. (1991). Gender Differences in the Use of Message Cues and Judgments. *Journal of Marketing Research*, *28*(1), 84. https://doi.org/10.2307/3172728

Nelson, M. R., Wood, M. L. M., & Paek, H.-J. (2009). Increased Persuasion Knowledge of Video News Releases: Audience Beliefs About News and Support for Source Disclosure. *Journal of Mass Media Ethics*, *24*(4), 220–237. https://doi.org/10.1080/08900520903332626

O'Keefe, D. J. (2013). The Relative Persuasiveness of Different Forms of Arguments-From-Consequences: A Review and Integration. *Annals of the International Communication Association*, *36*(1), 109–135. https://doi.org/10.1080/23808985.2013.11679128

Oppenheimer, D. M., & Kelso, E. (2015). Information Processing as a Paradigm for Decision Making. *Annual Review of Psychology*, *66*(1), 277–294. https://doi.org/10.1146/annurev-psych-010814-015148

Petty, R. E., & Cacioppo, J. T. (1986). The elaboration likelihood model of persuasion. *Advances in Experimental Social Psychology*. https://doi.org/10.1016/S0065-2601(08)60214-2

Skarmeas, D., & Leonidou, C. N. (2013). When consumers doubt, Watch out! The role of CSR skepticism. *Journal of Business Research*. https://doi.org/10.1016/j.jbusres.2013.02.004

Tessitore, T., & Geuens, M. (2019). Arming consumers against product placement: A comparison of factual and evaluative educational interventions. *Journal of Business Research*, *95*, 38–48. https://doi.org/10.1016/j.jbusres.2018.09.016

Wei, M.-L. L., Fischer, E., & Main, K. J. (2008). An examination of the effects of activating persuasion knowledge on consumer response to brands engaging in covert marketing. *Journal of Public Policy and Marketing*, *27*(1), 34–44. https://doi.org/10.1509/jppm.27.1.34

Show me Your Recipe And I Will Show You Mine!
Chefs Secrets to Engage Their Followers on Instagram

Karine Raies, EM Lyon Business School, France
Mariem El Euch Maalej, PSB Paris School of Business, France
Marielle Salvador, Institut Paul Bocuse, France

EXTENDED ABSTRACT

Social media has now become essential communication tool and is present in all sectors. Haute gastronomy, considered a highly experiential luxury field is no exception. Some starred chefs have therefore converted to social media as a means of communication to gain visibility in this highly competitive sector marked by the growing importance of culinary influencers. Indeed, social media, and in particular Instagram, provides channel which enables chefs to get closer to their customers, extend their media coverage to a wider audience and direct traffic to the starred establishment's website. A general trend towards consumption of culinary photos on social media has proved highly popular with Internet users in recent years. Food lovers represent 27% of Instagram's social network users, and the #Food hashtag is one of the most widely used since the platform's launch in 2010 (Digimind 2018).

Starred chefs now face the challenge of building a strong highly recognizable brand. Thanks to social media, we know these starred chefs, each one's history and personality even before, or without, tasting their cuisine. In this context, chefs are exhibited and 'consumed': they take part in television programs, meet with journalists, publish cookbooks and have accounts on social networks in order to develop reality-based personal marketing. They are the archetype of personal brands. Chefs are using digital platforms to share their "art" with their followers and improve their own visibility as well as the visibility of their restaurants. They endorse their restaurant's brand and use their own notoriety as a personal brand. Taking these communication tools into account in the construction of a natural person as a brand is interesting from both a managerial and a theoretical point of view. However, the literature has so far shown little interest in explaining how and why consumers are interested in chefs' Instagram accounts.

Studying starred chefs as a personal brand via social media is all the more relevant as the literature is poorly developed, with most studies focusing on celebrity endorsement of brands alone. The development of personal branding by starred chefs often include the restaurant's own brand awareness which can benefit the chef brand and vice versa. Indeed, the human brand has the ability to convey a level of authenticity and powerful cultural meaning that non-human brands cannot match (Fournier and Eckhardt 2018). At the same time, it presents many risks because the brand must be symbolic, immaterial and immortal, while the person is physical, has a personal life and is mortal (Dion and Arnould 2016; Fournier and Eckhardt 2018). It's then possible to see Chef's Instagram accounts that are more oriented towards the expression of their humanity (i.e. with a lot of personal photos of them and their family) or in opposition towards their belonging to the restaurant (i.e. with a commercial link to the restaurant's website). In this context, what characteristics enhance consumer engagement?

Platforms like Instagram enables brands to create owned media and to engage with their followers by constructing posts using visual modalities (Rietveld et al. 2020). Despite the growing interest of managers to communication strategies based on visual content on social media, the majority of academic research focused on text content (Chevalier and Mayzlin 2006; Chintagunta, Gopinath and Venkataraman 2010). Some recent exceptions (Li and Xie 2020; Ri-etveld et al. 2020) highlighted the importance of understanding how communication strategies based on visual content can help brands to increase their users' engagement.

This research explores causal configurations of factors that lead to a high level of engagement on 18 French chefs' Instagram accounts. We then extracted the totality of the selected chef publications (8075 pictures) from the launch of their Instagram accounts thanks to a collaboration with Heuritech, a company specialized in Instagram data collection and machine learning models. Using a fuzzy-set qualitative comparative analysis (fsQCA) (Ragin 2000), several configurations of conditions have been identified as sufficient to lead to a high number of likes and followers.

Following previous studies, we consider in this research four variables to capture the strategy of communication adopted by chefs on Instagram: 1/the number of pictures for capturing the intensity of publication activity; 2/ the average number of hashtags used for capturing the level of informativeness related to a rational strategy of communication;3/ the number of pictures containing humans for capturing an emotional strategy of communication on one side but also a human-oriented branding; and 4/ the average number of commercial links related to the published pictures to capture the weight of the restaurant's brand related to the chefs' profile. Our study aimed at identifying which mechanisms can explain consumers' engagement on Instagram profiles of personal brands like starred chefs.

The results show that the number of followers is observed in two situations: the first one corresponds to an extensive and informative strategy of publications with a high number of published pictures and a high number of hashtags while the second one is associated to a less extensive and more inconspicuous strategy that is more emotionally oriented and a strongly assumed position of the chef as highly attached to the restaurant's brand with a low number of published pictures and a low number of hashtags but associated with a high number of pictures containing human figures and a high number of commercial links associated to those pictures.

We show different strategies that can lead starred chefs to maximize their social media marketing activities to influence follower's engagement behaviours and to manage successfully their accounts. We underline the interest of studying the sector of haute gastronomy, a field where elements of luxury and the existence of the personal brands of the chefs come to build not only their own notoriety, but also the notoriety of the restaurant and sometimes even the hotel that hosts the restaurant.

These findings can be extended to other types of personal brands. Several influencers need to develop strategies that can serve their collaboration with other brands while positively impact their follower's engagement. Understanding what are the successful strategies is then very valuable for different types of personal brands.

REFERENCES

Chevalier, Judith and Dina Mayzlin (2006), "The Effect of Word of Mouth on Sales: Online Book Reviews," *Journal of Marketing Research*, 43 (3), 345–54.

Chintagunta, Pradeep K., Shyam Gopinath, and Sriram Venkataraman (2010), "The Effects of Online User Reviews on Movie Box Office Performance: Accounting for Sequential Rollout and Aggregation across Local Markets," *Marketing Science*, 29 (5), 944–957.

Digimind (2018), Le marché Food & Drink en France sur les médias sociaux : tendances, insights consommateurs. https://landing.digimind.com/le-marche-food-et-drink-france-sur-les-medias-sociaux

Dion Delphine. and Arnould Eric. (2016). "Persona-fied Brands - Managing branded persons through persona," *Journal of Marketing Management*, 32, 121–148.

Fournier, Susan and Giana Eckhardt (2018), "Managing the human in human brands," *GfK Marketing Intelligence Review*, 10 (1), 30–33.

Li, Yiyi and Ying Xie (2020), "Is a Picture Worth a Thousand Words? An Empirical Study of Image Content and Social Media Engagement," *Journal of Marketing Research*, 57 (1), 1–19.

Ragin, Charles C. (2000), *Fuzzy-set social science*, Chicago, IL: University of Chicago Press.

Rietveld, Robert, Willemijn van Dolen, Masoud Mazloom and Marcel Worring (2020), "What You Feel, Is What You Like Influence of Message Appeals on Customer Engagement on Instagram," *Journal of Interactive Marketing*, 49, 20–53.

How Counter-Stereotypical Sources Attenuate Polarization Over Consumption-Related Policy Issues

Guilherme Ramos, FGV/EBAPE, Brazil
Eduardo B. Andrade, FGV/EBAPE, Brazil

EXTENDED ABSTRACT

Political polarization is rising across the globe and shows no sign of stopping (Abramowitz and Saunders 2008). As political orientation becomes increasingly central to one's identity, preferences become more clearly divided along ideological lines. Liberals and conservatives have been shown to display different consumer behaviors in multiple contexts, such as donations (Winterich, Zhang, and Mittal 2012), recycling (Kidwell, Farmer, Hardesty 2013), purchase-based signaling (Ordabayeva and Fernandes 2018), and multiple policies related to product or service purchase and consumption (e.g., gun control, cannabis legalization; Daniller 2019; Shaeffer 2019). Indeed, the predictive power of political orientation on preferences is particularly pronounced for public policies (Bail et al 2018). Although much has been documented on how political orientation helps explain divergent opinions and tastes, less is known on what can bring them together. Our research addresses this general gap.

Although this strong predictive power has been attributed to different needs to manage uncertainty and threat (Jost 2017), there is also evidence that preferences can shift with relative ease. Because political orientation is a form of social identity (Green, Palmsquit, and Schindler 2002), it becomes fertile ground for the operation of group biases. Indeed, researchers have documented that preferences are partly shaped by perceptions of in-group norms (i.e., preferences in-group members ought to hold). Oftentimes, people draw on stereotypes regarding each group's norms (Bergan 2012). In this sense, liberals might endorse abortion not only because this policy fits their motivational needs, but also because this is their normative preference. Frequently, however, such norms are not spontaneously inferred, but rather communicated (Cohen 2003). Multiple studies have shown that source cues tend to increase (decrease) support for policies among in-group (out-group) members (e.g., Cohen 2003; Van Boven et al 2018). Overall, these results indicate that people´s propensity to assimilate with in-group and diverge from out-group can moderate potential differences in needs held by those from opposite political leanings. Thus, instead of fomenting polarization, source cues may attenuate the preference gap if they are counter-stereotypical. Specifically, when a counter-stereotypical source endorses a policy (e.g., conservative politician endorses cannabis legalization), the policy stereotype contradicts the norms communicated by the source. Consequently, normative preferences become less clear, and the effect of political orientation should reduce.

This research offers several contributions to the literature. First, while previous studies have shown that political orientation predicts preferences in politics (Bail et al 2018) and in marketing (Jost 2017), we demonstrate that counter-stereotypical sources can significantly reduce this predictive power. Second, we document that such attenuation happens asymmetrically. When a counter-stereotypical source endorses a policy, it persuades in-groups more than it dissuades out-groups. Thus, we help reconcile mixed findings about the predominance of in- and out-group effects by highlighting its context-dependency (Nicholson 2012; Samuels and Zucco 2014). Finally, by conducting our studies in Brazil, which, unlike the US, has a highly fragmented multi-party system, we assess the extent to which general political orientation rather than strong party identification plays a social-based role into people's consumption-related policy preferences.

In our studies, we examined how the effect of political orientation on preferences toward consumption-related policies varied as a function of the source. Although we use the terms "liberals" and "conservatives" to communicate with the literature, the meaningful labels for ideological distinction in Brazil are "left" and "right", respectively. Thus, we treat them as equivalent (Hasson et al 2018). In study 1, we had participants (n=226) evaluating a real bill to legalize marijuana, which could be endorsed by a former left-wing Congressman (stereotypical source), or a former right-wing President (counter-stereotypical source). The participants, then, indicated their level of support for the policy and completed a measure of political orientation (see summary table). The analyses yielded the expected interaction between source condition and political orientation (β=0.41, t(220)=2.21, p=.03). In the stereotypical condition, political orientation was a strong predictor of preferences (β=-0.48, t(105)=-3.47, p=.001), but this effect faded away in the counter-stereotypical condition (β=-0.12, t(113)=-0.95, p=.34). To further examine the results, we constructed a binary indicator of political orientation. The analysis revealed an interesting and, to our knowledge, novel asymmetry. Left-wing participants were quite insensitive to whether the source was stereotypical (M=3.20, SD=1.39) or counter-stereotypical (M=3.02, SD=1.48, t(220)=-0.94, p=.35). However, right-wing participants increased their support for marijuana legalization in the counter-stereotypical condition ($M_{counter\text{-}st.}$=2.88, SD=1.37; $M_{st.}$=2.45, SD=1.44, t(220)=2.45, p=.01).

Study 2 sought to increase internal validity and replicate the results of study 1 with a policy stereotypically associated with the right. Participants recruited on an online Brazilian platform (n=450) were presented with a bill to increase access to guns. The bill could be endorsed by "right-wing" (stereotypical source), "left-wing" (counter-stereotypical source), or "some" (control) Congressmen. The same dependent and independent measures of study 1 were collected, with the difference that the latter included an option to identify respondents who were unfamiliar with the right-left distinction (n=108, dropped from analyses). Political orientation emerged as a strong predictor of preferences in the control condition (β=0.89, t(332)=6.96, p<.001), and this effect was not statistically different in the stereotypical condition (β = -0.14, t(332) = -0.78, p = .44). However, polarization attenuated when the source was counter-stereotypical (β = -0.54, t(332) = -3.02, p=.003). Further, this attenuation happened asymmetrically: while right-wing participants did not significantly shift their opinions when the source was counter-stereotypical ($M_{counter\text{-}st.}$=3.09, SD=1.41; $M_{control}$=3.26, SD=1.54, t(332)=-0.6, p=.55), left-wing participants significantly increased their support ($M_{counter\text{-}st.}$=2.30, SD=1.45; $M_{control}$=1.59, SD=1.06, t(332)=2.65, p=.008). Study 3 employed the same procedure of study 2, but applied to the context of abortion, an even more salient and familiar policy where preferences should therefore be less responsive to the source (Mondak 1993). Even so, we replicated the results (see summary table).

This research demonstrates that even in a polarized world, political orientation might not be such a strong predictor of preferences. In addition to showing how to diminish polarization over policy issues, our results help reconcile previous findings regarding in- and out-group effects by showing a condition under which in-group ef-

fects predominate. Finally, this research broadly proposes a way to diminish disagreement.

REFERENCES

Abramowitz, A. I., & Saunders, K. L. (2008). Is polarization a myth?. *The Journal of Politics*, *70*(2), 542-555.

Bail, C. A., Argyle, L. P., Brown, T. W., Bumpus, J. P., Chen, H., Hunzaker, M. F., ... & Volfovsky, A. (2018). Exposure to opposing views on social media can increase political polarization. *Proceedings of the National Academy of Sciences*, *115*(37), 9216-9221.

Bergan, D. E. (2012). Partisan stereotypes and policy attitudes. *Journal of Communication*, *62*(6), 1102-1120.

Cohen, G. L. (2003). Party over policy: The dominating impact of group influence on political beliefs. *Journal of Personality and Social Psychology*, *85*(5), 808.

Daniller, A. (2019) Two-thirds of Americans support marijuana legalization (Pew Research Center, Washington, DC).

Green, D. P., Palmquist, B., & Schickler, E. (2004). Partisan hearts and minds: Political parties and the social identities of voters. Yale University Press.

Hasson, Y., Tamir, M., Brahms, K. S., Cohrs, J. C., & Halperin, E. (2018). Are liberals and conservatives equally motivated to feel empathy toward others?. *Personality and Social Psychology Bulletin*, *44*(10), 1449-1459.

Jost, J. T. (2017). The marketplace of ideology: "Elective affinities" in political psychology and their implications for consumer behavior. *Journal of Consumer Psychology*, 27(4), 502-520.

Kidwell, B., Farmer, A., & Hardesty, D. M. (2013). Getting liberals and conservatives to go green: Political ideology and congruent appeals. Journal of Consumer Research, 40(2), 350-367.

Mondak, J. J. (1993). Public opinion and heuristic processing of source cues. *Political Behavior*, 15(2), 167-192.

Nicholson, S. P. (2012). Polarizing cues. *American Journal of Political Science*, 56(1), 52-66.

Ordabayeva, N., & Fernandes, D. (2018). Better or different? How political ideology shapes preferences for differentiation in the social hierarchy. *Journal of Consumer Research*, 45(2), 227-250.

Samuels, D., & Zucco Jr, C. (2014). The power of partisanship in Brazil: Evidence from survey experiments. *American Journal of Political Science*, 58(1), 212-225.

Shaeffer, K. (2019) Share of Americans who favor stricter gun laws has increased since 2017. (Pew Research Center, Washington, DC).

Van Boven, L., Ehret, P. J., & Sherman, D. K. (2018). Psychological barriers to bipartisan public support for climate policy. *Perspectives on Psychological Science*, 13(4), 492-507.

Winterich, K. P., Zhang, Y., & Mittal, V. (2012). How political identity and charity positioning increase donations: Insights from moral foundations theory. *International Journal of Research in Marketing*, 29(4), 346-354.

Unanticipated Practice Disruption: Experiencing Purgatory

Kamran Razmdoost, ESCP Business School, UK
Leila Alinaghian, Cranfield University, UK
Elmar Kutsch, Cranfield University, UK

EXTENDED ABSTRACT

Practices — as routinized behavior consists of bodily and mental activities orchestrated by things and their use, knowledge, knowhow and state of emotion (Reckwitz, 2002) — are integral part of our living and consumption efforts. Repetition and anticipation are ways through which we manage uncertainty, risk and potential anxiety. In fact, routinization is the fundamental mechanism through which a sense of ontological security (or deep trust in life activities) are achieved (Gidden, 1984; Phipps and Ozanne, 2017). Focusing on anticipated disruptions (i.e., decreased rainfall), Phipps and Ozanne (2017) illustrated the emergence of new ontological states of (in)security as a result of a routine disruption. Nonetheless, disruptions are not always anticipated, nor are managed through reflexive efforts. Unanticipated disruptions such as unanticipated war, flood, fire, cancelled flight, car accident, power cut or illness create an unwanted, unplanned and in many cases unimaginable situational context for consumers. In this study, we aim to unpack the enactment of physical, mental and social processes by which consumers experience the state between unanticipated disruption and the original state of security, the state that we titled purgatory.

We adopted an ethnographic approach in this study to account for observable actions as well as feelings, sense making processes and meanings associated to those actions. Unanticipated disruptions are challenging (if not impossible) to observe. Hence, we chose K2 2008 disaster as the context of our study, an event which has been accurately documented and has been visually recorded (i.e., through GoPro videos). Further reflexive interviews with key people involved in the incident provided the full understanding of the context. The early morning of 1st August 2008 saw a total of 32 climbers preparing themselves in their quest to conquer the summit. The slow pace eventually led to climbers (18 out of 32) reaching the summit as late as 8 pm, a dangerous situation on a peak where 2 pm is considered relatively safe. On their descending effort, climbers faced multiple disruptions including lack of energy, darkness, lack of oxygen, avalanches and loss of ropes. Eventually, 11 climbers lost their lives, three were severely injured and the rest were emotionally affected including those who had lost their families.

We identified three key processes through which climbers made sense and managed disruption:

Apprehension

There have been multiple interpretations of what the disruption was including the slow ascent, too many climbers, low skilled climbers, disrespecting responsibilities, communication failure, high attitude, avalanche etc. Not only climbers had dissimilar perceptions of disruption but also their realization of disruption occurred at different points in the journey. Interestingly, a few climbers did not even perceive any disruption and completed their experience in a routinized way (although they realized it retrospectively). Apprehension involved a set of activities (rather than a moment of realization) including the sense making of disruption, re-evaluation of disruption signals, anxiety management and coping decision. Climbers' identity work was salient in this process, where they constantly defined and redefined themselves, their status and differences with others opposing their views.

Improvisation

The coping actions were improvised by the climbers and they (individually or collectively) adopted different ways of dealing with the disruption. The improvisation heavily was based on the evaluation of resources and their imagination of the situation using the most similar experiences in the past. Furthermore, climbers engaged in boundary spanning practices to create new resources or bring new use to the existing resources. Climbers engaged in two set of practices: a) the ones routinized through previous resource interactions based on available resources (e.g., descending on ice using their physical skills) and b) those practices that they invented through their boundary work (e.g., descending with no use of axe).

Recovery

The survivors and the families and friends of those who died went through a physical and mental recovery from the course of events. At the initial stages after the crisis, recovery involved a deep reflection on the causal attribution of disruption and finding the truth. Given the fluid nature of the disruption, there was a gap on the way events were interpreted by different actors, however the views have converged over time through direct and indirect dialogue. Finally, affected climber moved on from the crisis by managing their emotional engagement with the event. Moving to the state of embedded security was evident in those initiating similar practices (e.g., another adventurous expedition). Throughout the interview however, we have realized that not all of the climbers achieved ontological security and some may never engage with such practices.

Our findings have theoretical implications for routine disruption and practice literature. Firstly, we showed that consumers facing unanticipated disruptions aim to move to the original state of embedded security, in contrast with anticipated disruptions where they adapt to the new state of security (Phipps and Ozanne, 2017). Secondly, we illustrated that practice disruption is a cultural process, socially constructed by people going through it. In fact, in many cases consumers may consider their state of ontological insecurity as a component of the practice rather than a disruption. In those cases, climbers perceive disruption signals as betrayals of the nature and engage with a set of practices to take back the control of the nature (refer to purifying practices, Canniford and Shankar, 2013). Consumers respond to disruption signals to defend, enhance and recreate their identity and use their apprehension of disruption as a form of demythologizing practices to disentangle their consumption investment from a devaluing myth associated with the disruption (Arsel and Thompson, 2011). Finally, we indicated that institutions, their boundaries and identities defined within those boundaries disappear at points between practices disruption and state of embedded security. In this setting, timeflow (i.e., "a practice's ability to induce a certain pattern of experienced temporality in those performing the practice", Woermann and Rokka, 2015, p. 1487) does not exist as no pattern of temporality is embedded in cultural resources. Indeed, consumers experience full power over institutions and social boundaries (Foucault, 1982), whereas they are bounded by time to create new resources and institutions.

REFERENCES

Akaka, M.A. and Schau, H.J. (2019), "Value creation in consumption journeys: recursive reflexivity and practice continuity", *Journal of the Academy of Marketing Science*, 47, 499–515.

Arsel, Z. and Thompson, C.J. (2011), "Demythologizing Consumption Practices: How Consumers Protect their Field-Dependent Identity Investments from Devaluing Marketplace Myths", *Journal of Consumer Research*, 37 (5), 791–806.

Canniford, R. and Shankar, A. (2013), "Purifying Practices: How Consumers Assemble Romantic Experiences of Nature", *Journal of Consumer Research*, 39 (5), 1051–69.

Foucault M. (1982), "The Subject and Power", *Critical Inquiry*, 8(4) 777–795.

Giddens, A. (1984), *The Constitution of Society: Outline of the Theory of Structuration*, Berkeley, CA: University of California Press.

Phipps, M. and Ozanne, J.L. (2017) "Routines Disrupted: Reestablishing Security through Practice Alignment", *Journal of Consumer Research*, 44(2), 361–380.

Reckwitz, A. (2002), "Toward a Theory of Social Practices: A Development in Culturalist Theorizing", *European Journal of Social Theory*, 5(2), 243–263.

Robinson, T. D. and Arnould, E.J. (In Press), "Portable technology and multi-domain energy practices", *Marketing Theory*, https://doi.org/10.1177/1470593119870226.

Woermann, N. and Rokka, J. (2015), "Timeflow: How Consumption Practices Shape Consumers' Temporal Experiences", *Journal of Consumer Research*, 41 (6), 1486–1508.

"Branding the Past: Constructing Brand's Heritage"

Fatima Regany, University of Lille, France
Helene Gorge, University of Lille, France
Ludovic Cailluet, EDHEC Business School, France

EXTENDED ABSTRACT

Introduction

History has the potential for being managed and used by organizations as a strategic resource (Cailluet et al. 2018). Research in marketing shows that historical narratives of brands are transformed into marketing resources by corporations and are embedded into brand identity which gives rise to the concept of heritage brand (e.g. Balmer and Burhausen, 2019; Pecot and De Barnier, 2017; Urde et al., 2007). Brands mediate the commercialization of past memories, which play a vital role in creating markets (e.g. Brunk, Giesler and Hartmann, 2018; Holt, 2004). We assume that the past can offer benefits to corporations, which transform it into a branding heritage resource (Chronis, 2005; Penaloza, 2000). However, little is known about the process of constructing a brand heritage resource. More specifically how are managed dynamics and tensions in the construction of a brand's historical heritage? While conducting a qualitative study, we address this issue by showing in which way different types of memories (Ricoeur, 2004) are constructed by a set of actors engaged in the construction of brand heritage.

Literature

Urde et al. (2007, 4) define heritage brand "as a dimension of a brand's identity found in its track record, longevity, core values, use of symbols, and particularly in an organizational belief that its history is important". Cultural branding scholars explore an alternative temporality of the brand and have conceptualized it as an historical artifact evolving over time and subject to collective interpretations by numerous actors over historical moments (Hatch and Rubin, 2006; Holt, 2004). Research highlights different forms of ambiguities and controversies in brand's use of historical resources - glorification, embellishment, augmentation, invention, deformation (e.g. Balmer and Burhausen, 2019; Brown et al. 2103; Beverland, 2006; Beverland, Lindgreen and Vink, 2008; Hobswawn and Ranger, 1992). Ricoeur (2004) took up the question of memory and recollection. History is the learned heir of memory and is always responsible for giving meaning to a past, through a configuration and narrative choices (Pellauer and Dauenhauer, 2016). With the aim to study dynamics of brand heritage construction, we analyze how organizations attempt to transform the past into a brand resource and more specifically how different actors construct memory. To do so we use the theoretical framing on memory proposed by Ricoeur (2004): history presupposes a policy of « just memory » that is to say an ethics, by distinguishing three types of problems: blocked memory (for example following a trauma), manipulated memory (for example to ideological aims) and forced memory (as obligated by commemorations). These problems are reflected in organizations' forgetting or remembering strategies.

Methods

We have collected data on six French based brands with hold a historical heritage (Air France, Hermès, Lacoste, La Vache qui Rit, Michelin and the French national railway company SNCF) according to various criteria: i) they all have a long enough existence (respectively born in: 1933, 1938, 1921, 1933, 1837, 1889) ii); they have also been chosen to represent diversity in terms of sectors and products. To explore the tensions that may occur in the construction and management of the brand heritage, we have collected data from different sources. This variety allows for triangulation to build a robust set of data (Flick, 2018), and makes for greater reflexivity and critical analysis of sources. Table 1 summarizes our empirical materials and data collected. All these data have been analyzed through hermeneutics (Belk et al., 2012; Thompson, 1997).

Findings and discussion

The analysis of our data reveals that the construction of brand's heritage is shaped around the three types of « memories » advocated by Ricoeur (2004) as abuses in constructing history: blocked memory, manipulated memory and forced memory. Each type of memory shows how different actors interact in constructing the brand heritage and highlights the instrumentality of this process.

Literature on brand heritage considers that a consensus is established in organizations as regard the nature of this heritage (Burghausen and Balmer, 2014; Hudson, 2011; Pecot and DeBarnier, 2017; Urde et al., 2007). We question it in the following research by showing that actors involved with the construction of brand heritage have conflicting interests. We highlight an additional "use-of-the-past" ambiguity (Brown and al., 2013; McAlexander et al. 2002) with the embeddedness in the construction of brand's heritage of two competing approaches: a scientific historical approach versus a narrative heritage branding approach, both confronting each other to find a consensus.

An important element in this discussion related to Ricoeur (2004) is the relationship between ethics and truth. How to define truth and what is it? These truths can be really diverse when historians elaborate their research questions. This suggests a further discussion on the absence of falsification. Marketers do not even have to forge the past. Most historical efforts are expressed as a narrative. The crafting of this narrative is central to the perception of the audience and affects the understanding of the message. There is no neutrality in the narrative itself that contains a plot, heroes and a conclusion that orients the reader. Manipulating the past is however limited by the collective nature of memory that tends to be difficult to be controlled entirely by organizations.

REFERENCES

Anteby, M., Molnar, V. (2012). Collective memory meets organizational identity: Remembering to forget in a firm's rhetorical history. *Academy of management journal, 55*(3), 515-540.

Balmer, J. M., Burghausen, M. (2019). Marketing, the past and corporate heritage. *Marketing Theory*, *19*(2), 217-227.

Balmer, J.M. (2011). Corporate heritage identities, corporate heritage brands and the multiple heritage identities of the British Monarchy. *European Journal of Marketing,* 45(9–10): 1380–1398.

Balmer, J.M., Greyser S., Urde, M. (2006). The Crown as a corporate brand: Insights from monarchies. *Journal of Brand Management,* 14(1–2): 137–161.

Belk, R., Fischer, E., Kozinets, R. V. (2012). *Qualitative consumer and marketing research*. Sage.

Beverland M., Lindgreeen A., Vink M. (2008). Projecting authenticity through advertising: Consumer judgments of advertisers' claims. *Journal of Advertising,* 37(1): 5–15.

Beverland, M. (2006). The 'real thing': Branding authenticity in the luxury wine trade. *Journal of Business Research*, 59(2), 251–258.

Brunk, K. H., Giesler, M., Hartmann, B. J. (2018). Creating a consumable past: How memory making shapes marketization. *Journal of Consumer Research*, 44, 1325–1342.

Brown, S., McDonagh, P., Shultz C.J. (2013). Titanic: Consuming the Myths and Meanings of an Ambiguous Brand. *Journal of Consumer Research*, 40 (4), 595–614.

Brunk, K. H., Giesler, M., Hartmann, B. J. (2018). Creating a consumable past: How memory making shapes marketization. *Journal of Consumer Research*, 44(6), 1325-1342.

Burghausen, M.,Balmer J.M. (2014) Corporate heritage identity management and the multi-modal implementation of a corporate heritage identity. *Journal of Business Research,* 67(11): 2311–2323.

Cailluet, L., Gorge, H., Özçağlar-Toulouse, N. (2018). 'Do not expect me to stay quiet': Challenges in managing a historical strategic resource. *Organization Studies*, 39(12), 1811-1835.

Chronis, A. (2005). Our Byzantine heritage: Consumption of the past and its experiential benefits. *Journal of Consumer Marketing,* 22(4): 213–222.

Flick, U. (2018), Triangulation in data collection, Flick U. (ed.) The SAGE Handbook of qualitative data collection. UK : Sage.

Fournier, A. (2019), « SNCF, la fin d'un mythe » : la bataille du rail, Le Monde. 23 Mai.

Halbwachs, M. (1992). *On collective memory*. Chicago, The University of Chicago Press, 1992

Hatch, M.J., Schultz, M. (2004). *Organizational Identity*. Oxford University Press.

Hatch, M. J., Rubin, J. (2006). The hermeneutics of branding. *Journal of Brand Management*, 14(1-2), 40-59.

Hobsbawn, E., Ranger T. (1992). *The Invention of Tradition*. Cambridge: Cambridge University Press.

Holt, D. B. (2004). *How brands become icons: The principles of cultural branding*. Boston: Harvard Business School Press.

Hudson, B., Balmer, J.M. (2013). Corporate heritage brands: Mead's theory of the past. *Corporate Communications: An International Journal,* 18(3): 347–361.

Hudson, B. (2011). Brand heritage and the renaissance of Cunard. *European Journal of Marketing,* 45(9–10): 1538–1556.

McAlexander, J. H., Schouten, J. W., Koenig, H. F. (2002). Building brand community. *Journal of marketing*, 66(1), 38-54.

Mena, S., Rintamäki, J., Fleming, P. (2016). On the forgetting of corporate irresponsibility. *Academy of Management Review,* 41(4): 720–738.

Mead, G.H. (1929). The nature of the past. In: Coss J (ed.) *Essays in Honor of John Dewey*. New York: Henry Holt & Co., 235–242.

Merchant A., Rose G.M. (2013), Effects of advertising-evoked vicarious nostalgia on brand heritage. *Journal of Business Research*, 66:12, 2619-2625,

Pecot, F., de Barnier, V. (2017b). Brand heritage: The past in the service of brand management. *Recherche et Applications en Marketing*, 32(4), 72–90 English Edition.

Pecot, F., Merchant, A., Valette-Florence, P., de Barnier, V. (2018). Cognitive outcomes of brand heritage: A signaling perspective. *Journal of Business Research*, 85, 304-316.

Pellauer, D., Dauenhauer, B. (2020). *Paul Ricoeur*, The Stanford Encyclopedia of Philosophy (Winter 2016 Edition), Edward N. Zalta (ed.).

Peñaloza, L. (2000). The commodification of the American West: Marketers' production of cultural meanings at the trade show. *Journal of Marketing,* 64: 82–109.

Ricœur, P. (1985). *Temps et récit. Tome III: le temps raconté*. Paris: Seuil.

Ricœur, P. (2000). *La mémoire, l'histoire et l'oubli* (Points Ess). Paris: Seuil.

Ricoeur, P. (2004), Mem*ory, History, Forgetting*, trans. Kathleen Blamey and David Pellauer. Chicago: University of Chicago Press.

Suddaby, R., Foster, W.M., Trank C.Q. (2010). Rhetorical history as a source of competitive advantage. *Advances in Strategic Management,* 27(2010): 147–173.

Thompson, C.J., Tian K. (2008). Reconstructing the South: How Commercial Myths Compete for Identity Value through the Ideological Shaping of Popular Memories and Countermemories. *Journal of Consumer Research*, 34 (5), 595–613.

Thompson, C. J. (1997). Interpreting consumers: A hermeneutical framework for deriving marketing insights from the texts of consumers' consumption stories. *Journal of marketing Research*, 34(4), 438-455.

Urde, M., Greyser, S. A., Balmer, J. (2007). Corporate brands with a heritage. *Journal of Brand Management*, 15(1), 4–19.

White, H. (2006). Historical discourse and literary writing. In: Korhonen K (ed.) *Tropes for the past: Hayden White and the History/Literature Debate*. Leiden: Brill, 25–33.

Reclaiming Control: A Multi-method Investigation of Consumer Response to Privacy Violations

Brandon Reich, Portland State University, USA
Chi Tran, University of Oregon, USA
Hong Yuan, University of Oregon, USA

EXTENDED ABSTRACT

Consumers are outraged by privacy violations from some brands (e.g., Facebook; Nivea 2019) but not others (e.g., Amazon; Lynskey 2019), representing a "privacy paradox" (Norberg, Horne, and Horne 2007). Clarity is lacking around this paradox (Krasnova et al. 2010) and around privacy as a consumer construct more generally (Martin and Murphy 2017). The current research uses a multi-method approach to address this dearth of knowledge. A pilot study clarifies the privacy construct, which is then applied to examine the privacy paradox using scraped Twitter data (study 1) and an experiment (study 2). We hypothesize and find that consumers' sense of control plays a central role in differential consumer responses to otherwise equivalent privacy violations across companies.

Privacy violations threaten consumers' subjective control (Martin, Borah, and Palmatier 2017), leading to control-reclaiming behaviors (Deci and Ryan 2000) such as brand selection (Schiele and Venkatesh 2016) or verbal expressions (Thimm, Rademacher, and Kruse 1995). However, these reclamations emerge only when regaining control is objectively possible (Skinner and Zimmer-Gembeck 2010). Otherwise, a sense of helplessness inhibits control-reclaiming behaviors (Dweck 1999). We therefore expect a severe (vs. moderate) privacy violation to prompt greater control-reclaiming behaviors, only when the violating company operates in an industry with high variability of privacy practices. This is because, in this market context, regaining control is still objectively possible. However, in a more homogenous industry, consumers are unlikely to engage in control-reclaiming behaviors regardless of violation severity because, objectively, regaining control is impossible.

In the pilot study, participants (N=139 MTurk workers) were presented with twelve recent instances of consumer privacy violations and asked to rate their perceived level of privacy violation for each (1=*Not at all a privacy violation*; 7=*An extreme privacy violation*). A PCA found that the twelve ratings converged into three components (see figure 1), reflecting scenarios in which companies merely collected consumer information (*recording*; M=3.38, SD=1.30), used consumer information for personalized targeting purposes (*targeting*; M=5.16, SD=1.21), and shared consumer data with third parties (*sharing*; M=6.12, SD=1.06). A repeated-measures ANOVA with polynomial contrasts showed a significant linear trend ($F(1, 138)$=376.36, p<.001), suggesting progressively increasing levels of privacy violation associated with these three dimensions.

Study 1 used text analysis of Twitter data to compare linguistic response to *targeting* or *sharing* privacy violations from Facebook and Amazon, creating a 2 (violation type: targeting, sharing) × 2 (company: Facebook, Amazon) quasi-experiment. We expected increased control-reclaiming behavior in response to *sharing* (vs. *targeting*) from Facebook because it operates in an industry with high variability in privacy practice (Ahmad 2018). However, because Amazon operates in a more standardized industry (Paul 2020), felt helplessness should inhibit consumers' control-reclaiming behavior regardless of the company's privacy-violating action. Control-reclaiming behavior was operationalized as use of first-person plural ("we") and second-person singular ("you") pronouns, which serve as verbal expressions of power (Cassell et al. 2006) and control reclamation (Thimm et al. 1995).

We scraped 3,805 tweets from the Twitter API using matched keywords reflecting privacy-violating action (*targeting* or *sharing*) with either Amazon or Facebook. Keywords regarding *targeting* (*sharing*) were "targeting," "targeted," "targets" ("sharing data," "shares data," "shared data," "third party data," "3rd party data"). Using LIWC (Pennebaker et al. 2015), we recorded frequencies of "we" and "you." A 2 (violation type) × 2 (company) MANOVA (df=1, 3801 for F-tests; see table 1 for means and SDs) revealed the expected interaction for "we" (F=6.85, p=.009) and "you" frequencies ($F = 70.49$, $p < .001$). Planned contrasts showed that, for tweets referencing Facebook, *sharing* (vs. *targeting*) was associated with significantly greater usage of "we" ($F = 6.85$, $p = .009$) and "you" (F=189.60, p<.001), whereas no effects of violation type were observed among tweets referencing Amazon (ps > .14). This pattern may be explained by an industry-level characteristic—variability in privacy practice—that differs between Facebook and Amazon.

Study 2 (N=214 MTurk workers) used a 2 (violation type: targeting, sharing) × 2 (industry variability: low, high) full-factorial design to replicate these findings in a more controlled setting. Participants were told "Industry X" contained four companies (A, B, C, and D) and were asked to imagine themselves as current customers of "Company A". In the low (high) variability condition, all companies in Industry X used consumer data in the same way (different ways). Participants in the *targeting* (*sharing*) condition then saw a pop-up detailing Company A's policy of using consumer data to deliver targeted ads (share with third-parties), and indicated whether they would continue onto Company A's website (0) or switch to another brand (1). An ANOVA (df for F-tests=1, 210) on brand switching revealed main effects of violation type (F=9.12, p=.003) and industry variability (F=6.81, p=.01), qualified by the expected interaction (F=4.39, p=.04). Planned contrasts revealed that, in the high industry variability condition, participants were significantly more likely to switch brands following a *sharing* (vs. *targeting*) violation (F=11.26, p=.001). However, in the low industry variability condition, violation type had no effect on switching behavior (p=.50). This suggests that consumers only attempt to reclaim control after a severe privacy violation when market constraints permit such a possibility.

Privacy is more prescient than ever before, yet, the literature provides little clarity around privacy violation as a construct and the alleged privacy paradox. The current research unveiled three increasingly severe dimensions of privacy violation (*recording*, *targeting*, and *sharing*) and showed that consumers are more likely to engage in control-reclaiming behaviors following a *sharing* (vs. *targeting*) privacy violation when the company operates in an industry with high (but not low) variability in privacy practices. Our findings suggest that privacy violation is primarily a matter of what companies do with consumer data rather than the type or quantity of data collected. Furthermore, this research helps explain an otherwise opaque privacy paradox, showing an industry-level characteristic that moderates the relationship between different privacy violations and consumer response. Thus, not all privacy violations are equal, and so asking consumers for ubiquitous privacy consent might instigate backlash (e.g., through brand switching) as they later discover intrusive company actions.

REFERENCES

Ahmad, Ifran (2018), "How do Social Media Platforms Protect your Privacy?" *Social Media Today*, September 26, https://www.socialmediatoday.com/news/how-do-social-platforms-protect-your-information-infographic/533036/.

Cassell, Justine, David Huffaker, Dona Tversky, and Kim Ferriman (2006), "The Language of Online Leadership: Gender and Youth Engagement on the Internet," *Developmental Psychology*, 42 (3), 436-449.

Deci, Edward L., and Richard M. Ryan (2000), "The 'what' and 'why' of Goal Pursuits: Human Needs and the Self-Determination of Behavior," *Psychological Inquiry*, 11 (4), 227-268.

Dweck, Carol S. (1999), *Self-Theories: Their Role in Motivation, Personality, and Development*, Philadelphia, PA: Psychology Press.

Krasnova, Hanna, Sarah Spiekermann, Ksenia Koroleva, and Thomas Hildebrand (2010), "Online Social Networks: Why We Disclose," *Journal of Information Technology,* 25 (2), 109-125

Lynskey, Dorian (2019), "'Alexa, are you Invading my Privacy? The Dark Side of our Voice Assistants," *The Guardian*, October 9, https://www.theguardian.com/technology/2019/oct/09/alexa-are-you-invading-my-privacy-the-dark-side-of-our-voice-assistants.

Martin, Kelly D., Abhishek Borah, and Robert W. Palmatier (2017), "Data Privacy: Effects on Customer and Firm Performance," *Journal of Marketing*, 81 (1), 36-58.

Martin, Kelly D and Patrick E. Murphy (2017), "The Role of Data Privacy in Marketing," *Journal of the Academy of Marketing Science*, 45 (2), 135-155.

Nivea, Richard (2019), "At F8, Zuckerberg Unveils Facebook's New Mantra: The Future is Private," *CNET*, April 30, https://www.cnet.com/news/facebooks-new-mantra-the-future-is-private/#targetText=Mark.

Norberg, Patricia A., Daniel R. Horne, and David A. Horne (2007), "The Privacy Paradox: Personal Information Disclosure Intentions versus Behaviors," *Journal of Consumer Affairs*, 41 (1), 100-126.

Paul, Kari (2020), "They Know us Better than we Know Ourselves: How Amazon Tracked my last Two Years of Reading," *The Guardian*, February 3, https://www.theguardian.com/technology/2020/feb/03/amazon-kindle-data-reading-tracking-privacy?utm_source=pocket-newtab.

Pennebaker, James W., Ryan L. Boyd, Kayla Jordan, and Kate Blackburn (2015), *The Development and Psychometric Properties of LIWC2015*, Austin, TX: University of Texas at Austin.

Schiele, Kristen, and Alladi Venkatesh (2016), "Regaining Control through Reclamation: How Consumption Subcultures Preserve Meaning and Group Identity after Commodification," *Consumption Markets & Culture*, 19 (5), 427-450.

Skinner, Ellen A., and Melanie J. Zimmer-Gembeck (2011), "Perceived Control and the Development of Coping," in *The Oxford Handbook of Stress, Health, and Coping*, ed. Susan Folkman, New York, NY: Oxford University Press, 35-59.

Thimm, Caja, Ute Rademacher, and Lenelis Kruse (1995), "Power-Related Talk: Control in Verbal Interaction," *Journal of Language and Social Psychology*, 14 (4), 382-407.

A History of Failed Intentions:
When Focusing on Unintentional Outcomes Promotes Ideation

Taly Reich, Yale University, USA
Kelly B. Herd, University of Connecticut, USA
Alexander G. Fulmer, Yale University, USA

EXTENDED ABSTRACT

Companies increasingly rely on input from consumer ideation to steer new product development (Bayus 2013; Knipp 2014; Olenski 2015). Through a synthesis of literature on intentionality and personal control, the current research proposes a previously unknown and surprising procedural strategy to promote ideation: focusing on one's own history of failed intentions in a target domain. Concentration on one's own history of failed intentions seems counterproductive given purported benefits of self-affirmations (Downing 1986; Schmeichel and Vohs 2009). However, the current research explores whether focusing on histories of unintentional outcomes can actually benefit individuals by promoting subsequent ideation in that domain. We propose that because reflection on a history of failed intentions motivates individuals to regain threatened control, focusing on these past failed intentions promotes ideation relative to focusing on successful intentions.

We define ideation as "the formation of ideas or concepts" (Oxford University Press 2020), in line with Osborn's (1963) original proposition of the ideation protocol "brainstorming" with which one is to generate as many total ideas as possible. This operationalization is considered an appropriate metric to capture ideation in both consumer research and beyond (Brucks and Huang 2020; Dennis et al. 1996; Diehl and Stroebe 1987, 1991; Fitzsimons, Chartrand, and Fitzsimons 2008; Glover and Gary 1976; Mullen, Johnson, and Salas 1991; Stroebe and Diehl 1994). Because of a connection between intentionality and feelings of control, we propose that reflection on histories of unintentional outcomes influences subsequent ideation.

Our theorizing is based on the psychological association between intention and effort (Heider 1958), the latter increasing feelings of control (Lafargue and Franck 2009; Minohara et al. 2016). This suggests focusing on unintentional outcomes might reduce feelings of control. Personal control is characterized as "a belief that individuals can intentionally produce desired outcomes and prevent undesired ones" (Skinner, Chapman, and Baltes 1988). In non-depressed populations, baseline control is generally high and people only reach low levels of control when their sense of control is threatened (Alloy and Abramson 1979; Cutright, Bettman, and Fitzsimons 2013; Langer 1975; Taylor and Brown 1988). Our interest is in the potential ability of focusing on unintentional outcomes to lower this high state of baseline control.

Past research has found that threats to control elicit an automatic inclination to regain control (Fiske, Morling, and Stevens 1996). Such attempts can manifest through heightened preference for utilitarian products associated with problem solving (Chen, Lee, and Yap 2017), products requiring consumers to engage in hard work allowing them to feel like they achieved outcomes themselves (Cutright and Samper 2014), and product extensions that provide external structure by fitting well with a parent brand (Cutright et al. 2013). These findings indicate threatened control can steer consumers towards exertion of effort, not away from it. We build on these findings to predict reflection on a history of failed intentions promotes ideation in a target domain by inciting motivation to regain threatened control.

This theorizing predicts focusing on failed intentions should only promote ideation in domains in which failure elicits motivation to regain control. When circumstances are perceived as uncontrollable such that behavior and outcomes appear independent, the "helplessness hypothesis" would suggest motivation to regain threatened control is subverted (Mischel, Zeiss, and Zeiss 1974; Peterson, Maier, and Seligman 1993; Staub, Tursky, and Schwartz 1971). Because domains vary in perceived malleability (Dweck, Chiu, and Hong 1995), focusing on failed intentions should promote ideation only in domains in which ability is perceived as malleable, but should discourage ideation in nonmalleable domains in which one does not expect to regain control.

Our first study demonstrates that focusing on a history of failed intentions promotes ideation relative to focusing on a history of successful intentions and a control condition. A posttest establishes a causal link between focusing on unintentional outcomes and threatened personal control. Our second study reveals that consumers do not intuit this effect, illustrating that this cognitive strategy may be overlooked and underused. Our third study rules out an alternative explanation, demonstrating that it is truly focusing on intentional versus unintentional outcomes, not merely focusing on failures versus successes, that influences ideation. Our fourth study investigates our proposed mechanism of an attempt to regain threatened control as driving the promotion of ideation, showing that promotion of ideation is specific to domains in which ability is perceived as malleable suggesting a belief that personal control can be regained.

The current research illuminates a novel mechanism through which cognition can be employed to positively influence behavior by promoting ideation through focusing on a history of one's own failed intentions. Research concerning procedural strategies to influence ideation has shown that structural aspects such as individual versus group brainstorming (Diehl and Stroebe 1987, 1991; Mullen et al. 1991; Stroebe and Diehl 1994), priming with different corporate brand images (Fitzsimons et al. 2008), using different reinforcement criteria (Glover and Gary 1976), and simultaneous versus sequential presentation of information about the topic of ideation (Dennis et al. 1996), all differentially impact ideation. The present research is the first to examine the impact of focusing on histories of one's own failed intentions on subsequent ideation, and adds to the literature on ideation by finding that such a process promotes ideation through attempts to regain threatened control. Further, it contributes to research highlighting beneficial effects of reduced control (Averill 1973; Burger 1987, 1989; Chen et al. 2017; Cutright et al. 2013; Cutright and Samper 2014). By having consumers focus on their unintentional outcomes, we reveal a novel process by which threatened control can be harnessed to create more value than high control.

These results have interesting implications for organizations ranging from LEGO to the U.S. Army that are increasingly turning to customers to develop creative ideas for the marketplace. Gartner Inc. estimates soon more than half of consumer goods manufacturers will get 75% of their innovation and R&D capabilities from this type of "crowdsourcing" (Knipp 2014). Our research suggests consumers may offer more insights, ideas and solutions to fulfill the marketplace's needs and wants, if they reflect on their previous failed intentions.

REFERENCES

Alloy, Lauren B., and Lyn Y. Abramson (1979), "Judgment of Contingency in Depressed and Nondepressed Students: Sadder but Wiser?," *Journal of Experimental Psychology: General*, 108 (4), 441-85.

Averill, James R. (1973), "Personal Control Over Aversive Stimuli and its Relationship to Stress," *Psychological Bulletin*, 80 (4), 286-303.

Bayus, Barry L. (2013), "Crowdsourcing New product Ideas Over Time: An Analysis of the Dell IdeaStorm Community," *Management Science*, 59, (1), 226-44.

Brucks, Melanie S., and Szu-chi Huang (2020), "The Creativity Paradox: Soliciting Creative Ideas Undermines Ideation," *Manuscript submitted for publication.*

Burger, Jerry M. (1987), "Increased Performance with Increased Personal Control: A Self-presentation Interpretation," *Journal of Experimental Social Psychology*, 23 (4), 350-60.

____(1989), "Negative Reactions to Increases in Perceived Personal Control," *Journal of Personality and Social Psychology*, 56 (2), 246-56.

Chen, Charlene Y., Leonard Lee, and Andy J. Yap (2017), "Control Deprivation Motivates Acquisition of Utilitarian Products," *Journal of Consumer Research*, 43 (6), 1031–047.

Cutright, Keisha, and Adriana Samper (2014), "Doing it the Hard Way: How Low Control Drives Preferences for High-Effort Products and Services," *Journal of Consumer Research*, 41 (3), 730–45.

Cutright, Keisha M., James R. Bettman, and Gavan J. Fitzsimons (2013), "Putting Brands in their Place: How a Lack of Control Keeps Brands Contained," *Journal of Marketing Research*, 50 (3), 365-77.

Dennis, Alan R., Joseph S. Valacich, Terry Connolly, and Bayard E. Wynne (1996), "Process Structuring in Electronic Brainstorming," *Information Systems Research*, 7 (2), 268-77.

Diehl, Michael, and Wolfgang Stroebe (1987), "Productivity Loss in Brainstorming Groups: Toward the Solution of a Riddle," *Journal of Personality and Social Psychology*, 53 (3), 497-509.

____(1991), "Productivity Loss in Idea-generating Groups: Tracking Down the Blocking Effect," *Journal of Personality and Social Psychology*, 61 (3), 392-403.

Downing, C. Jerry (1986), "Affirmations: Steps to Counter Negative, Self-fulfilling Prophecies," *Elementary School Guidance and Counseling*, 20 (3), 174-79.

Dweck, Carol S., Chi-yue Chiu, and Ying-yi Hong (1995), "Implicit Theories and their Role in Judgments and Reactions: A Word from Two Perspectives," *Psychological Inquiry*, 6 (4), 267-85.

Fiske, Susan T., Beth Morling, and Laura E. Stevens (1996), "Controlling Self and Others: A Theory of Anxiety, Mental Control, and Social Control," *Personality and Social Psychology Bulletin*, 22 (2), 115-23.

Fitzsimons, Gráinne M., Tanya L. Chartrand, and Gavan J. Fitzsimons (2008), "Automatic Effects of Brand Exposure on Motivated Behavior: How Apple Makes You "think different"," *Journal of Consumer Research*, 35 (1), 21-35.

Glover, John, and A.L. Gary (1976), "Procedures to Increase Some Aspects of Creativity," *Journal of Applied Behavior Analysis*, 9 (1), 79-84.

Heider, Fritz (1958), The Psychology of Interpersonal Relations, New York: Wiley.

Knipp, Eric (2014), Use Crowdsourcing as a Force Multiplier in Application Development, Gartner, Inc. https://www.gartner.com/doc/2696620/use-crowdsourcing-force-multiplier-application.

Lafargue, Gilles, and Nicholas Franck (2009), "Effort Awareness and Sense of Volition in Schizophrenia," *Consciousness and Cognition*, 18 (1), 277–89.

Langer, Ellen J. (1975), "The Illusion of Control," *Journal of Personality and Social Psychology*, 32 (2), 311-28.

Maier, Steven F., and Martin E. Seligman (1976), "Learned Helplessness: Theory and Evidence," *Journal of Experimental Psychology: General*, 105 (1), 3-46.

Minohara, Rin, Wen Wen, Shunsuke Hamasaki, Takaki Maeda, Motoichiro Kato, Hiroshi Yamakawa, Atsushi Yamashita, and Hajime Asama (2016), "Strength of Intentional Effort Enhances the Sense of Agency," *Frontiers in Psychology,* 7, 1165.

Mischel, Walter, Robert Zeiss, and Antonette Zeiss (1974), "Internal-external Control and Persistence: Validation and Implications of the Stanford Preschool Internal-External Scale," *Journal of Personality and Social Psychology*, 29 (2), 265-78.

Mullen, Brian, Craig Johnson, and Eduardo Salas (1991), "Productivity Loss in Brainstorming Groups: A Meta-analytic Integration," *Basic and Applied Social Psychology*, 12 (1), 3-23.

Olenski, Steve (2015), "The State of Crowdsourcing," http://www.forbes.com/sites/steveolenski/2015/12/04/the-state-of-crowdsourcing/.

Oxford University Press (2020), "Ideation," https://www.lexico.com/en/definition/ideation.

Osborn, Alex F. (1963), Applied Imagination, 3rd edn, New York: Scribner.

Peterson, Christoph, Steven F. Maier, and Martin E.P. Seligman (1993), Learned Helplessness: A Theory for the Age of Personal Control, New York: Oxford University Press.

Schmeichel, Brandon J., and Kathleen Vohs (2009), "Self-Affirmation and Self-Control: Affirming Core Values Counteracts Ego Depletion," *Journal of Personality and Social Psychology*, 96 (4), 770-82.

Skinner, Ellen A., Michael Chapman, and Paul B. Baltes (1988), "Control, Means-ends, and Agency Beliefs: A New Conceptualization and its Measurement During Childhood," *Journal of Personality and Social Psychology*, 54 (1), 117-33.

Staub, Ervin, Bernard Tursky, and Gary E. Schwartz (1971), "Self-control and Predictability: Their Effects on Reactions to Aversive Stimulation," *Journal of Personality and Social Psychology*, 18 (2), 157-62.

Stroebe, Wolfgang, and Michael Diehl (1994), "Why Groups are Less Effective than their Members: On Productivity Losses in Idea-generating Groups," *European Review of Social Psychology*, 5 (1), 271-303.

Taylor, Shelley E., and Jonathon D. Brown (1988), "Illusion and Well-being: A Social Psychological Perspective on Mental Health," *Psychological Bulletin*, 103 (2), 193-210.

How Chunking in Graphical Information Processing Affects Consumer Decision Making

Julia Reinhard, University of Cologne, Germany
Hernán A. Bruno, University of Cologne, Germany

EXTENDED ABSTRACT

Graphs depicting changes of a magnitude over time or space are used widely in marketing, educational material, news, and public announcements. Consumers use graphs to make decisions in various contexts such as health (e.g., infectious diseases, product effectiveness over time), personal finance (e.g., interest rates), politics (e.g., immigration, elections) or climate change (e.g., global temperatures). A vast and disparate body of research has established the substantial impact of line graphs on decision outcomes (e.g., Hutchinson, Alba, and Eisenstein 2010).

This research investigates to what extent individuals process graphical information by grouping data points into subsets called chunks and how this process ("chunking") affects consumer decisions. Time series are characterized by uncertainty, discontinuity, and changes in level or trend, and graphs are often presented with additional design elements such as event markers, specific labels, superimposed trend lines for selected periods or other analytical information. It is still largely unknown how these characteristics and design elements affect consumer decision making. In two studies, we investigate how visual chunks delimited by changes in the data and design elements affect forecasts and decisions.

We extend prior research showing that graph comprehension is based on the chunk processing of information (Carpenter and Shah 1998) and propose that discontinuities in the graphical information flow serve to determine chunk boundaries. We build this argument based on previous research finding that object and event perception include processes in which points of discontinuities serve to segment objects into separate parts (Biedermann 1987) and ongoing experience into discrete events (Zacks 2020). Similar to how discontinuities guide attention in object and even perception, salient graph features and unexpected changes affect the attention of graph readers (O'Connor, Remus, and Griggs 1993, 1997; Ratwani, Trafton, and Boehm-Davis 2008). In line with these findings, we predict that changes in the data (e.g., changes in trend) and graphical design elements (e.g., event markers) serve to build visual chunks.

The literature documents that, when asked to make a forecast, individuals use heuristics to make inferences about trends or future values of data portrayed in graphs and weigh the most recent data points more (Alvarado-Valencia and Barrero 2014). We generalize these findings to a larger chunk being determined by discontinuities in the information flow. We predict that individuals rely relatively more on the last visual chunk to forecast future developments or decide between alternatives and ignore other available information (e.g., overall trend, developments in earlier chunks). Based on evidence that individuals assume past developments and trends to continue into the future which affects judgments and decisions (Harvey and Reimers 2013; Maglio and Polman 2016), we predict that the development in the last visual chunk influences decision making such that upward (vs. downward or flat) trends have a more positive effect on forecasts and decisions.

Study 1 (N=240) was conducted as paper and pencil survey on the campus of a large European university. Participants were shown line graphs depicting monthly product sales of fictional industrial products for 60 time periods. We manipulated the trend in the last visual chunk by introducing a change in trend from period t=40 either downwards or upwards. We generated different graphical patterns and used a counterbalanced within-subjects design such that each participant was presented with four graphs varying in the last trend and pattern but having exactly the same linear overall trend and statistical prediction. For each graph, we asked participants to forecast the future product sales at t=80. A linear mixed-effects regression showed that forecasts were significantly higher for graphs where an up- versus downwards trend in the last chunk was introduced (β=3.01, SE=.20, $p <$ .000, 95% CI=[2.66, 3.53]). These results showed that line graphs with varying trends in the last chunk led to significantly different forecasts despite having the same overall trend and statistical prediction.

Study 2 (N=271) recruited participants from the same population and consisted of two parts. Part 1 was similar to study 1 and employed a 2 (marker: early vs. late) x 2 (overall trend: negative vs. positive) within-subjects design. All graphs had the same functional form including two trend changes delimiting three visual chunks with a 1) flat, 2) positive or negative (depending on overall trend), and 3) flat chunk. For the early (late) condition, we included a marker at the first (second) change in trend which highlighted a trended (flat) last chunk. These markers were unrelated to the underlying data. While part 1 measured forecasts, part 2 consisted of a choice task and varied the location of the marker between-subjects. Each graph within a choice pair had the same linear prediction and overall mean, but differed in the underlying functional form such that graph A (B) had three visual chunks with a 1) positive (flat), 2) flat (positive), and 3) positive (flat) trend. Adding an early (late) marker highlighted a similar positive trend for both graphs (a positive vs. flat trend for graph A vs. B).

Study 2 showed that forecasts and choice shares for identical line graphs differed depending on the location of a superimposed marker. In part 1, forecasts were significantly closer to the series mean for the group which viewed graphs with a late (vs. early) marker highlighting a flat (vs. trended) last chunk (β=-1.08, SE=.24, $p <$ .000, 95% CI=[-1.63, -.56]). In part 2, a logistic regression showed a significant effect of the marker on choices (β=.99, SE=.26, $p <$ .000) such that in the early (late) condition option A was chosen by 48.9% (72.0%) and option B by 51.1% (28.0%).

Taken together, this research provides evidence for the role of chunking in graphical information processing and shows that chunks determined by discontinuities in the graph such as changes in trend and design elements affect forecasts and decisions. It generalizes existing findings on heuristics in graph-based decision making to show that individuals pay more attention to the last visual chunk and ignore information available in the whole data being presented. These results add to the literature on graph perception and have implications for the communication of quantitative information and public policy.

REFERENCES

Alvarado-Valencia, J. A., and Barrero, L. H. (2014). Reliance, Trust and Heuristics in Judgmental Forecasting. *Computers in Human Behavior*, *36*, 102-113.

Biederman, I. (1987). Recognition-by-components: a Theory of Human Image Understanding. *Psychological Review*, *94*(2), 115.

Carpenter, P. A., and Shah, P. (1998). A Model of the Perceptual and Conceptual Processes in Graph Comprehension. *Journal of Experimental Psychology: Applied*, *4*(2), 75.

Harvey, N., & Reimers, S. (2013). Trend Damping: Under-adjustment, Experimental Artifact, or Adaptation to Features of the Natural Environment?. *Journal of Experimental Psychology: Learning, Memory, and Cognition, 39*(2), 589.

Hutchinson, J. W., Alba, J. W., and Eisenstein, E. M. (2010). Heuristics and Biases in Data-based Decision Making: Effects of Experience, Training, and Graphical Data Displays. *Journal of Marketing Research*, *47*(4), 627-642.

Maglio, S. J., & Polman, E. (2016). Revising Probability Estimates: Why Increasing Likelihood Means Increasing Impact. *Journal of Personality and Social Psychology, 111*(2), 141.

O'Connor, M., Remus, W., and Griggs, K. (1993). Judgmental Forecasting in Times of Change. *International Journal of Forecasting*, *9*(2), 163-172.

____(1997). Going Up–Going Down: How Good are People at Forecasting Trends and Changes in Trends?. *Journal of Forecasting*, *16*(3), 165-176.

Ratwani, R. M., Trafton, J. G., & Boehm-Davis, D. A. (2008). Thinking Graphically: Connecting Vision and Cognition During Graph Comprehension. *Journal of Experimental Psychology: Applied, 14*(1), 36.

Zacks, J. M. (2020). Event Perception and Memory. *Annual Review of Psychology*, *71*, 165-191.

Dynamics of Consumption Experience – The Case of Eastern Express in Turkey

Bernd F. Reitsamer, University of Innsbruck, Austria
Andreas Kallmuenzer, La Rochelle Business School, France
Ayça Katitas, MCI Management Center Innsbruck, Austria

EXTENDED ABSTRACT

Delivering seamless consumption experiences has been a key priority for marketing scholars and practitioners over the past years (e.g., Lemon and Verhoef 2016). In fact, companies are increasingly seeking to expand their on-site experience towards early pre- and later post-consumption stages in the context of digital transformation. However, the question remains how to create consistent, memorable and seamless experiences. And even more important: How do consumption experiences unfold over time? This study targets to answer these questions and provides empirical evidence on the dynamic nature of experiential consumption.

Consumption experiences (CX) are subjective and embodied occurrences based on the interaction of the consumer and the environment (Holbrook and Hirschman 1982). They involve a great degree of sensory stimulation and can vary considerably in their intensity, valence and time-frame. Although extant research has accumulated a large body of knowledge addressing the nature of the concept, its dimensions, measurement, and consumers' responses (e.g., Brakus et al., 2009), it is striking that scholars have yet begun to conceptualize experiences from a dynamic perspective (e.g., Voorhees et al. 2017). This development is important because a considerable amount of the experience occurs during pre-consumption (i.e., need-recognition, information search, initial contact and booking) and post-consumption stages (i.e., memory retrieval, formation of attitudes and future behavior). Building on this dynamic perspective, the present research follows the call from Lemon and Verhoef (2016) towards a more journey-oriented, consumer-centric approach in the study of CX. We therefore conceptualize CX as embodied phenomenon (Barsalou, 2008), with consumers starting to form sensory perceptions, feelings and thoughts from early pre-consumption stage on towards the core encounter, storing them in memory and retrieving them as mental simulations throughout later post-consumption stages (Reitsamer et al. 2020). Since much of these projections and retrievals tend to be more positive than consumers' actual moment-by-moment evaluation (Wirtz et al., 2003), our study further builds on the rosy prospection and retrospection principle from cognitive science (Mitchell et al. 1997).

Our longitudinal research design follows a qualitative case study approach to explore CX over a period of four weeks. The context revolves around the Eastern Express (Doğu Ekspresi), an overnight passenger train departing from the Turkish capital Ankara to the city of Kars. Given the popularity and significance of the train ride, its long history and the high degree of sensory stimulation, the journey represents a suitable research setting to study the dynamics of CX. An ethnographic field study consisting out of three waves was conducted in February 2019. A total of 30 semi-structured interviews (each participant was interviewed before, during and after the train journey) and corresponding observational field notes were collected.

Results show that sensory, emotional, cognitive and behavioral dimensions of CX strongly differ in both their importance and their potential for prospection and retrospection. Among sensory cues, visual and motor impressions constitute the most important drivers for retrospection. Absorbing scenic impressions and sensing the continuous movement of the train resulted in rich cognitive schemata, which became stronger and more positive throughout post-consumption. This is consistent with previous consumer research confirming the dominant role of visual and motor input (Hecht and Reiner 2009). Auditory and haptic properties, however, played a subordinate role for both pro- and retrospection, even though previous research found that audition and touch become equally important to vision throughout post-stages (Fenko et al. 2010). The smoothing potential of the rosy view was particularly salient for olfactory impressions, as negative perceptions faded completely during later stages. Conversely, negative gustatory impressions persisted throughout post-consumption, unsusceptible of any rosy momentum. Similar to sensory input, emotions act as strong driver for cognitive processing. Particularly joy, comfort and happiness expressed during early stages of the experience gave rise to even more positive retrospective moments. As with sensory input, certain emotions were found to fade quickly (disgust), whereas others (dissatisfaction) continued to persist at later stages. Likewise, cognitive moments of nostalgia and learning simplified prospection and retrospection, as they enabled participants to relate the experience directly with their personal lives. Among behaviors, talking about the journey and sharing the experience with others constituted the two most prevalent themes. The conversational element was crucial during the journey and further expanded to post-stages by means of digital, customer-induced touchpoints (WhatsApp, Skype, Facebook, Instagram).

Practical implications of this study are manifold. From a corporate perspective, it is surprising how many (digital) touchpoints for interaction, bonding and persuasion remain unexploited during all three stages. Although consumers are taking the initiative for interaction with each other, show a clear desire to stay in touch and want to repeat similar experiences, the service provider in this study almost exclusively focused on the core-encounter and only showed marginal efforts to interact with consumers during pre- or post-core stages. Drawing on the study's results, firms are well advised to focus their CX strategies on visual and motor content and transfer them to pre- and post-encounters via company-induced, digital touchpoints. Since participants showed a strong tendency to share their experiences, firms need to ease the sharing process on digital channels, for example, by using memorable hashtags, creating social media sites of interest for their target audience or a dedicated mobile app to connect with co-travelers. Further, firms could stimulate cognitive learning experiences by providing a digital tour guide.

The present study is not without limitations as it focused on a specific peak-experience with a high level of visual and motor input people tend to remember well. Further, the valence of each experiential dimension might vary considerably in other servicescapes, different cultural areas or for alternative configurations along the product-service continuum. Lastly, since the sample consisted of a predominantly young group of international travelers, it would be interesting to study how touchpoints and retrospection differ for other target segments, such as elderly travelers.

REFERENCES

Barsalou, Lawrence W. (2008), "Grounded Cognition," *Annual Review of Psychology*, 59 (1), 617–45.

Brakus, Joško, Bernd H. Schmitt and Lia Zarantonello (2009), "Brand Experience: What Is It? How Is It Measured? Does It Affect Loyalty?" *Journal of Marketing*, 73 (May), 52–68.

Fenko, Anna, Hendrik N. J. Schifferstein and Paul Hekkert (2010), "Shifts in Sensory Dominance between various Stages of User-product Interactions," *Applied Ergonomics*, 41 (1), 34–40.

Hecht, David and Miriam Reiner (2009), "Sensory Dominance in Combinations of Audio, Visual and Haptic Stimuli," *Experimental Brain Research*,193, 307–14.

Hirschman, Elizabeth C. and Morris B. Holbrook (1982), "Hedonic Consumption: Emerging Concepts, Methods and Propositions," *Journal of Marketing*, 48(3), 92–101.

Lemon, Katherine N. and Peter C. Verhoef (2016), "Understanding Customer Experience Throughout the Customer Journey," *Journal of Marketing*, 80 (6), 69–96.

Mitchell, Terence R., Leigh Thompson, Erika Peterson, and Randy Cronk (1997), "Temporal Adjustments in the Evaluation of Events: The "Rosy View"," *Journal of Experimental Social Psychology*, 33, 421–48.

Reitsamer, Bernd F., Mathias C. Streicher and Karin Teichmann (2019), "Sensorimotor Experiences in Servicescapes Predict Attitude Formation Through Memory Dynamics: A Longitudinal Study. *Psychology and Marketing*, 37 (3), 479–87.

Voorhees, Clay M., Paul W. Fombelle, Yany Gregoire, Sterling Bone, Anders Gustafsson, Rui Sousa and Travis Walkowiak (2017), "Service Encounters, Experiences and The Customer Journey: Defining the Field and a Call to Expand Our Lens," *Journal of Business Research*, 79 (November), 269–80.

Wirtz, Derrick, Justin Kruger, Christie N. Scollon and Ed Diener (2003), "What to Do on Spring Break? The Role of Predicted, On-Line, and Remembered Experience in Future Choice," *Psychological Science*, 14 (5), 520–24.

"Recyclable or Not?" Consumers Cognitive Mechanisms Involved in an Everyday Uncertain Decision

Fanny Reniou, Université Rennes, CNRS, CREM-UMR 6211, France
Elisa Monnot, CY Cergy Paris Université, CNRS, THEMA, F-95000 Cergy, France

EXTENDED ABSTRACT

Encouraging households to recycle their waste is a major objective of sustainable development. Previous studies show that recycling is a matter of motivation, context or logistics. Following research on the cognitive determinants of recycling (Vining and Ebreo 1990; Ellen 1994; Kennedy et al., 2009; Izagirre-Olaizola, Fernández-Sainz and Vicente-Molina 2015), we argue that the way individuals use their knowledge about recycling is also crucial to understand this behaviour. Indeed, individuals' misunderstanding and doubts still lead to many mistakes, which may have damaging consequences. Using categorization theory (Rosch et al. 1976; Cohen and Basu 1987), this research aims at studying the cognitive mechanisms that underlie recycling behaviour. The objective is to answer the following question: how specific is the consumers' decision-making process in everyday recycling situations?

Research on waste recycling often study the determinants of recycling behaviour: socio-demographic variables (age, income, education level, gender, Guiot, Malas and Urien 2019), internal (environmental attitude, beliefs, values) and external motivation (social norms, financial incentives, laws, Shrum, Lowrey and Mc-Carty 1994) but also contextual and logistics variables (place at home, distance from collection points, Monnot, Reniou and Rouquet 2014). More recently, the literature investigates how several product-related characteristics influence disposal decisions to recycle (Trudel and Argo 2013; Trudel, Argo and Meng 2016). Few studies focus on cognitive determinants, i.e. knowledge about recycling, whereas some show that it is a significant determinant of recycling behaviour (Vining and Ebreo 1990; Ellen 1994; Kennedy et al. 2009; Izagirre-Olaizola et al. 2015).

The categorization theory is a relevant theoretical framework to study recycling decision-making. Indeed, recycling is an everyday decision of intermediate level (Cooper and Shallice 2000) but it can be complex for individuals who may doubt about their judgment on waste recyclability. Categorization mechanisms may help them resolve these doubts as they simplify the decision-making process. Other structuring effects may appear such as intuitive judgmental biases or "heuristics" (Tversky and Kahneman 1974), which simplify the decision-making process. The aim of this research is to understand the cognitive process that underlies recycling behaviour using the categorization theory.

We used a qualitative research design, which consisted in a data collection with twenty-four French recyclers. In a first step, respondents had to accomplish a recycling task of eighty types of waste (either recyclable or not). All respondents were in the same context and place, faced the same set of waste to recycle, without any time constraint and with two recycling bins ("recyclable" *vs.* "non-recyclable"). To reveal the respondents' thoughts and their internal system of categorization, we used the verbal protocols method; respondents explained aloud how they made their decision and why. In a second step, we conducted interviews to have a better understanding of the potential sources of error and difficulties linked to the recycling decision as well as consumers' emotions during this task. We used NVivo software to conduct a thematic content analysis of the data and a double coding.

This work enriches research on the cognitive dimension of recycling. It shows that recycling classification relies on packaging's representations (packaging materials, packaging category and packaging attributes) as well as on product's representations (product category, brand positioning and image). Beyond, individuals may use heuristics (such as representative heuristic, availability heuristic, anchoring heuristic, law of contagion, affective recruitment heuristic or imagination heuristic) to construct a mental representation of the recycling decision problem. Indeed recycling is a routine task for which individuals look for the easiest solution. Heuristics, cognitive biases and situations of mental discomfort, especially incongruence, may disrupt the categorization process in the case of recycling. All these disruptions of the categorization process may explain the famous gap between attitude and behaviour (Carrigan and Attalla 2001; Chatzidakis, Hibbert and Smith 2007). This research enriches the studies that used categorization theory for brands (Kreuzbauer and Malter 2005) or food products (Gallen et al. 2019). We apply this theoretical framework to the specific context of recycling, which implies a different relationship to the object of categorization (waste) leading to a particular categorization process. Recycling, as an everyday action of intermediate level (Cooper and Shallice 2000), often generates routine actions, which, surprisingly, do not necessarily imply a reduction in uncertainty. Indeed, individuals strongly rely on their representations to ease their recycling decision but they still may have doubts. Even habitual behaviours such as recycling require thought and may be associated with emotions, contrary to what the literature supports (Wood, Quinn and Kashy 2002).

By focusing on the cognitive dimension of recycling, this research raises some cognitive barriers that may lead to recycling errors. Therefore, it has implications for both manufacturers/packagers and public authorities who may use our results to improve packaging choices and consumer education regarding recycling.

REFERENCES

Carrigan, Marylyn and Ahmad Attalla (2001), "The Myth of the Ethical Consumer. Do Ethics Matter in Purchase Behavior?", *Journal of Consumer Marketing*, 18(7), 560-577.

Chatzidakis, Andreas, Sally Hibbert and Andrew P. Smith (2007), "Why People Don't Take their Concerns about Fair Trade to the Supermarket: The Role of Neutralization", *Journal of Business Ethics, 74(*1), 89-100.

Cohen, Joel B. and Kunal Basu (1987), "Alternative Models of Categorization: Toward a Contingent Processing Framework", *Journal of Consumer Research,* 13(4), 455-472.

Cooper, Richard and Tim Shallice (2000), "Contention Scheduling and the Control of Routine Activities", *Cognitive Neuropsychology*, 17(4), 297-338.

Ellen, Pam Scholder (1994), "Do We Know What We Need to Know? Objective and Subjective Knowledge Effects on Pro-ecological Behaviors", *Journal of Business Research,* 10, 43-52.

Gallen, Céline, Gaëlle Pantin-Sohier and Dominique Peyrat-Guillard (2019), "Cognitive Acceptance Mechanisms of Discontinuous Food Innovations: The Case of Insects in France", *Recherche et Applications en Marketing,* 34(1), 50-77.

Guiot, Denis, Ziad Malas and Bertrand Urien (2019), "Re-examining the Effects of Aging on Household Recycling Behavior: A Study in France", *Psychology and Marketing*, 36(6), 618–629.

Izagirre-Olaizola, Julen, Ana Fernández-Sainz and M. Azucena Vicente-Molina (2015), "Internal Determinants of Recycling Behaviour by University Students: A Cross-country Comparative Analysis", *International Journal of Consumer Studies*, 39(1), 25-34.

Kennedy, Emily H., Thomas M. Beckley, Bonita L. McFalane and Solange Nadeau (2009), "Why We Don't Walk the Talk: Understanding the Environmental Values/Behaviour Gap in Canada", *Human Ecology Review*, 16, 151-160.

Kreuzbauer, Robert and Alan J. Malter (2005), "Embodied Cognition and New Product Design: Changing Product Form to Influence Brand Categorization", *Journal of Product Innovation Management*, 22(2), 165-176.

Monnot, Elisa, Fanny Reniou and Aurélien Rouquet (2014), "Recycling Household Waste: A Classification of the Logistics Used by Consumers", *Recherche et Applications en Marketing,* 29(3), 75-97.

Rosch, Eleanor, Carolyn B. Mervis, Wayne D. Gray, David M. Johnson and Penny Boyes-Braem (1976), "Basic Objects in Natural Categories", *Cognitive Psychology,* 8(3), 382-439.

Shrum, L. J., Tina M. Lowrey and John A. McCarty (1994), "Recycling as a Marketing Problem: a Framework for Strategy Development", *Psychology & Marketing,* 11(4), 393-416.

Trudel, Remi and Jennifer J. Argo (2013), "The Effect of Product Size and Form Distortion on Consumer Recycling Behavior," *Journal of Consumer Research*, 40(4), 632-643.

Trudel, Remi, Jennifer J. Argo and Matthew D. Meng (2016), "The Recycled Self: Consumers' Disposal Decisions of Identity-Linked Products", *Journal of Consumer Research*, 43(2), 246-264.

Tversky, Amos and Daniel Kahneman (1974), "Judgment under Uncertainty: Heuristics and Biases", *Science,* 185(4157), 1124-1131.

Vining, Joanne and Angela Ebreo (1990), "What Makes a Recycler? A Comparison of Recyclers and Non-Recyclers", *Environment and Behavior,* 22(1), 55-73.

Wood, Wendy, Jeffrey M. Quinn and Deborah A. Kashy (2002), "Habits in Everyday Life: Thought, Emotion, and Action", *Journal of Personality and Social Psychology*, 83(6), 1281.

Battling Fear, Building Trust: How Service Providers Manage Emotions When Consumers Fail

Ramona Riehle, University of Innsbruck, Austria
Verena E. Wieser, University of Innsbruck, Austria
Niklas Woermann, University of Southern Denmark, Denmark

EXTENDED ABSTRACT

This video-ethnographic study in a ski-schooling context explores how service providers manage consumers' emotions in situations of consumer performance failure. Drawing on the concept of emotional scaffolding (Meyer and Turner 2007; Rosiek 2003; Rosiek and Beghetto 2009), we reveal how service providers apply three strategies: decelerating, trust building, and goal aligning. These reduce unconstructive, and foster constructive emotional responses to consumer performance failure.

Consumer performance failures refer to situations in which consumers do not fulfill their own or other's performance expectations (Tumbat 2011). They often appear unexpectedly, and bring forth emotions of fear (Celsi, Rose, and Leigh 1993) or frustration (Seregina and Weijo 2017). If not being managed, consumers' emotional responses can impede positive consumer experience (Lindberg and Eide 2016; Molander and Hartmann 2018; Seregina and Weijo 2017; Tumbat 2011).

How do consumers overcome destructive emotions in case of performance failure? So far, consumer research has mostly focused on consumers' self-management of emotions in cases of failure, particularly suspending (Tumbat 2011), adjusting (Molander and Hartmann 2018), or circumventing destructive emotions (Mick and Fournier 1998; Seregina and Weijo 2017). However, some consumers may also seek and receive emotional support from service providers or more experienced peers.

To generate an in-depth understanding of how service providers manage consumers' emotional responses to performance failures, we conducted a video-ethnographic study of ski schooling services. We combined verbal with video-observational methods (Arnould and Wallendorf 1994; Le Guen 2009), participated in and video-recorded adult skiing lessons and conducted semi-structured interviews with novice consumers and experienced ski instructors. Subsequently, we applied open coding and analyzed the data set in several rounds of iteration.

Drawing on the concept of emotional scaffolding (Meyer and Turner 2007; Rosiek 2003; Rosiek and Beghetto 2009), which evolved from Vygotsky's (1978) sociocultural learning theory, we demonstrate that service providers play a crucial role in turning failed consumer performances into positive consumer experiences via interactive emotion management. We reveal that consumers' performance failures can be preceded and followed by unconstructive but also by constructive emotions. Furthermore, we uncover that service providers apply the three emotional scaffolding strategies of *decelerating, trust building, and goal aligning* to manage consumers' emotional responses to potential and actual performance failure.

Decelerating physically and mentally slows consumers down and reinforces body awareness (Husemann and Eckhardt 2018). Ski instructors apply decelerating to scaffold an emotionally calm and constructive atmosphere that gives consumers the time needed to accept potential risks and emotionally recover from failures. If performance failures occur, service providers balance unconstructive emotions by staying calm and patient, giving time to refocus, and adjusting tasks and terrain to a slower pace.

Trust building creates an emotionally supportive atmosphere of trust (Mahn and John-Steiner 2002), so that consumers can ac-

cept the risk of performance failure and reveal their emotions. To strengthen trust, ski instructors foster constructive emotions. From the first second of the lesson onwards, instructors demonstrate a friendly and open nature and praise consumers. After performance failures, instructors aim to restore trust. They react in a supportive manner, show physical proximity, and rationalize failure and accompanying emotions.

Goal aligning adapts performance goals to consumers' individual abilities. Consumers have only vague ideas about the process of learning and are often unaware of how their individual fitness level, previous experiences, or cultural backgrounds influence their performance. Consumers may become frustrated by a lack of progress, or being unable to keep up with their group members. Ski instructors avoid such unconstructive emotions through carefully exploring consumers' boundaries and adapting their lesson goals accordingly.

Our contributions to consumer research are twofold: First, we complement research that reveals how consumers self-manage their emotions in case of performance failure (Mick and Fournier 1998; Molander and Hartmann 2018; Tumbat 2011) with a case of interactive emotion management. While we have focused on service providers' emotional support, further research may study how peers help consumers to resolve "emotional tension" from failures (Lindberg and Eide 2016). Second, our research suggests that consumer performance failure may enhance consumer experience, rather than compromise it—if emotions are managed well. In contrast to previous managerial literature, which has proclaimed that prevention is key to managing consumer failure (Tax, Colgate, and Bowen 2006), our research reveals that there is a constructive emotional potential in performance failure and that consumers can turn failure into a learning opportunity in interaction with service providers. Further research may study how consumers and service providers embrace failure as a "critical first step in a journey of discovery and learning" (Cannon and Edmondson 2005, 299) in other service contexts.

REFERENCES

Arnould, Eric J. and Melanie Wallendorf (1994), "Market-oriented Ethnography: Interpretation Building and Marketing Strategy Formulation," *Journal of Marketing Research*, 31 (4), 484–504.

Cannon, Mark D. and Amy C. Edmondson (2005), "Failing to Learn and Learning to Fail (Intelligently): How Great Organizations Put Failure to Work to Innovate and Improve," *Long Range Planning*, 38 (3), 299–319.

Celsi, Richard L., Randall L. Rose, and Thomas W. Leigh (1993), "An Exploration of High-Risk Leisure Consumption through Skydiving," *Journal of Consumer Research*, 20 (1), 1.

Husemann, Katharina C. and Giana M. Eckhardt (2018), "Consumer Deceleration," *Journal of Consumer Research*, 45 (6), 1142–63.

Le Guen, Olivier (2009), *The Ethnography of Emotions: A Field Worker's Guide:* Max Planck Institute for Psycholinguistics.

Lindberg, Frank and Dorthe Eide (2016), "Challenges of Extraordinary Experiences in the Arctic," *Journal of Consumer Behaviour*, 15 (1), 15–27.

Mahn, Holbrook and Vera John-Steiner (2002), "The Gift of Confidence: A Vygotskian View of Emotions," *Learning for Life in the 21st century*, 46–58.

Meyer, Debra K. and Julianne C. Turner (2007), "Scaffolding Emotions in Classrooms," in *Emotion in Education*, 243–58.

Mick, David G. and Susan Fournier (1998), "Paradoxes of Technology: Consumer Cognizance, Emotions, and Coping Strategies," *Journal of Consumer Research*, 25 (2), 123–43.

Molander, Susanna and Benjamin J. Hartmann (2018), "Emotion and Practice: Mothering, Cooking, and Teleoaffective Episodes," *Marketing Theory*, 18 (3), 371–90.

Rosiek, Jerry (2003), "Emotional Scaffolding: An Exploration of the Teacher Knowledge at the Intersection of Student Emotion and the Subject Matter," *Journal of Teacher Education*, 54 (5), 399–412.

Rosiek, Jerry and Ronald Beghetto (2009), "Emotional Scaffolding: The Emotional and Imaginative Dimensions of Teaching and Learning," in *Advances in Teacher Emotion Research: The Impact on Teachers' Lives*, 175–94.

Seregina, Anastasia and Henri A. Weijo (2017), "Play at Any Cost: How Cosplayers Produce and Sustain Their Ludic Communal Consumption Experiences," *Journal of Consumer Research*, 44 (1), 139–59.

Tax, Stephen S., Mark Colgate, and David E. Bowen (2006), "How to Prevent Your Customers from Failing," *MIT Sloan Management Review*, 47 (3), 30.

Tumbat, Gülnur (2011), "Co-constructing the Service Experience: Exploring the Role of Customer Emotion Management," *Marketing Theory*, 11 (2), 187–206.

Vygotsky, Lev S. (1978), "Mind in Society: The Development of Higher Psychological Processes," *Cambridge, MA: Harvard University*.

You Betrayed Me: The Dark Side of Reciprocal Reviewing

Laura Rifkin, Brooklyn College, USA
Canan Corus, Pace University, USA
Colleen P. Kirk, New York Institute of Technology, USA

EXTENDED ABSTRACT

The peer-to-peer (P2P) sector of the sharing economy is unsustainable without reciprocal reviewing reputation systems. Whereas researchers have examined the effect of reviews by consumers on sellers, in this research we examine, for the first time, a turn of the tables in which sellers review consumers. We propose that, given the reputational harm consumers can perceive from a negative review, P2P consumers retaliate using negative word of mouth (NWOM) not only against the peer provider, but also against the platform.

Psychological contracts are implicit agreements that arise when one party believes another is obligated to perform certain behaviors, and psychological contract violations can lead to feelings of betrayal that motivate retaliation (Robinson and Morrison 2000). P2P consumers expect platforms to protect members from harm inflicted by other peers (Perren and Kozinets 2018). Therefore, we propose that unless individuals knowingly commit a transgression, a negative review is considered a violation of the psychological contract between the consumer and the platform, resulting in perceived betrayal by the platform and NWOM (studies 1 and 2). Further, whether a violation leads to retaliation depends on attribution of the violation to the other contractual party, the fairness of procedures following the violation, and the magnitude of the perceived outcomes of the violation (Robinson and Morrison 2000). Accordingly, we demonstrate that the effect of review valence on NWOM through betrayal is intensified when the platform endorses (does not endorse) a host (study 3); does not allow (allows) a response to the review (study 4); and makes the review public (keeps it private; study 5).

Study 1. 87 students joined *Students4Students,* an ostensibly real P2P platform. After borrowing and using a textbook and reviewing the lender, participants received either a positive or negative review from the lender. They then reviewed the *Students4Students* platform with a star rating and comment on an independent review website. A negative (positive) review elicited *Students4Students* a lower star rating (M = 4.1 vs. 4.6; F(1, 85) = 7.88; p = .006); more negative comments (36.4% vs. 16.3%; χ^2(1) = 4.51; p = .034); and greater NWOM (M = 2.54 vs. 1.98; F(1, 85) = 3.88; p = .052).

Study 2. 222 Mturk participants imagined they had rented a house from Vacation Connections, a P2P platform, and followed (did not follow) the house rules. They received a negative (positive) review from the host. When participants received a positive review, perceived obligation fulfillment did not affect NWOM. However, when participants received a negative review, they reported greater NWOM when they fulfilled their obligations (M = 5.28) than when they did not (M = 3.14; F(1, 208) = 61.14; p < .001). Bootstrap analysis confirmed moderated mediation by perceived betrayal in this study and Studies 3, 4, 5.

Study 3. 360 Mturk participants read the study 2 scenarios and then read their host was (was not) a Premier Partner endorsed by Vacation Connections. When participants received a positive review, host endorsement had no impact on NWOM. However, after receiving a negative review, participants reported increased NWOM (M = 5.2 vs. 4.6; F(1, 337) = 5.73; p = .017) and made more negative comments (73.5% vs. 56.5%; χ^2(1) = 5.49; p = .019) when the platform endorsed (did not endorse) the host.

Study 4. 362 Mturk participants read the study 2 scenarios, then that the platform's response policy allows (does not allow) guests to respond to host reviews. Upon a positive review, response opportunity had no impact on NWOM. However, after receiving a negative review, participants reported increased NWOM (M = 5.5 vs. 4.5; F(1, 348) = 23.29; p < .001) and made more negative comments (85% vs. 54%; χ^2(1) = 19.94; p < .001) when the platform provided no opportunity (vs. an opportunity) to respond.

Study 5. 367 MTurk participants imagined renting a car from *Car Connections*, a P2P car sharing platform, and read that host reviews were public (private). When participants received a positive review, public/private had no impact on NWOM. However, when participants received a negative review, NWOM was greater (M = 5.2 vs. 4.5; F(1, 350) = 9.27; p = .003) and participants rated the platform fewer stars (M = 1.98 vs. 2.33; F(1, 350) = 5.29; p = .015) when the platform made the review public (vs. private).

In summary, although reviews of consumers originate from peer providers rather platforms, we show that consumers target platforms with NWOM when they are negatively reviewed. This effect is explained by perceived betrayal, and is augmented by commonly used platform intermediation choices.

REFERENCES

Perren, Rebeca, and Robert V. Kozinets. 2018. "Lateral Exchange Markets: How Social Platforms Operate in a Networked Economy." *Journal of Marketing* 82 (1):20-36.

Robinson, Sandra L., and Elizabeth Wolfe Morrison. 2000. "The Development of Psychological Contract Breach and Violation: A Longitudinal Study." *Journal of Organizational Behavior* 21 (5):525-546.

Mistakes Were Made: The Unintended Consequences of
Lighting and Identity-Relevant Mistakes on Marketplace Evaluations

Christine Ringler, University of Alabama, USA
Tracy Rank-Christman, University of Wisconsin - Milwaukee, USA

EXTENDED ABSTRACT

Personalization, a successful retail practice, is not only becoming more common, but these days, is practically expected by consumers (Byron 2019). Personalization has an overall positive impact on sales, with one retailer showing that when employees were able to tailor product recommendations to consumers, via an app, the company "generated a 10% lift in incremental sales and a 5% increase in transaction-size growth" (Boudet et al. 2018). From using consumer names (e.g., Starbucks) to knowing specifics about consumers, such as shoe size or color preferences (e.g., Nike; Safdar 2019), personalization varies from brand to brand in terms of just how personal the marketer is willing to get with their consumers. With the rise of personalization in a marketplace of billions, marketers have and will continue to make some mistakes (Kapner 2017).

There are a variety of ways that retailer's attempts at personalization can backfire. For instance, recognizing consumers may not always occur. Henderson et al. (2018) show that identifying returning customers of various races by face, at times, can be difficult for frontline employees. In addition, in retail environments that use names (e.g., Panera) to identify consumers orders, people may experience being called by the wrong name or even addressed as the wrong gender (Rank-Christman, Morrin, and Ringler 2017). All of these are examples of failed attempts at personalization that are tied closely to the consumer's identity, which is where we focus our research. Specifically, we ask, how do these identity-relevant mistakes impact consumers?

We investigate identity-relevant mistakes or errors that occur in the marketplace that pertain to the consumers identity, both personal and social. Personal identity relates to a consumer's individual identity, "a decontextualized description of personal traits, characteristics, and goals" (Oyserman 2009, p. 251), including their age, gender, and name. While social identities are contextualized and describe a group of people (e.g., university name; Oyserman 2009). Using various types of identity-relevant mistakes, we explore their impact on our dependent measures, consumer evaluations and negative post-purchase intentions, across four studies. Specifically, we look at the consumer's overall evaluation of the experience (product or service) and we explore negative post-purchase intentions, which is a combination of repatronage intentions, negative word-of-mouth, and complaint behavior (DeWitt and Brady 2003). These two dependent measures are vital, as they are clear indicators of consumer satisfaction and loyalty (Blodgett, Grandbois, and Walters 1993; DeWitt and Brady 2003). However, we believe the relationship between identity-relevant mistakes and our dependent measures will be moderated by something out of the consumer's control, atmospherics – specifically, lighting levels.

One of the easiest and most important (Areni and Kim 1994) ambient factors to change in brick-and-mortar stores and restaurants is the lighting level. Restaurants lower the lights during dinner and retail stores, such as Abercrombie & Fitch and Hollister, keep their lighting levels lower during store hours. In addition, concert venues, stadiums, and other establishments change the environments lighting levels throughout the consumers consumption experience. As it relates to identity, dimmer lighting has been shown to increase feelings of deindividuation (e.g., Zhong, Bohns, and Gino 2010). Interestingly, deindividuation has also been linked to decreased feelings

of uniqueness, which is an important dimension in feeling like one matters (Flett 2018).

To date, the literature has shown that deindividuation diminishes self-regulation and self-awareness (Diener 1980) and decreases honesty (Spears and Lea 1994). Bright lights often have the opposite effect, that is people feel more individuated (Maslach, Stapp, and Santee 1985). One unintended consequence of lowering (raising) the lighting levels in retail and service establishments is increased (decreased) feelings of deindividuation (e.g., Zhong et al. 2010). Yet, to our knowledge, it remains unknown as to how lighting, which results in deindividuation or individuation, interacts with marketplace identity-relevant mistakes and the impact these variables have on consumer evaluations and negative post-purchase intentions. Given past research in this area, we would expect identity-relevant mistakes to result in lower evaluations and increase negative post-purchase intentions, however, the interaction effect of these marketplace mistakes combined with consumer deindividuation as a result of lighting, has yet to be explored.

Since bright lights have been shown amplify, as the "the hot emotional system" becomes activated (Xu and Labroo 2013, p. 207), there is a chance that identity-relevant mistakes that occur in a brightly-lit environment will become amplified and thus, will have a negative impact on marketplace evaluations and negative post-purchase intentions. Yet, in four studies, we demonstrate the opposite actually occurs. That is when identity-relevant mistakes occur in a dimly-lit environment (i.e., consumer is deindividuated; pre-tested), the mistake becomes magnified, which results in lower experience ratings and higher levels of negative post-purchase intentions. We believe that this magnification occurs because when the consumer enters an environment that has dim lighting, the consumer experiences deindividuation, which has been identified as an important dimension of mattering (Flett 2018). When an identity-relevant mistake is added to that initial feeling of deindividuation, the consumer not only experiences an identity-relevant mistake, but experiences a sense of not mattering, which in turn amplifies the negative effect of the mistake.

In several studies, we show that feelings of not mattering are the underlying driver of this effect. Mattering reflects a customer's need to feel significant, which is often determined by how others see us (Cooley 1998; Flett 2018; Rosenberg and McCullough 1981). This notion is important and is based on the "looking glass self," (Cooley 1998), which suggests that one's identity exists, only as a result of the social other, as people see themselves based on how others see them. Therefore, feeling like one does not matter by a social other, in this case the service provider or marketer, is likely to have profound negative effects on the consumer. Building on this work, we predict that when consumers are in a dimly-lit room (deindividuated) and experience an identity-relevant mistake, they will experience feelings of not mattering. Feeling like one does not matter will then negatively impact consumer evaluations and increase negative post-purchase intentions. We explore this prediction across four studies utilizing different marketplace contexts.

The purpose of **Study 1** is to demonstrate that consumers who experience an identity-relevant mistake (vs. no mistake) in a dimly-lit room will rate the experience more negatively. While those in the brightly-lit room should not rate their experience any different. Participants completed a 2 (Mistake Type: identity-relevant mistake, no

mistake) X 2 (Lighting: bright, dim) between-subjects design. For mistake type, participants were addressed by their correct last name (no mistake) or by their last name but with an 'ie' added to the end (identity-relevant mistake).

Results indicate that those in the identity-relevant mistake condition, rated their experience as lower when the room was dimly-lit (M = 4.83) versus brightly-lit (M = 5.18, $F(1, 515) = 6.49$, $p = .01$). For those in the no mistake condition, there was no difference in evaluations (M_{dim} = 5.34 vs. M_{bright} = 5.25, $F < 1$). See table 1 for the main effects in studies 1-4.

In **Study 2**, we replicate and extend the effects established in Study 1, by exploring the underlying process driving these effects (i.e., feelings of not mattering). Participants completed a 2 (Mistake Type: identity-relevant mistake, no mistake) X 2 (Lighting: bright, dim) between-subjects design. For mistake type, participants were addressed by their correct last name (no mistake) or by the last name of Smith (identity-relevant mistake).

Results suggest that those in the identity-relevant mistake condition, rated the product as lower when in the dimly-lit (M = 4.79) versus brightly-lit (M = 5.64, $F(1, 422) = 25.97$, $p < .0001$) condition. Further, those in the identity-relevant mistake condition, indicated more negative post-purchase intentions when in the dimly-lit (M = 3.01) versus brightly-lit condition (M = 2.68; $F(1, 422) = 8.31$, $p = .004$). Additionally, those in the identity-relevant mistake condition, indicated greater feelings of not mattering when in the dimly-lit (M = 3.38) versus brightly-lit (M = 2.92, $F(1, 422) = 7.84$, $p = .01$) condition.

Using PROCESS model 8 (Hayes 2017), we find that feelings of not mattering mediated the relationship between mistake type and lighting on both dependent variables (product evaluation and negative post-purchase intentions), but only when in the dimly-lit condition.

Study 3 demonstrates that while all mistakes are likely to result in lower evaluations and more negative post-purchase intentions, identity-relevant (vs. marketplace-relevant) mistakes magnify those negative effects due to feelings of not mattering for the consumer. Participants, all in a dimly-lit room, completed a 2 (Mistake: mistake, no mistake) X 2 (Relevance type: identity-relevant, marketplace-relevant) between-subjects design. For identity-relevant mistake, participants received the rival team cup or the home team cup (no mistake). For the marketplace-relevant mistake, participants received iced tea instead of the drink they ordered. They received the drink they ordered in the no mistake condition.

Results suggest that when a mistake was made, participants a lower experience rating in the identity-relevant (M = 2.31) versus marketplace-relevant condition (M = 3.83, $F(1, 629) = 98.47$, $p < .0001$). However, when no mistake was made, participants rated the experience higher when in the identity-relevant (M = 6.00) versus marketplace-relevant condition (M = 4.36, $F(1, 629) = 135.59$, $p < .0001$), highlighting that when personalization is done wrong, there can be negative consequences; yet, when personalization is done right, it can boost evaluations.

Further, when a mistake was made, participants indicated increased negative post-purchase intentions when in the identity-relevant (M = 5.36) compared to the marketplace-relevant condition (M = 4.09, $F(1, 629) = 141.10$, $p < .0001$). However, when no mistake was made, participants indicated decreased negative post-purchase intentions when in the identity-relevant (M = 2.18) versus marketplace-relevant condition (M = 2.52, $F(1, 629) = 11.22$, $p = .001$) again highlighting the benefits of personalization.

Additionally, when a mistake was made, participants indicated greater feelings of not mattering in the identity-relevant condition (M = 4.19) compared to the marketplace-relevant condition (M = 3.29, $F(1, 629) = 49.87$, $p < .0001$). When no mistake was made, participants indicated marginally lower feelings of not mattering in the identity-relevant (M = 2.56) versus the marketplace-relevant condition (M = 2.78, $F(1, 629) = 3.50$, $p = .06$).

Using PROCESS model 8, we find that feelings of not mattering mediated the relationship between mistake and relevance type on both dependent variables, but only when an identity-relevant mistake was made.

Study 4 demonstrates how the negative effects seen in studies 1-3 can be mitigated, specifically by using a marketing message that highlights customer recognition. Participants, all in a dimly-lit room, completed a 2 (Mistake Type: identity-relevant mistake, no mistake) X 2 (Recognition message: present, absent) between-subjects design. Mistake type was manipulated as in Study 3. When the recognition message was absent, participants heard: "Thank you for shopping at the concession stand." When the message was present, an additional line was added: "We recognize you for being a great customer!"

Those in the identity-relevant mistake condition rated their overall experience as more positive when the recognition message was present (M = 3.20) versus absent (M = 2.32, $F(1, 217) = 16.73$, $p < .0001$). However, those in the no mistake condition rated their overall evaluation as being no different regardless of whether the recognition message was present (M = 6.06) or absent (M = 6.07, $F < 1$). Further, those in the identity-relevant mistake condition indicated less negative post-purchase intentions when the recognition message was present (M = 4.16) versus absent (M = 4.65, $F(1, 217) = 7.73$, $p = .006$). For those in the no mistake condition, negative post-purchase intentions were no different regardless of the presence of the recognition message ($M_{present}$ = 2.11 vs. M_{absent} = 1.99, $F < 1$).

Results also suggest that those in the identity-relevant mistake condition indicated greater feelings of not mattering when the recognition message was absent (M = 4.53) versus present (M = 3.96, $F(1, 217) = 8.87$, $p = .003$). Those in the no mistake condition rated their feelings of not mattering no differently as a result of the recognition message being present (M = 2.12) or absent (M = 2.16, $F < 1$).

Using PROCESS model 8 (Hayes 2017), we show that feelings of not mattering mediated the relationship between mistake type and recognition message on both dependent variables for the identity-relevant mistake condition.

Results from these four studies add to conversations in sensory marketing, identity-relevance, mistakes, and consumer feelings of not mattering. From this work, we show that consumers feel like they don't matter (e.g., Flett 2018) when identity-relevant mistakes occur in the dark and in turn, they evaluate their marketplace experience more negatively and they report higher negative post-purchase intentions compared to those that feel they have been recognized. Important theoretical and managerial implications result from these findings.

REFERENCES

Areni, Charles S. and David Kim (1994), "The Influence of In-Store Lighting on Consumers' Examination of Merchandise in a Wine Store," *International Journal of Research in Marketing*, 11 (2), 117-25.

Blodgett, Jeffrey G., Donald H. Grandbois, and Rockney G. Walters (1993), "The Effects of Perceived Justice on Complainants' Negative Word-Of-Mouth Behavior and Repatronage Intentions," *Journal of Retailing,* 69 (4), 399-428.

Boudet Julien, Brian Gregg, Kathryn Rathje, and Kai Volhardt (2018), "No Customer Left Behind: How to Drive Growth by Putting Personalization at the Center of Your Marketing," https://www.mckinsey.com/business-functions/marketing-and-sales/our-insights/no-customer-left-behind.

Byron Ellen (2019), "We Now Live in a World with Customized Shampoo," *Wall Street Journal,* https://www.wsj.com/articles/we-now-live-in-a-world-with-customized-shampoo-11555506316.

Cooley, Charles Horton (1998), *On Self and Social Organization.*, Chicago, IL: University of Chicago Press.

DeWitt, Tom and Michael K. Brady (2003), "Rethinking Service Recovery Strategies: The Effect of Rapport on Consumer Responses to Service Failure," *Journal of Service Research*, 6(2), 193-207.

Diener, Edward (1980), "Deindividuation: The Absence of Self-Awareness and Self-Regulation in Group Members," *The Psychology Group Influence*, 209-42.

Flett, Gordon (2018), *The Psychology of Mattering: Understanding the Human Need to be Significant*, London, United Kingdom: Academic Press.

Hayes, Andrew F. (2017), *Introduction to Mediation, Moderation, and Conditional Process Analysis: A Regression-based Approach*, New York, NY: Guilford Press.

Henderson, Geraldine Rosa, Tracy Rank-Christman, Tiffany Barnett White, Kimberly Dillon

Grantham, Amy L. Ostrom, and John G. Lynch (2018), "Intercultural Competence and Customer Facial Recognition," *Journal of Services Marketing*, 32 (5), 570-80.

Kapner, Suzanne (2017), "Retailers' Emails Are Misfires for Many Holiday Shoppers," *Wall Street Journal*, https://www.wsj.com/articles/retailers-emails-are-misfires-for-many-holiday-shoppers-1511778600.

Maslach, Christina., Joy Stapp, and Richard T. Santee (1985), "Individuation: Conceptual Analysis and Assessment," *Journal of Personality and Social Psychology*, 49 (3), 729-38.

Oyserman, Daphna (2009),"Identity-Based Motivation: Implications for Action-Readiness, Procedural-Readiness, and Consumer Behavior," *Journal of Consumer Psychology*, 19 (3), 250-60.

Rank-Christman, Tracy, Maureen Morrin, and Christine Ringler (2017), "R-E-S-P-E-C-T Find Out What my Name Means to Me: The Effects of Marketplace Misidentification on Consumption," *Journal of Consumer Psychology,* 27 (3), 333-40.

Rosenberg, Morris, and B. Claire McCullough (1981), "Mattering: Inferred Significance and Mental Health Among Adolescents," *Research in Community and Mental Health*, 2, 163-82.

Safdar, Khadeeja (2019), "Nike's Strategy to Get a Lot More Personal with Its Customers," *Wall Street Journal,* https://www.wsj.com/articles/nikes-strategy-to-get-a-lot-more-personal-with-its-customers-11557799501.

Spears, Russell, and Martin Lea (1994) "Panacea or Panopticon? The Hidden Power in Computer-mediated Communication," *Communication Research,* 21, (4), 427-59.

Xu, Alison J, and Aparna A. Labroo (2014), "Incandescent Affect: Turning on the Hot Emotional System with Bright Light," *Journal of Consumer Psychology*, 24(2), 207-16.

Zhong, Chen-Bo, Vanessa K. Bohns, and Francesca Gino (2010), "Good Lamps are the Best Police: Darkness Increases Dishonesty and Self-Interested Behavior," *Psychological Science*, 21(3), 311-14.

When Wanting Closure Reduces Patients' Patience

Annabelle Roberts, University of Chicago, USA
Ayelet Fishbach, University of Chicago, USA

EXTENDED ABSTRACT

In the consumption of healthcare, waiting is ubiquitous. Patients need to wait for an available appointment, wait until the doctor is ready to see them at the appointment, and wait until a treatment is ready to be administered. Despite the frequency of its occurrence, waiting is an unpleasant experience. According to surveys, one in five patients have switched doctors because of long wait times and 30% of patients have left a doctor appointment before receiving any care due to a long wait (Mattio 2018). Thus, patients' experiences while waiting influence their consumption of medical care. It affects their medical decision-making and evaluations of the care they receive.

What makes the experience of waiting for medical care so unpleasant? We hypothesize patients are impatient because they are tempted to reach closure quickly and put the medical procedure out of mind. This is because completing a goal is a gain and leaving a goal unresolved is a cost. Specifically, finishing the goal is a gain because it is a source of satisfaction. People are eager to finish their goals and this eagerness to achieve a goal increases when people get closer to goal attainment (Hull 1934; Kivetz, Urminsky, and Zheng 2006; Koo and Fishbach 2012). Further, not finishing a task can be costly because people either cannot get the unresolved goal off of their mind (Zeigarnik 1927) or actively invest effort in trying to remember to complete the goal.

We thus predict that one reason why patients are impatient is because they desire closure on their medical goals. Specifically, people are willing to endure worse health care more when it enables them to achieve goal closure sooner than the better health care (H1). For example, people may be willing to compromise the quality of health care or ease of a procedure if it allows for earlier closure.

Moving beyond intertemporal choice, we further predict that the experience of impatience has consequences for health habits. Whereas patience was traditionally studied within the intertemporal choice paradigm (Ainslie and Haslam 1992; Frederick, Loewenstein, and O'Donoghue 2002), many medical situations that involve patience do not impose a choice between options that differ in their timing and value. For example, people are often simply required to wait for a medical appointment or test results. We define the experience of patience as one's ability to wait without suffering. It stands in contrast to feeling discomfort, agitated, frustrated, and ultimately, impatient, while waiting.

Previous research documented that impatience in intertemporal choice (i.e., high discount rates) is negatively associated with healthy habits (Urminsky and Zauberman 2017). Here we predict that the *experience of impatience* would also be negatively associated with healthy habits (H2). For example, we predict people who experience more impatience in everyday life are less likely to go to the doctor for regular checkups or eat healthy meals instead of opting for fast food.

Finally, based on the notion that eagerness to complete a goal increases when closer to goal attainment we predict people experience more impatience when they are closer to completing a medical appointment (H3). For example, we predict people will have a harder time tolerating wait periods when they expect the appointment to start soon (vs. in a while) or when they are waiting at the end of an appointment (vs. at the beginning). Relatedly, we predict people will experience more impatience when waiting in the exam room than in the reception area, as the exam room is closer to completing the medical appointment.

In what follows, we describe six preregistered studies (N=1,908) that tested these hypotheses.

Study 1

Using an incentive-compatible task, Study 1 tested whether people would prefer a worse healthcare product more when it enables earlier goal closure (H1). Participants chose between two health products, one superior to the other, which would arrive at the same time. The only difference was in the time participants would complete the work to receive them.

This study used a 2 (Timing: inferior product sooner vs. simultaneous) between-participants design. Prolific participants read about a pulse oximeter, which is a medical device that clips onto the finger to read blood oxygen levels and heart rate. The device became popular during the COVID-19 pandemic because having low oxygen levels can be a sign of the disease.

Participants were invited to choose between completing a bonus task for a chance to win a standard pulse oximeter (inferior option) or a premium pulse oximeter (superior option). In order to enter either lottery, participants read they would need to complete a bonus task at a later time. The bonus task for the premium pulse oximeter would occur in two weeks. We manipulated the timing of the bonus task for the standard pulse oximeter. In the inferior-product-sooner condition, participants read they could complete the bonus task for the standard pulse oximeter lottery tomorrow, while in the simultaneous-products condition, participants read they could complete the bonus task for the standard pulse oximeter in two weeks. Importantly, participants learned they would receive the pulse oximeter in three weeks regardless of which lottery they chose to enter. Completing the bonus task sooner would not result in getting the product sooner.

In support of H1, participants were more likely to choose to enter the lottery for the standard pulse oximeter in the inferior-product-sooner condition (26%) than in the simultaneous-products condition (14%), $X^2(1,N=367)=8.21$, $p=.004$.

In this incentive-compatible study, participants preferred to finish work sooner, even if it meant an inferior reward. People valued advancing goal closure more than the additional benefit from receiving a better healthcare device.

Study 2

Study 2 tested whether people prefer a painful treatment more when it allows them to achieve closure sooner (H1).

This study used a 2 (Timing: painful treatment sooner vs. simultaneous treatments) between-participants design. University students read they were leaving for an international trip in one month. Before they leave the doctor recommended boosting their immunity to several infectious diseases that they can only catch while abroad. There were two, equally effective options for boosting their immunity: a painful shot or a painless medication.

Participants read the medication would be available in two weeks. We manipulated the timing of the shot. In the painful-treatment-sooner condition participants read they could come back to the doctor to get a shot tomorrow, while in the simultaneous-treatments condition participants read they could come back to the doctor to get a shot in two weeks.

In support of H1, participants were more likely to choose the painful shot in the shot-sooner condition (68%) than in the shot-simultaneous condition (31%), $X^2(1,N=201)=27.99$, $p<.001$.

Taken together, Studies 1-2 find that the ability to achieve closure on a health goal increases impatience. Specifically, people opt for inferior medical devices (Study 1) and procedures (Study 2) when it enables them to achieve closure sooner.

Study 3

Study 3 tested whether the experience of impatience is negatively associated with healthy habits (H2). We also tested whether high discount rates (i.e., impatient decisions) are negatively associated with healthy habits.

University students completed an impatience scale (Schnitker 2012), healthy habits scale, and discount rate questions. The impatience scale assessed participants' interpersonal impatience, impatience with life hardships, and impatience with daily hassles. The healthy habits scale measured: exercise, healthy eating habits, weight control, sleep, temper, reckless driving, addiction, physical health care, oral health care, and a friend's description of their healthy habits. To measure participants' discount rate, participants imagined choosing between receiving $100 immediately and another amount later (Hardisty, Thompson, Krantz, and Weber 2013). Participants reported how much the future amount would need to be to make it as attractive as receiving $100 immediately. We then used these responses to calculate participants' hyperbolic discount rates.

In support of H2, the impatience index ($M=3.33$, $SD=0.93$) was negatively correlated with the healthy habits index ($M=5.37$, $SD=0.76$; $r=-.227$, $p=.022$). Participants who exhibited more impatience were less likely to engage in regular healthy habits. Additionally, participants' discount rates were negatively correlated with the healthy habits index at six months ($M=6.82$, $SD=11.99$; $r=-.287$, $p=.003$) and one year ($M=12.35$, $SD=29.09$; $r=-.391$, $p<.001$). Importantly, the experience of impatience predicted adherence to healthy habits when controlling for the discount rates ($b=-0.19$, $p=.015$).

These findings suggest that impatience is associated with health behaviors in everyday life. People who both feel more impatient and have a higher discount rate are less likely to engage in regular healthy habits, including going to the doctor for regular check-ups and vaccinations.

Study 4

In Study 4, we assessed whether people become impatient when they are close to completing a medical goal (H3). We predicted that after waiting for 9 minutes, those expecting the total wait to be 10 minutes would be more impatient than those expecting the wait to be 20 minutes.

This study used a 2 (Expected wait: 10 minutes vs. 20 minutes) × 2 (Time of measurement: 3 minutes vs. 9 minutes) mixed design, where the expected wait time was a between-participants factor and time was a within-participants factor. MTurkers read a scenario where they had an appointment at the doctor's office and were waiting until the doctor was ready for the appointment. Participants rated how impatient they would be after 3 minutes and after 9 minutes.

Participants reported they would feel more impatient after waiting for 9 minutes than after waiting for 3 minutes, $F(1,333)=194.05$, $p<.001$, $\eta_p^2=.37$. There was no significant main effect of the Expected wait time ($p=.295$).

In support of H3, we also found a significant Expected wait × Time of measurement interaction, $F(1,333)=19.75$, $p<.001$, $\eta_p^2=.06$. After 3 minutes, participants reported a similar level of impatience, regardless of whether they expected to wait for 10 minutes or 20 minutes, $t(333)=0.19$, $p=.850$. However, after 9 minutes, participants reported more impatient if they expected the wait to take 10 minutes compared to 20 minutes, $t(333)=2.26$, $p=.025$. We summarized these findings in Figure 1.

Study 4 found that the same experience of waiting was worse for patients when they were closer to completing the wait period.

Study 5

In Study 5, we tested H3 by comparing people's impatience when waiting for the doctor to sign a form before receiving a medical checkup versus after receiving a medical checkup. We predicted that participants would be more impatient when waiting after the checkup, when they were closer to completing the appointment.

This study used a 2 (Wait: before vs. after) between-participants design. Prolific participants read that they have been waiting for the doctor to sign a medical form for 30 minutes already. In the wait-before condition, participants read that the nurse practitioner is ready to start the checkup, but the doctor needs to sign the form before the checkup can start. In the wait-after condition, participants instead read that the nurse finished the checkup, but the doctor needs to sign the form before the participant can go home.

In support of H3, participants reported more impatience when waiting after the checkup ($M=5.15$, $SD=1.37$) compared to when waiting before the checkup ($M=5.43$, $SD=1.21$), $t(395)=2.14$, $p=.033$.

In Study 5, participants experienced more impatience when they were closer to finishing a medical goal.

Study 6

When checking into a medical appointment, patients typically expect to first wait in the reception area with other patients and then wait again in the individual exam room. Clinics can choose what portion of the time patients wait in the reception area versus the exam room. What are the implications for patients' patience? Because the exam room is closer to finishing the goal of receiving medical care, we predicted people experience more impatience when waiting in the exam room compared to the reception area (H3).

This study used a 2 (Waiting Area: exam room vs. reception area) between-participants design. Prolific participants read a scenario where they are at the doctor's office for a routine annual check-up, and the nurse has them either sit in the exam room or the reception area until the doctor is ready to see them.

In support of H3, participants felt more impatient when waiting in the exam room ($M=3.98$, $SD=1.39$) compared to the reception area ($M=3.63$, $SD=1.43$), $t(378)=2.49$, $p=.013$.

Participants experienced more impatience when waiting for an appointment to start in the exam room than the reception area. Considering the desire for goal closure can improve the consumption of healthcare, such as by reducing the amount of time spent waiting in the exam room as opposed to the reception area to minimize impatience.

General Discussion

Across six studies, we explored how people's desire for goal closure affects impatience in the domain of health decisions. We find that people choose to receive worse medical devices and procedures in order to achieve goal closure. We also find that the chronic experience of impatience has important consequences for health habits above and beyond discount rates. Finally, when the desire for goal closure increases—as a function of getting closer to goal completion—people experience greater impatience. We propose that considering the desire for goal closure can improve the design of medical waiting periods to minimize impatience.

Whereas impatience was traditionally studied within the intertemporal choice paradigm, many everyday situations involving impatience do not impose a choice between options that differ in timing and value. People are often required to wait, either because they have no alternative or because they already chose the larger-later option in an intertemporal choice. In the present research, we explore patience as both the decision to wait for the larger-later option and the experience of waiting without suffering. To that end, we believe this work exposes a fundamental new dimension to what it means to be patient.

Additionally, our findings reveal a novel cause of impatience. While impatient decisions are often thought to be the result of an individual's ability to resist immediate temptations (Loewenstein 1996; Mischel, Shoda, and Rodriguez 1989), we find many impatient medical decisions are not driven by the appeal of the immediate temptation. Impatience in these contexts is due to an individual's desire to achieve closure on a health goal.

Critically, our findings offer practical implications for the consumption of healthcare. We propose that medical facilities can minimize patients' impatience by reducing the amount of time patients spend waiting in the exam room versus the reception area or having patients complete administrative tasks at the beginning of the appointment when the desire for goal closure is low. Implementing changes to reduce patients' desire for goal closure can improve both their emotional well-being and evaluations of the medical care.

REFERENCES

Ainslie, George and Nick Haslam (1992). "Hyperbolic discounting." In G. Loewenstein & J. Elster (Eds.), Choice over time (pp. 57–92). New York, US: Russell Sage Foundation.

Frederick, Shane, George Loewenstein, and Ted O'Donoghue (2002). "Time discounting and time preference: A critical review." *Journal of Economic Literature*, *40*(2), 351–401.

Hardisty, David J., Katherine F. Thompson, David H. Krantz, and Elke U. Weber (2013). "How to measure time preferences: An experimental comparison of three methods." *Judgment and Decision Making, 8*(3), 236-249.

Hull, Clark L. (1932). "The goal-gradient hypothesis and maze learning." *Psychological Review, 39*, 25–43.

Kivetz, Ran, Oleg Urminsky, and Yuhuang Zheng (2006). "The goal-gradient hypothesis resurrected: Purchase acceleration, illusionary goal progress, and customer retention." *Journal of Marketing Research, 43*(1), 39–58.

Koo, Minjung, and Ayelet Fishbach (2012). "The small-area hypothesis: Effects of progress monitoring on goal adherence." *Journal of Consumer Researc, 39*(3), 493-509.

Loewenstein, George (1996). "Out of control: Visceral influences on behavior." *Organizational Behavior and Human Decision Processes*, *65*(3), 272-292.

Mattio, Rosie (2018, March 22) "9th Annual Vitals Wait Time Report Released." *Business Wire.* Retrieved from: https://www.businesswire.com/news/home/20180322005683/en/9th-Annual-Vitals-Wait-Time-Report-Released

Mischel, Walter, Yuichi Shoda, and Monica I. Rodriguez (1989), "Delay of gratification in children," *Science*, *244*(4907), 933-38.

Schnitker, Sarah A. (2012)"An examination of patience and well-being." *The Journal of Positive Psychology, 7*(4), 263-280.

Urminsky, Oleg and Gal Zauberman (2017). "The health consequences of intertemporal preferences." In *Routledge International Handbook of Self-Control in Health and Well-Being* (pp. 88-99). Routledge.

Zeigarnik, Bulma (1927). "Studies concerning action and affect psychology, III. The retaining of completed and uncompleted actions." *Psychologische Forschung, 9*, 1–85.

Building Brands for the Emerging Bicultural Market: The Appeal of Paradox Brands

Maria A. Rodas, University of Southern California, USA
Deborah Roedder John, University of Minnesota, USA
Carlos J. Torelli, University of Illinois at Urbana-Champaign, USA

EXTENDED ABSTRACT

One of the most important challenges marketers face is how to build and manage brands to respond to demographic changes taking place around the world. One of the most visible changes is the growth of bicultural consumers, who are individuals who have been exposed to and internalized two different cultures, such as Hispanic Americans and Asian Americans. In the U.S. alone, bicultural consumers are 120 million strong, representing more than a third of the population and with $4.1 trillion in buying power. Further, they are the fastest growing segment of the U.S. population, accounting for 92% of the total growth in the U.S. population from 2000 to 2014 (Nielsen 2015).

This opportunity is widely recognized by marketers, as indicated by the increasing media spending to target bicultural consumers, but there is relatively little research that investigates brand building practices that could be particularly successful with these consumers. Most of the research to date in this area has focused on advertising, specifically bilingual advertising (e.g., Kubat and Swaminathan 2015; Luna and Peracchio 2005; Noriega and Blair 2008) and advertising that promotes particular cultural values (Lau-Gesk 2003), or on the shifting responses of these consumers upon assimilation to an accessible cultural frame (Chen, Ng, and Rao 2005; Ng 2010). The vast majority of cultural research compares consumers from different cultural orientations, such as collectivist versus individualistic cultures or cultures with independent versus interdependent self-construals. However, this work focuses on consumers with a single cultural orientation (monocultural), not bicultural consumers.

In this article, we begin an examination of what types of brands are likely to be more successful with bicultural consumers. We focus on how to design brand identities for bicultural consumers, asking the question: Are there certain types of brands that are more appealing to bicultural (vs. monocultural) consumers? We focus on brand identities because they represent the firm's definition of what the brand is and how it is positioned vis à vis other brands, which provides the platform for communicating with consumers and competing in the marketplace (Aaker 1996; John and Torelli 2017; Keller 2013).

We identify a novel type of brand that proves to be particularly appealing to bicultural consumers, which we refer to as paradox brands. Paradox brands have identities that incorporate contradictory meanings, such as opposite brand personalities (e.g., rugged and sophisticated) or brand values (e.g., openness to change and conservation).

We test our predictions in five studies. In study 1, the objective was to demonstrate that bicultural consumers respond more positively to paradox brands than do monocultural consumers. This study was conducted in a field setting, with monocultural participants recruited from a farmers' market in a predominantly White neighborhood of a large U.S. city, whereas bicultural participants were recruited from a vendors' market targeting Latinos in the same city and on the same weekend. Participants took the survey in exchange for a tote bag. We find that bicultural consumers respond more positively to paradox brands than do monocultural consumers 60.6% vs. 45.3%, $\chi^2(1)=5.51$, $p=.02$), and in fact, bicultural consumers choose paradox brands over non-paradox brands ($t(116)=2.36$, $p=.02$).

In study 2, we examine cognitive flexibility as the mechanism responsible for why bicultural consumers respond more positively to paradox brands. To do so, we recruited monocultural (non-Hispanic White Americans) and bicultural (Hispanic Americans) participants and presented them with information about either a paradox or non-paradox brand. We show that cognitive flexibility mediates the effect of culture in response to paradox brands (mediated effect=.17, SE=.11, 95% CI=.02 to .47).

Study 3's objective was to provide further evidence for cognitive flexibility by showing that even monocultural consumers can respond positively to paradox brands if they are primed to be more cognitively flexible. Results revealed that participants in the cognitive flexibility prime condition had more positive evaluations of the paradox brand than participants in the control condition ($M=5.11$ vs. 4.69, $F(1,198)=4.96$, $p=.03$, $\eta_{partial}^2=.02$).

In the last two studies, we examine bicultural consumers in more detail. In study 4, we find that individual differences in cognitive flexibility among bicultural consumers produce different responses to paradox brands (mean indirect effect=.25, SE=.11, 95% C.I.=.05 to .47). Specifically, bicultural consumers with greater cognitive flexibility (+1SD) respond more positively to paradox brands (indirect effect=.42, SE=.12, 95% C.I.=.19 to .67) than bicultural consumers with lower cognitive flexibility (-1SD, ns). This result provides further evidence for cognitive flexibility as the process underlying cultural differences and rules out the possibility that the cultural differences we observe in our prior studies could be attributed to other differences between these groups. That is, differing levels of cognitive flexibility among bicultural consumers produce the same pattern of response to paradox brands as do differing levels of cognitive flexibility between bicultural versus monocultural consumers.

In study 5, we examine differences among bicultural consumers of particular importance to marketers. Specifically, we study subgroups of bicultural consumers based on acculturation strategy, either integrated (cultural backgrounds are integrated) or separated (cultural backgrounds remain separated). We find that bicultural consumers who are integrated, and possess greater cognitive flexibility (Tadmor and Tetlock 2006), respond more positively to paradox brands than bicultural consumers who are separated, and possess less cognitive flexibility ($M=6.17$ vs. 5.23, respectively, $p=.002$). This result contributes to our findings regarding the role of cognitive flexibility, and also underscores the important insight that bicultural consumers are not all alike with regard to their response to brands.

Our findings make contributions to theory and practice. First, we show the importance of understanding bicultural consumers to develop brands that have special appeal to this growing segment. Second, our findings provide guidance for several dilemmas that marketers face in building brands for the bicultural market. One dilemma is that the bicultural market is not homogeneous, including subgroups with different cultural mixes, such as Hispanic Americans and Asian Americans. A second dilemma is how to tweak an existing brand identity, which has been developed for the general consumer market, to resonate more with bicultural consumers. Finally, we also contribute to multicultural research by showing how contradiction impacts the attitudes of bicultural consumers.

REFERENCES

Aaker, David A. (1996), "Measuring Brand Equity across Products and Markets," *California Management Review*, 38 (3), 102-20.

Ahluwalia, Rohini (2008), "How Far Can a Brand Stretch? Understanding the Role of Self-Construal," *Journal of Marketing Research*, 45 (3), 337-50.

Aytug, Zeynep G., Tuvana Rua, Deborah V. Brazeal, Jeanne A. Almaraz, and Carlos B. González (2018), "A Socio-Cultural Approach to Multicultural Experience: Why Interactions Matter for Creative Thinking but Exposures Don't," *International Journal of Intercultural Relations*, 64 (May), 29-42.

Babin, Laurie A. and Alvin C. Burns (1997), "Effects of Print Ad Pictures and Copy Containing Instructions to Imagine on Mental Imagery That Mediates Attitudes," *Journal of Advertising*, 26 (3), 33-44.

Cayton, Andrew R. L., Richard Sisson, and Chris Zacher (2006), *The American Midwest: An Interpretive Encyclopedia*, Bloomington, IN: Indiana University Press.

Chen, Haipeng, Sharon Ng, and Akshay R Rao (2005), "Cultural Differences in Consumer Impatience," *Journal of Marketing Research*, 42 (3), 291-301.

Jhang, Ji Hoon, Susan Jung Grant, and Margaret C. Campbell (2012), "Get It? Got It. Good! Enhancing New Product Acceptance by Facilitating Resolution of Extreme Incongruity," *Journal of Marketing Research*, 49 (2), 247-59.

John, Deborah Roedder and Carlos J. Torelli (2017), *Strategic Brand Management: Lessons for Winning Brands in Globalized Markets*, New York, NY: Oxford University Press.

Keller, Kevin L. (2013), *Strategic Brand Management: Global Edition*: Pearson Higher Education.

Kubat, Umut and Vanitha Swaminathan (2015), "Crossing the Cultural Divide through Bilingual Advertising: The Moderating Role of Brand Cultural Symbolism," *International Journal of Research in Marketing*, 32 (4), 354-62.

Lau-Gesk, Loraine G. (2003), "Activating Culture through Persuasion Appeals: An Examination of the Bicultural Consumer," *Journal of Consumer Psychology*, 13 (3), 301-15.

Luna, David and Laura A. Peracchio (2005), "Advertising to Bilingual Consumers: The Impact of Code-Switching on Persuasion," *Journal of Consumer Research*, 31 (4), 760-65.

Maddux, William W., Hajo Adam, and Adam D. Galinsky (2010), "When in Rome... Learn Why the Romans Do What They Do: How Multicultural Learning Experiences Facilitate Creativity," *Personality and Social Psychology Bulletin*, 36 (6), 731-41.

Maio, Gregory R., Ali Pakizeh, Wing-Yee Cheung, and Kerry J. Rees (2009), "Changing, Priming, and Acting on Values: Effects Via Motivational Relations in a Circular Model," *Journal of Personality and Social Psychology*, 97 (4), 699-715.

Martin, Matthew M. and Rebecca B. Rubin (1995), "A New Measure of Cognitive Flexibility," *Psychological Reports*, 76 (2), 623-26.

Mick, David Glen and Susan Fournier (1998), "Paradoxes of Technology: Consumer Cognizance, Emotions, and Coping Strategies," *Journal of Consumer Research*, 25 (2), 123-43.

Monga, Alokparna Basu and Deborah Roedder John (2007), "Cultural Differences in Brand Extension Evaluation: The Influence of Analytic Versus Holistic Thinking," *Journal of Consumer Research*, 33 (4), 529-36.

Murray, Noel, Harish Sujan, Edward R. Hirt, and Mita Sujan (1990), "The Influence of Mood on Categorization: A Cognitive Flexibility Interpretation," *Journal of Personality and Social Psychology*, 59 (3), 411-25.

Ng, Sharon (2010), "Cultural Orientation and Brand Dilution: Impact of Motivation Level and Extension Typicality," *Journal of Marketing Research*, 47 (1), 186-98.

Nielsen (2015), "The Multicultural Edge: Rising Super Consumers," http://www.nielsencommunity.com/report_files/the-multicultural-edge-rising-super-consumers-march-2015.pdf.

Noriega, Jaime and Edward Blair (2008), "Advertising to Bilinguals: Does the Language of Advertising Influence the Nature of Thoughts?," *Journal of Marketing*, 72 (5), 69-83.

Reeves, Rosser (1961), *Reality in Advertising*, New York: Alfred A Knopf.

Tadmor, Carmit T. and Philip E. Tetlock (2006), "Biculturalism: A Model of the Effects of Second-Culture Exposure on Acculturation and Integrative Complexity," *Journal of Cross-Cultural Psychology*, 37 (2), 173-90.

Tadmor, Carmit T., Adam D. Galinsky, and William W. Maddux (2012), "Getting the Most out of Living Abroad: Biculturalism and Integrative Complexity as Key Drivers of Creative and Professional Success," *Journal of Personality and Social Psychology*, 103 (3), 520-42.

Tadmor, Carmit T., Philip E. Tetlock, and Kaiping Peng (2009), "Acculturation Strategies and Integrative Complexity: The Cognitive Implications of Biculturalism," *Journal of Cross-Cultural Psychology*, 40 (1), 105-39.

Torelli, Carlos J., Aysegül Özsomer, Sergio W. Carvalho, Hean Tat Keh, and Natalia Maehle (2012), "Brand Concepts as Representations of Human Values: Do Cultural Congruity and Compatibility between Values Matter?," *Journal of Marketing*, 76 (4), 92-108.

Trout, Jack and Al Ries (1986), *Positioning: The Battle for Your Mind*: McGraw-Hill.

Ward, Colleen and Antony Kennedy (1994), "Acculturation Strategies, Psychological Adjustment, and Sociocultural Competence During Cross-Cultural Transitions," *International Journal of Intercultural Relations*, 18 (3), 329-43.

Understanding Obese Patients' Engagement by Their Empowerment Level: The Case of Bariatric Surgery

Angélique Rodhain, Université de Montpellier, France
Andréa Gourmelen, Université de Montpellier, France

EXTENDED ABSTRACT

Called 'one of the greatest public health challenges of the 21st century' (World Health Organisation – Europe), obesity has nearly tripled since 1975[1]. This fact is particularly alarming since, in addition to the direct deaths it implies, obesity is also a major risk factor for many other diseases such as diabetes. Since obesity is difficult to overcome, bariatric surgery is then presented as a solution for patients. It aims at reducing drastically the patient's ingestion capacity by reducing the stomach size (*sleeve*) or by short-circuiting a part of the stomach and of the small intestine (*by-pass*). Nevertheless, even if bariatric surgery is almost systematically efficient in the short-run, its success in the long-run is far from being satisfactory, and it relies heavily on the patient's engagement which is mainly based on regular physical activities, a suited diet and regular medical monitoring.

Thanks to life narratives of 14 patients (more than 36 hours of recording, 420 single-spaced pages) who are about to get a bariatric surgery, this study aims at offering a patient-centered perspective on their own engagement and empowerment. A bulk of research on public health deals with patient empowerment. Schneider-Kamp and Askegaard (2019) have emphasized four dimensions of patient empowerment: participation, control, education and autonomy. Even if a consensus on the definition of this concept is still needed, since it is defined as a process, a state or some behaviors (Fumagalli et al., 2015) and according to the sense of the process (top-down or bottom-up) (Fayn et al., 2019), we understand patient empowerment here as "a process which help patients reject their passivity in their health behavior and assume their responsibility in their own care process" (Ben Ayed and El Aoud, 2016, p.9). The case of bariatric surgery is theoretically interesting in the consumer behavior field since it can be either imposed by the surgeon for medical reasons or chosen by the patient for personal reasons but, whatever the case, the patient has to prove his/her engagement in a suited physical activity and diet for the surgery to be accepted by the medical team. Therefore, the link between patient's empowerment and engagement remains to be deepened (Cases, 2017), and particularly in this case of bariatric surgery.

By crossing engagement and empowerment levels, 4 profiles arise:

(1) the group of "*watchers*" is composed by 7 people who are rather passive in the medical protocol and low in engagement. For example, Stéphane underwent the mandatory protocol to have surgery without seeking any information: he started and continues the process following a succession of advices from his general practitioner. He doesn't realize how his diet will have to change in the future. He claims that he has already changed, but still describing fairly limited modifications, or procrastinates. For the "*watchers*", the doctors bring the solution to their problem in a somewhat miraculous way. Most of them having never been sportspeople, they don't seem ready to start any physical activity afterwards. They know they are supposed to be involved, but their discourse show that they hope bariatric surgery should change their lives without their participation.

(2) The "*contributors*" (4 women – high engagement – high empowerment) are strongly engaged in the medical protocol, have implemented changes in their current behavior, and think about other changes in their daily life after surgery. For example, Tania, who chose to consult a psychologist, an endocrinologist and a nutritionist for many years, has internalized the reasons for her weight gain. She understood that it was time to take care of herself by adapting her diet and starting physical activity. The "*contributors*" engage in a win-win relationship: the medical staff give them a boost, but it's up to them to be active for a long-term weight loss;

(3) the (small) group of "*repentants*" (2 people – high engagement / low empowerment) doesn't seek to emancipate themselves from the medical profession. They follow the protocol and opt for the surgeon and the doctors they have been advised. They differ from "*the watchers*" in the sense that their respect for the medical staff lead them to internalize their discourse. They started the bariatric surgery process because they operated a reflexivity leading to an understanding of their weight gain responsibility. For example, even if Pierre initiated the first discussion with his general practitioner about the operation, he then followed all his recommendations. Particularly attentive to the specialists he met, he has integrated the mistakes he made, wishing to readjust himself. He really becomes aware of the need to change his whole way of life;

(4) finally, the (very small) group of "*cheaters*" (1 woman – high empowerment / low engagement) uses information learned on social networks to set up strategies to get around the rules. Only one patient out of the 14 we met confesses to be in this case. Thus, Karine explains that she followed up to 150 virtual accounts in social media in order to learn the "tricks" to get the "green light" for surgery: "*There is…What we should tell the psychologist?*". In terms of engagement, she says: "*I know that I eat too much, I know it, too much junk food*" without talking about any actual or planned changes. In addition, she understood the paradoxical injunctions given to patients: to pretend that one is in the process of losing weight, but to have a high BMI at the appointment. Thus, the strategy is to gain weight just before the first appointment, to show 2-3 months later that one has been able to lose few pounds (by pretending to change one's behavior, but without doing so): it is therefore a matter of integrating the rules to turn them to one's personal advantage.

To sum up, the majority of interviewees showing strong empowerment also shows high engagement. This taxonomy could serve as a first basis for the health care staff during appointments throughout the process, to personalize the doctor-patient relationship as much as possible, and for public policies to better inform about the consequences of such a surgery in terms of engagement.

REFERENCES

Ben, Ayed M. and El Aoud, N. (2016), "L'empowerment du consommateur/patient : adaptation et validation d'une échelle de mesure*", Revue Française du Marketing,* 258 (4), 7-28.

Cases, Anne-Sophie (2017), "L'e-santé : empowement du patient connecté*", Journal de Gestion et d'Economie* Médicales, 35 (4), 1-22.

Fayn, M.G., des Garets, V. and Rivière, A. (2019), "Mieux comprendre l'*empowerment* du consommateur. Classification conceptuelle et enrichissement théorique*", Revue Française de Gestion,* 278 (1), 121-145.

Fumagalli, LP, Radaelli, G. and Lettieri, E. *et al.* (2015), "Patient Empowerment and its neighbours: clarifying the boundaries and their mutual relationships*", Heath Policy*, 119 (3), 384-394.

Schneider-Kamp, A. and Askegaard, S. (2019), "Putting Patients into the Centre: Patient Empowerment in Everyday Health Practices*", Health: An Interdisciplinary Journal of Social Study of Health, Illness and Medicine,* https://doi.org/10.1177/1363459319831343

The Moral Foundations of Pro-Guns' Digital Proselytism in Brazil

Benjamin Rosenthal, FGV-SP, Brazil
Massimo Airoldi, EM Lyon Business School, France

EXTENDED ABSTRACT

"Today I will recommend two models of guns for home protection… following the new guns decree of president Bolsonaro, which aims to guarantee everyone's right to have firearms for self-protection… since in Brazil there is this bullshit of restricted calibers I will attain to the allowed guns… a caliber 12 semiautomatic shotgun and a semiautomatic pistol, which would be my choice too, but I prefer a weapon of manual recharge, a pump-action shotgun, and I will chose a caliber 38 revolver, just to make this video different than the other one…"

This is part of a video of a Brazilian YouTuber, a social media influencer (SMI) who owns a YouTube channel that is dedicated to guns. The video is a review of two gun models for home protection, recorded at a shooting club. Besides technical elements (e.g., usability in the context of a home invasion), the video also contains critics towards the restricted laws imposed by the Brazilian State, impeding Brazilians to have access to guns or limiting the type of caliber that can be used. There are more than 200 comments, the most common being praises of the moral correctness of an armed man, and expressions of frustration with the Brazilian State and anger with the opponents of the liberation of guns in Brazil.

Outside of Brazil, the main reason for purchasing a gun is usually self-defense, as it is in the USA (Stroebe, Leander, and Kruglanski 2017), followed by sports practice, hunting and collecting (Shapira and Simon 2018). The desire to own and carry guns due to the perception of having one's life at risk (Shapira and Simon 2018) is not contextually independent (Carlson 2014). The sociocultural context that embeds this self-protection motivation and these gun-related social practices is identity-related (Carlson 2015), ideological (McLean 2018), anchored in cultural myths (Barnhart and Huff 2018), and embedded in cultures with a distinctive experience of violence and crime (Carlson 2014).

Nowadays, public discussions about guns happen both online and offline, as social media platforms became mass media tools in which discursive actions take place and ideas and meanings are constructed by online collectives (Airoldi 2018; Bonilla and Rosa 2015), albeit with a concentration of the audience in a small percentage of the content producers (Arthurs, Drakopoulou, and Gandini 2018). Content in social media is discussed organically through the interests and opinions of individuals who collectively construct narratives and group identities (Bonilla and Rosa 2015). Although the importance of social media for the formation of public opinion has been extensively investigated (Barisione, Michailidou, and Airoldi 2019; Papacharissi 2015), there are few studies addressing the ways people are socialized towards guns, specifically in social media platforms.

The objective of this research is to map how pro-gun SMIs and their publics on YouTube collectively justify the right to own guns, fostering values and attitudes, in a market which, still, has rigid controls for purchasing guns (Brazil). We rely on Boltanski and Thevenot's (2006) framework of logics of justification to demonstrate that these right-wing SMIs are calling for the necessity and the right to posses guns based mostly on the logics and discourses of the Civic and the Domestic World (Boltanski and Thevenot 2006).

According to Boltanski and Thevenot (2006), individuals justify their position-takings in social interactions by situationally relying on a plurality of "orders of worth" – i.e. the *civic*, *domestic*, *market*, *industrial*, *inspired* and *fame worlds*, which consist of discourses that social actors use to position themselves in disputes. For instance, social actors can refer to the *civic world* when they argue for the benefit of the public common good. Social actors may also refer to multiple worlds, as their arguments center on more instances, such as the *domestic* and the *civic world*, prioritizing some of these worlds over the others. Briefly, the *domestic world* is associated with the family, and is based on tradition and hierarchy, commanded by firm and upbringing individuals who champion customs and conventions, honor and respect, and combat disorder; the *civic world* is based on the collective interest, and the worthy are narrated as those who act on the behalf of the community, fighting for fair common causes.

Aiming to explore and compare the justificatory discourses of guns-related SMIs and their platform-based audiences, this research combines the ethnographic content analysis (Altheide 1987) of YouTube videos shared by a sample of 33 Brazilian SMIs and the automated text analysis (Humphreys and Wang 2018) of about 10k user-generated comments to these videos. Thanks to Brazilian social media listening company Vert, metadata about all the videos published by these 33 SMIs (n=1,687) were collected.

Our preliminary findings indicate that there is a strong moral base in guns' proselytism in Brazil among SMIs and their publics. In the domain of the Civic World (Boltanski and Thevenot 2006), this moral is based on the defense of the individual freedom and the strong criticism of state intervention on personal matters. These moral justifications are accompanied by the use of evidences such as statistics and anecdotal logics to argument that, indeed, guns do increase safeness, which is illustrated by phrases continuously repeated in many YouTube channels such as "bandits never invade a gun store or a favela, because they know that the citizens there are heavily armed." SMIs also engage in criticisms of the out-group - the anti-gun advocates, usually portrayed as unreasonable left-wing individuals or as "specialists", a word charged with jocosity.

The moral base of the guns' proselytism also involves what Boltanski and Thevenot (2006) denominated the Domestic World. SMIs and their publics defend the principles of the right to use guns for self-defense, to protect their families, to be prepared for situations of confrontation in a context of urban and country violence, which can be associated with conservative values such as having the moral strength to stand up against external evils and protect one's family, which is the base of what Lakoff (2016) named *strict father morality*. These moral justifications also support the expression of a collective identity. SMIs and their audiences are portraying themselves as "citizen protectors" (Carlson 2014) and as champions of freedom, individuals who have the moral responsibility to protect the value of liberty, which can not be taken away by the State. Collectively, they are using justifications present in the Civic World, establishing their principles and modes of judgment, separating the worthy from the unworthy, and promoting themselves as champions of the human dignity.

The Market and the Industrial World seem to be used as secondary justifications. The monopoly and the quality of guns in Brazil are minor problems given the main questions being discussed by SMIs and their audiences.

In short, this research shows that the Brazilian sociocultural context of urban violence (anchored on perceptions of how concrete daily life is), and the liberal moral values of personal freedom and

less state interventionism are used by these SMIs and their publics to promote a gun culture in a country in which the majority of the population support rigid laws restricting the liberation of guns for the population (Datafolha 2019).

REFERENCES

Airoldi, Massimo (2018), "Ethnography and the digital fields of social media," *International Journal of Social Research Methodology*, 21 (6), 661-73.

Airoldi, Massimo (2019), "Digital traces of taste: methodological pathways for consumer research," *Consumption Markets & Culture*, 1-21.

Altheide, David L. (1987), "Reflections: Ethnographic content analysis," *Qualitative Sociology*, 10 (1), 65-77.

Arthurs, Jane, Sophia Drakopoulou, and Alessandro Gandini (2018), "Researching YouTube," *Convergence: The International Journal of Research into New Media Technologies*, 24 (1), 3-15.

Barisione, Mauro, Asimina Michailidou, and Massimo Airoldi (2019), "Understanding a digital movement of opinion: the case of# RefugeesWelcome," *Information, Communication & Society*, 22 (8), 1145-64.

Barnhart, Michelle and Aimee Dinnin Huff (2018), "Negotiating the Legitimacy of an American Icon: Myth and the U.S. Gun Market," in *NA – Advances in Consumer Research Volume 46*, ed. Andrew Gershoff, Robert Kozinets, and Tiffany White, Duluth, MN: Association for Consumer Research.

Boltanski, Luc, and Laurent Thévenot (2006), *On justification: Economies of Worth,* New Jersey: Princeton University Press.

Bonilla, Yarimar, and Jonathan Rosa (2015), "# Ferguson: Digital protest, hashtag ethnography, and the racial politics of social media in the United States," *American Ethnologist*, 42 (1), 4-17.

Carlson, Jennifer D (2014), "States, subjects and sovereign power: Lessons from global gun cultures," *Theoretical Criminology* 18 (3), 335-53.

Carlson, Jennifer (2015), "Mourning Mayberry: Guns, masculinity, and socioeconomic decline," *Gender & Society*, 29 (3), 386-409.

Datafolha (2019), "Posse e Porte de Armas," Datafolha, July 12. available at: http://datafolha.folha.uol.com.br/opiniaopublica/2019/07/1988232-66-sao-contra-posse-de-armas.shtml

Humphreys, Ashlee, and Rebecca Jen-Hui Wang (2018), "Automated text analysis for consumer research," *Journal of Consumer Research*, 44 (6), 1274-306.

Lakoff, George (2016), *Moral Politics: How Liberals and Conservatives Think.* Chicago: University of Chicago Press.

McLean, Dylan S (2018), "Gun talk online: Canadian tools, American values," Social Science Quarterly, 99 (3), 977-92.

Papacharissi, Zizi (2015), *Affective publics: Sentiment, technology, and politics*, New York, NY: Oxford University Press.

Shapira, Harel, and Samantha J. Simon (2018), "Learning to need a gun," *Qualitative Sociology*, 41 (1), 1-20.

Stroebe, Wolfgang, N. Pontus Leander, and Arie W. Kruglanski (2017), "Is it a dangerous world out there? The motivational bases of American gun ownership," *Personality and Social Psychology Bulletin*, 43 (8), 1071-85.

The Silver Lining of Sadness: How Sadness Promotes Subjective Well-being

Jeff D. Rotman, Deakin University, Australia
Andrew W. Perkins, Washington State University, USA

EXTENDED ABSTRACT

Research in marketing has focused on how sadness motivates mood-regulation, especially through greater self-focused and hedonic consumption (Cryder et al. 2008; Garg and Lerner 2013; Garg et al. 2007; Lerner et al. 2004; Andrade 2005; Andrade and Cohen 2007). The extant research in marketing has all but unanimously argued that sadness motivates individuals to seek out more pleasurable, hedonic, indulgent, or comforting consumption in order to alleviate their feelings of sadness. However, drawing from a functional perspective, we suggest that sadness serves a social function as a signal meant to evoke compassion and helping behavior from others (Hasson 2009). Building from this, we expect consumers made to feel sadness should desire affiliation. Consumers seeking to affiliate make choices to facilitate this connection (e.g. buy gifts for others). Subsequently, as social acts, can also lead to a sense of well-being to the giver (e.g. people who perform kind and generous acts report elevated well-being (Dunn et al. 2008; Pressman et al. 2015), we anticipate this affiliative behavior to result in improved well-being. Importantly, the current research examines the conflicting hypotheses of an increased DTA (suggested in this research) and an increased desire for self-focused hedonic mood-regulation consumption. Across the experiments participants are given both the opportunity for self-focused consumption (consistent with prior literature) and other-focused consumption, which should be tied to greater affiliation.

Study 1

We explore the effect of consuming sadness in an ecologically valid setting (a movie theatre) with a behavioral outcome. We rented a movie theater and a total of 170 participants were randomly assigned to watch one of four (2 sad and 2 control), twenty-two minute television episodes.

Participants then completed the PANAS (Watson et al. 1988) and then a chocolate assortment task (adapted from Rucker et al. 2012) that required each participant to decide how many chocolates they would give to other individuals versus keep for themselves. Finally, participants completed a measure of subjective well-being (Diener et al. 2010; α=.88), and a series of covariates (None of the covariates impacted the results).

Participants in the sad condition took fewer chocolates for themselves ($M_{self=}$4.22) and gave more chocolates to others ($M_{others=}$15.41) than those in the control condition ($M_{self=}$6.78, $p<$ .01; $M_{others=}$13.09, $p<$ .01). We examined the indirect effect of number of chocolates selected on the relationship between condition and well-being using mediation. The results revealed that participants in the sad (vs. control) condition reported increased well-being as a function of selecting chocolates for others (β=.08, CI=[.01, .18]). Negative mood did not affect the results.

Study 2

197 participants were recruited from MTurk (following attention check). Participants were randomly assigned to watch a single video clip in either the *sad* or *control* conditions.

Participants completed a five-item *DTA* scale (Park and Maner 2009; α=.92) and a measure of self, versus other-focused activities (self-focused, e.g., "buy a gift for yourself", α= .83; other-focused, e.g., "buy a gift for a close friend", α= .88). Other-focused was divided by self-focused scores and we used the quotient as a proxy

for each participant's *other-oriented consumption* (OOC). Mood was measured utilizing BMIS (Brief Mood Introspection Scale or BMIS; Mayer and Gaschke 1988).

Respondents in the *sad* condition reported higher scores on both *DTA* (M=4.43) and *other-oriented-consumption* (M=1.46) than respondents in the *control* condition (M=4.00 and M=1.05, respectively, *p*'s<.01). This pattern of results persists even after controlling for negative *mood*, as well as *fear*, *anger*, *disgust* and *joy*. Next, we examined the indirect effects of the sadness manipulation on other-oriented consumption through DTA and found significant mediation. (β= .06, CI=[.01, .13]).

Study 3

MTurk participants (*n*=185, after attention check) completed the study, Replicating the method from study 2, we also measured trait (Davis, 1983) and state empathy (Escalas, 2003),

Participants in the sad condition reported significantly higher DTA ($M_{DTA=}$3.87,) and other-oriented consumption (M_{OOC}=1.28) compared to those in the control condition (M_{DTA}=3.20, p< .01; M_{OOC}= 1.05, p<.01). The indirect effect of DTA demonstrated significant mediation (β=.10, CI=[.03, .19]. All results remain consistent when controlling for the trait-level empathy constructs, felt empathy, as well as fear, anger, disgust and joy.

Study 4

Participants (n=229 after the attention check) were recruited via Amazon's Mechanical Turk. Participants were randomly assigned to recall one of a self-selected autobiographical event that was associated primarily with feelings of sadness, anger, fear or disgust, or a control (an event that happened this week). Next participants completed the BMIS and the same DTA and self-vs-other consumption scale.

The sadness condition resulted in the highest DTA (*M*=4.60) and other-oriented consumption (*M*=1.18), which were significantly higher than all other conditions. Next, we examined the mediational relationship between sadness, DTA, and other-oriented consumption. Four separate mediations with sadness, compared to each one of the other conditions, revealed significant mediations as well as when the four control conditions were collapsed. Controlling for negative mood did not affect the results.

Study 5

We test the mediational relationship between feelings of sadness and well-being, expecting that DTA leads to other-oriented consumption, which then leads to well-being. Study 5 used the same single factor (*Movie: sad versus control*) between-subjects design as studies 2 and 3. A total of 227 participants were recruited from Mechanical Turk, (185 after failing the attention check). The measures used to assess DTA and other-oriented consumption and well-being are the same. Mood was assessed using the BMIS scale.

Participants' DTA ($M_{control=}$3.86 vs. $M_{sadness=}$4.31, *p*<. 05) and other-oriented consumption ($M_{control=}$1.13 vs. $M_{sadness=}$1.47, *p*<. 05) were both higher in the sadness condition. Next, we examined the serial mediating effect of sadness on well-being through DTA and other-oriented consumption. Participants in the sad condition report a greater DTA with others, and subsequent other-oriented consumption and heightened well-being (β= .02, CI= .00, .05). Controlling for negative mood, fear, anger and disgust did not affect the results.

REFERENCES

Andrade, Eduardo B (2005), "Behavioral consequences of affect: Combining evaluative and regulatory mechanisms," *Journal of Consumer Research*, 32 (3), 355-62.

Andrade, Eduardo B and Joel B Cohen (2007), "On the consumption of negative feelings," *Journal of Consumer Research*, 34 (3), 283-300.

Cryder, Cynthia E, Jennifer S Lerner, James J Gross, and Ronald E Dahl (2008), "Misery Is Not Miserly: Sad and Self-Focused Individuals Spend More," *Psychological Science*, 19 (6), 525-30.

Dunn, Lea and JoAndrea Hoegg (2014), "The impact of fear on emotional brand attachment," *Journal of Consumer Research*, 41 (1), 152-68.

Garg, Nitika and Jennifer S Lerner (2013), "Sadness and Consumption," *Journal of Consumer Psychology*, 23 (1), 106-13.

Hasson, Oren (2009), "Emotional tears as biological signals," *Evolutionary Psychology*, 7 (3). Lerner, Jennifer S, Deborah A Small, and George Loewenstein (2004), "Heart strings and purse strings: Carryover effects of emotions on economic decisions," *Psychological science*, 15 (5), 337-41.

Pressman, Sarah D, Tara L Kraft, and Marie P Cross (2015), "It's good to do good and receive good: The impact of a 'pay it forward'style kindness intervention on giver and receiver well-being," *The Journal of Positive Psychology*, 10 (4), 293-302.

Theorizing Relational Work in the Collaborative Economy:
An Application to Peer-To-Peer Renting

Dominique Roux, Université de Reims Champagne-Ardenne, France
Russ Belk, York University, Canada

EXTENDED ABSTRACT

Why, to whom and how do people rent out their possessions? Previous research explains why people prefer renting rather than owning (Durgee and O'Connor 1995; Moeller and Wittkowski 2010) and how peer-to-peer rental systems organize balanced short-term exchanges between strangers (Ikkala and Lampinen 2015; Philip, Ozanne, and Ballantine 2015; von Richthofen and Fischer 2019). Considered as 'pseudo-sharing' (Belk 2014), renting illustrates a growing tendency toward commodification whereby individuals marketize personal assets, including private goods/spaces (Belk 2020; Eckhardt and Bardhi 2016; Harvey 2007). Previous literature highlights the crucial role of platforms in "hybridizing" conflicting institutional logics between commerce and hospitality (Scaraboto 2015; von Richthofen and Fischer 2019)) and fostering 'market empathization' (Giesler, Veresiu, and Siebert 2015). In addition, extant literature on liquid relationships to possessions (Bardhi and Eckhardt 2017; Bardhi, Eckhardt, and Arnould 2012) argues that access-based modes of consumption fuel a new culture of circulation (Aronczyk and Craig 2012; Bardhi and Eckhardt 2012), which helps both renters to avoid unnecessary purchases and owners to make extra money from the temporary disposition of their personal possessions (Horton and Zeckhauser 2016). However, previous studies on renting present three gaps that our research intends to fill. First, they mostly concentrate on users and thus fail to examine how owners become renters, when and why (Belk, Bardhi, and Eckhardt 2019; Philip et al. 2015). Second, they pay little attention to what is rented, and in particular to the relationships owners have with their possessions before, during and after rental. Third, because they concentrate on short-term rental with Airbnb as a favorite focus of study (Ikkala and Lampinen 2015; von Richthofen and Fischer 2019), they also limit our understanding of rental activity as a whole. In short, examining "networked hospitality businesses" only (Oskam and Boswijk 2016) prevents us from understanding other contexts such as managing long term rentals or providing neighbors with everyday items.

Our approach to renting draws on Zelizer's (2010, 2012) contribution on relationality, i.e., the way social relationships shape economic lives (Zelizer 1985, 1995, 2005). Rather than considering sociality as an extra touch of soul brought into economic activities, we contend that distinctive social ties with renters result in specific economic transactions, meanings and media of exchange, what Zelizer (2012) terms "relational packages." We theorize renting as a set of "relational packages." In addition, we extend Zelizer's (2012) approach to objects. In particular, we consider the attachment and social bonds owners have with their possessions as the cornerstone of "relational packages." Through 'relational work', including the emotional labor (Hochschild 1983) that owners undertake both with relinquishing their items and with renters, we examine how various forms of economic exchange are articulated with specific moral valuation, meanings, communication channels and currencies that typify particular object-person and person-person-relationships (Zelizer 2012). With renting as a relevant but overlooked practice in the field of collaborative consumption (Albinsson and Perera 2018), we raise three research questions: How do possession-owner relationships result in assessing the rent-ability of private objects/spaces? Once a possession is deemed rent-able, what conditions make objects/spaces enter into an economic relation with others? And what are the appro-
priate means of exchange, associated meanings and social ties that owners develop with people whom they distinctively term tenants, guests or simply neighbors?

To answer these questions, we conducted a 3-year qualitative study with 43 French informants who rent dwelling, cars and other objects. Informants were sequentially recruited through social networks using a "snowballing" technique. The interviews were mostly conducted in homes where pictures and videos were taken with their owner's consent. Although no claim of representativeness is made, informants were almost equally distributed by gender (22 F and 21 M), ranging in age from 22 to 79 (average 35), and represented a mix of different types of occupation, levels of income and rented goods, namely dwellings (19), various equipment, tools and kitchen appliances (16), cars (9), washing machines (3) and a bicycle (1).

Our findings first focus on how possessions enter the realm of 'sharing out' (Belk 2010). We show how informants assess the 'rent-ability' of what they make available to others. This relational work with one's private goods consists of both shaping the boundaries of what is 'rent-able' and of sometimes excluding others from using parts of these things. While Philip et al. (2015, 8) argue that rented goods are preferably "unbreakable, fairly durable and not precious," our findings show that "rent-ability" is a feature attached to the closeness and secrecy of exchanges individuals have with their possessions (Simmel 1906). Hence rented goods never belong to informants' territory of intimacy (Goffman 1971), although this varies according to people's biographical sensitivity.

Next, we examine the circumstances under which possessions actually come to be rented and what relational work is performed both with objects and tenants/guests/neighbors as informants variously term them. We highlight three different circumstances whereby private goods/spaces come to be rented. For some informants, expensive goods such as dwellings, cars and luxurious objects (e.g., wedding dresses) are acquired from the beginning for a regular, long-term rental activity. These semi-professionals owners develop a quite intensive secondary occupation that competes with marketplace offering by providing other consumers with better prices and services. In such cases, relational work with objects/spaces appears to be demanding. It consists of selecting "interesting" goods in terms of investment such as well-situated houses, comfortable cars or highly demanded goods. Once goods are dedicated and adapted to renting, relational work with tenants requires finding the "proper renter" (i.e., liable, solvable and respectful) through various exchange media such as social networks, C2C websites and word-of-mouth. The second category of owners comes to rent goods usually after prior experiences as users of online short-term rental platforms. We call this 'generalized reciprocal sharing out' because it occurs outside the family circle (Belk 2010), but within a system of generalized reciprocity (Sahlins 1972) or mutuality (Arnould and Rose 2016) whereby owners welcome guests as they expect to be welcomed when they are themselves travelling. While shared meanings entangle commercial/hospitality logics that are shaped by platforms (von Richthofen and Fischer 2019), our findings demonstrate high variability in how hospitality is understood and performed. Likewise, we show that relational work with objects/places results in various approaches, from leaving everything in place to restricting access to some areas and sometimes excluding oneself from one's own place of living. Finally,

the third category of informants comes to rent goods because others – mostly neighbors or friends – request some things that they possess. What we call "local trade" includes lending a vacant garage, garden or DIY tools, or kitchen equipment whose request may be free before it turns into regular and paid rental. As the object is offered "as is," relational work with possessions is limited. Preference for paid rental gradually appears within existing relationships and is intended to tell renters that objects must be returned. Fees also serve to maintain distanced relationships that distinguish such exchanges from sharing 'in' (Belk 2010) and to enable owners to avoid renters' indebtedness.

We first contribute by extending the approach of P2P activities beyond single-field approaches thus showing that rental is a multifaceted activity. Second, we emphasize that relational work with possessions is required prior to making them available to others. In so doing, we extend Zelizer's (2012) work on relationality to objects. Third, we detect three different types of relational packages whereby different social ties, economic transactions, exchange media and negotiated meanings are articulated. Though limited to rental and an idiosyncratic cultural context, our study extends current research on the collaborative economy (Belk et al. 2019; John 2016; Widlock 2017) by offering a broader and theorized approach to an overlooked access-based mode of consumption (Albinsson and Perera 2018). It shows that using a unique action verb—here renting out but elsewhere sharing or accessing—may be problematic to embrace heterogeneous realities. Rather, we assume that renting, sharing and other collaborative activities can better understood by examining the various relationships owners have with their possessions and how these define the process whereby private goods/spaces are rented, shared, mutualized or sold (Lastovicka and Fernandez 2005), with whom and how. Finally, our research sketches fruitful ways of understanding how marketplace dynamics affect and is affected by particular institutionalizing processes of entanglement of economic and relational exchanges (Findlay 2018; Giesler et al. 2015).

REFERENCES

Albinsson, Pia and B. Yasanthi Perera eds. (2018), *The Rise of the Sharing Economy*, Santa Barbara, CA: Praeger.

Arnould, Eric J. and Alexander S. Rose (2016) "Mutuality: Critique and substitute for Belk's "sharing," *Marketing Theory*, 16 (1), 75–99.

Aronczyk, Melissa and Ailsa Craig (2012), "Introduction: Cultures of circulation," *Poetics*, 40 (2), 93–100.

Bardhi, Fleura and Giana M. Eckhardt (2012), "Access-Based Consumption: The Case of Car Sharing," *Journal of Consumer Research*, 39 (4), 881–98.

Bardhi, Fleura and Giana M. Eckhardt (2017), "Liquid Consumption," *Journal of Consumer Research*, 44 (3), 582–97.

Bardhi, Fleura, Giana M. Eckhardt and Eric J. Arnould (2012), "Liquid Relationship to Possessions," *Journal of Consumer Research* 39 (3), 510–29.

Belk, Russell (2010), "Sharing," *Journal of Consumer Research*, 36 (5), 715–34.

Belk, Russell (2014), "Sharing Versus Pseudo-Sharing in Web 2.0," *Anthropologist*, 18 (1), 7–23.

Belk, Russell (2020), Commodification as a Part of Marketization, in *Marketization: Theory and Evidence from Emerging Economies*, H. Roy Chaudhuri et R. Belk (eds.), New York: Springer.

Belk, Russell, Giana M. Eckhardt and Fleura Bardhi eds. (2019), *Handbook of the Sharing Economy*, Cheltenham, UK; Northampton, MA: Edward Elgar Publishing.

Durgee, Jeffrey and Gina O'Connor (1995), "An Exploration into Renting as Consumption Behavior," *Psychology and Marketing*, 12 (2), 89–104.

Eckhardt, Giana and Fleura Bardhi (2016), "The Relationship between Access Practices and Economic Systems," *Journal of the Association of Consumer Research*, 1 (2), 210–25.

Findlay, Isobel M. (2018), Precursors to the sharing economy: cooperatives, in *The Rise of the Sharing Economy. Exploring the Challenges and Opportunities of Collaborative Consumption*, Albinsson, Pia A. and B. Yasanthi Perera (eds.), Santa Barbara, CA: Praeger Publishers, 9–28.

Giesler, Markus, Ela Veresiu and Anton Siebert (2015), "Designing a Sharing Economy through the Process of Empathization," *Advances in Consumer Research*, 43, 152–56.

Goffman, Erving (1971), *Relations in Public*, New York: Basic Books.

Harvey, David (2007), *A Brief History of Neoliberalism*, Oxford, UK: Oxford University Press.

Hochschild, Arlie Russell (1983), *The Managed Heart: Commercialization of Human Feeling*, Berkeley: University of California Press.

Horton, John J., and Richard J. Zeckhauser (2016), "Owning, Using and Renting: Some Simple Economics of the 'Sharing Economy'," National Bureau of Economic Research, Working Paper 22029.

Ikkala, Tapio and Airi Lampinen, A. (2015), "Monetizing network hospitality: Hospitality and sociability in the context of Airbnb," *CSCW'15 Proceedings of the 18th ACM Conference on Computer Supported Cooperative Work*, New York, NY: ACM, 1033–44.

John, Nicholas (2016), *The Age of Sharing*, London: Polity.

Moeller, Sabine and Kristina Wittkowski (2010), "The burdens of ownership: reasons for preferring renting," *Managing Service Quality: An International Journal*, 20 (2), 176–91.

Oskam, Jeroen and Albert Boswijk (2016), "Airbnb: The future of networked hospitality businesses," *Journal of Tourism Futures*, 2 (1), 22–42.

Philip, Heather E., Lucie K. Ozanne and Paul W. Ballantine (2015), "Examining temporary disposition and acquisition in peer-to-peer renting," *Journal of Marketing Management,* 11 (4), 303–15.

Sahlins, Marshall (1972), "On the Sociology of Primitive Exchange," in *Stone Age Economics*, Chicago: Aldine, 185–238.

Scaraboto, Daiane (2015), "Selling, Sharing, and Everything In-Between: The Hybrid Economies of Collaborative Networks," *Journal of Consumer Research*, 42 (1), 152–76.

Simmel, Georg (1906), "The sociology of secrecy and of secret societies," *American Journal of Sociology,* 11 (4), 441–98.

von Richthofen, Georg and Eileen Fischer (2019), "Airbnb and hybridized logics of commerce and hospitality," in *Handbook of the Sharing Economy*, ed. Russell W. Belk, Giana M. Eckhardt, and Fleura Bardhi, Cheltenham, UK; Edward Elgar Publishing, 193–207.

Widlok, Thomas (2017), *Anthropology and the Economy of Sharing*, London and New York: Routledge.

Zelizer, Viviana (1985), *Pricing the Priceless Child. The Changing Social Value of Children*, New York: Basic Books.

Zelizer, Viviana (1995), T*he Social Meaning of Money. Pin money, paychecks, poor relief and other currencies*, New York: Basic Books.

Zelizer, Viviana (2005), *The purchase of intimacy*, Princeton, NJ: Princeton University Press.

Zelizer, Viviana (2010), *Economic Lives: How Culture Shapes the Economy*, Princeton: Princeton University Press

Zelizer, Viviana (2012), How I Became a Relational Economic Sociologist and What Does That Mean? *Politics & Society*, 40 (2), 145–74.

Threat Appeals to Whom for What? Effects of Threat Appeal to Persuade Quitting a Dangerous Behavior versus Adopting a Preemptive Behavior

Hyerin Ryu, Sungkyunkwan University, Korea
Sunkyu Jun, Sungkyunkwan University, Korea

EXTENDED ABSTRACT

Threat appeal has been widely used for preventative communication but is a double-edged sword: Motivation to protect the self from danger prompts attention to the message whereas motivation to protect the self from threats elicits maladaptive responses. Meta-analyses revealed a positive monotonic influence of threat or fear level on persuasion (Tannenbaum, et al. 2015; Witte and Allen 2000), mostly owing to attention to and belief in the message. However, the influence of threat level could be non-monotonic and be negative due to maladaptive responses (Keller and Block 1996; LaTour and Pitts 1989; Ruiter et al. 2014).

We suggest that this inconsistency can be resolved by distinguishing the two variants of preventative communication: preventive communication aimed to persuade the audience engaged in a dangerous behavior to quit it and preemptive communication aimed to persuade the audience disengaged from a preemptive behavior to adopt it. For a threat-appeal preventive communication, the target audience engaged (vs. disengaged) in a dangerous behavior is more relevant to the threat; when threats are appraised as more personally relevant, defensive avoidance coping is more likely to occur, resulting in maladaptive responses (Carver et al. 1989). In contrast, for a threat-appeal preemptive communication, the target audience disengaged (vs. engaged) from a preemptive behavior perceives less relevance to dangerous consequences of forgoing the behavior; the threat appeal used in the preemptive communication increases attention to the message and efficacy perception in turn. We propose that for a preventive communication, threat appeal has a negative effect on persuasion for individuals engaged in dangerous behavior because of their maladaptive responses; and for a preemptive communication, threat appeal has a positive effect on persuasion for those disengaged from the preemptive behavior owing to efficacy perception.

In Study 1 employing a preventive communication in the texting-while-driving context, we presented either the high-threat or the low-threat message to 128 Californians age younger than 35. Engagement in texting-while-driving was measured with a question ("Do you send a text while driving?") in terms of yes or no. Persuasion was operationalized as beliefs in banning texting-while-driving. We predicted that increasing threat level would have a negative effect on the belief measure indirectly through maladaptive response, particularly for the engaged participants. The interaction effect between threat and behavioral engagement on maladaptive response was significant ($F(1, 124) = 4.53$, $p < .04$). The high-threat message increased the maladaptive response ($M_{high-threat} = 4.3$, SD = 1.22 vs. $M_{low-threat} = 3.6$, SD = 1.36, $F(1, 124) = 4.86$, $p < .03$), only for the participants engaging in texting-while-driving. The indirect effect of threat (1: high vs. 0: low) on the belief through maladaptive response was negatively significant for the participants engaging in texting-while-driving (95% CI: - .35 ~ - .01), but not for those disengaged from such behavior (95% CI: - .13 ~ .25), indicating that the threat appeal increased maladaptive response which lowered beliefs in banning texting-while-driving, particularly for participants engaging in texting-while-driving.

In Study 2 employing a preemptive communication in the context of healthy eating, we presented 110 adults with either the high- or low-threat message recommending healthy eating behavior. Then, the participants imagined to dine alone at a restaurant serving a five-course prix fixe menu in addition to beverage. For each course, half of the foods or beverages were low-calorie ones and another half were high-calorie ones; we used the number of low-calorie appetizer, dessert, and beverage chosen by the participant as a measure of persuasion (M = 1.7, SD = 1.03, range 0-3). We used attitude toward eating healthy foods, which did not differ between the high-threat and the low-threat messages (F < 1.0), as a proxy measure of engagement in healthy eating behavior. The interaction effect between threat and the attitude was negatively significant (B = -.56, SD = .23, t = 2.43, $p < .02$): A spotlight analysis showed that the high-threat message had a positive effect on choice of low-calorie foods at one standard deviation below (B = .49, SD = .27, t = 1.82, $p < .05$, with one-tailed test) but a negative effect at one standard deviation above the mean value of attitude (B = -.45, SD = .27, t = 1.68, $p < .05$, with one-tailed test). The results indicate that threat appeal used for the preemptive communication enhanced persuasion, particularly for the participants with poor attitudes toward eating healthy foods.

We conducted Study 3 in the context of commercial advertising aimed to promote a dietary program as a preemptive means of reducing health risk and presented either the high-threat or low-threat message to 154 participants age 30 and older. We measured engagement in the dietary behavior with three questions (e.g., "Are you currently on a diet?"), in terms of yes or no; ninety-one participants (59.1%) responding "no" for all the three questions were classified as those disengaged from dietary behavior. The interaction effect between threat and behavioral engagement on the intention to subscribe the dietary program was significant ($F(1, 150) = 7.58$, $p < .01$): The high-threat message increased the intention ($M_{high-threat} = 4.5$, SD = 1.72 vs. $M_{low-threat} = 3.5$, SD = 1.76, $F(1, 150) = 6.85$, $p < .01$) for the participants disengaged from the dietary behavior. The effect of threat on the intention was mediated by efficacy perception only for the disengaged participants (95% CI: .01 ~ 1.07). The results indicate that using threat appeal increased efficacy perception for the dietary program and enhanced intention to subscribe the dietary program in turn, particularly for the participants disengaged from the dietary behavior.

This study implies that there is a need to use the threat appeal selectively while clarifying the communication goal and target audience. The threat appeal may be preferred as a tactic to persuade adopting a preemptive behavior by targeting individuals who forgo the behavior, but not as one to persuade individuals to quit a dangerous behavior by targeting those who are engaged in the behavior.

REFERENCES

Carver, Charles S., Michael F. Scheier, and Jagdish K. Weintraub (1989), "Assessing Coping Strategies: A Theoretically Based Approach," Journal of Personality and Social Psychology, 56(2), 267-283.

Keller, Punam A. and Lauren G. Block (1996), "Increasing the Persuasiveness of Fear Appeals: The Effect of Arousal and Elaboration," Journal of Consumer Research, 22(March), 448-459.

LaTour, Michael S. and Robert E. Pitt (1989), "Using fear appeals in advertising for AIDS prevention in the college-age population," Journal of Health Care Marketing, 9(September), 5-14.

Ruiter, Robert A.C., Loes T.E. Kessels, Gjalt-Jorn Y. Peters, and Gerjo Kok (2014), "Sixty years of fear appeal research: Current state of the evidence," International Journal of Psychology, 49(2), 63-70.

Tannenbaum, Melanie B., Justin Helper, Rick S. Zimmerman, Lindsey Saul, and Samantha Jacobs (2015), "Appealing to Fear: A Meta-Analysis of Fear Appeal Effectiveness and Theories," Psychological Bulletin, 141(6), 1178-1204.

Witte, Kim and Mike Allen (2000), "A Meta-Analysis of Fear Appeals: Implications for Effective Public Health Campaigns," Health Education & Behavior, 27(5), 591-615.

Framing Consumers: Increasing Consumer Approach Behaviors
Towards and Within Public and Private Spaces

Kevin L. Sample, University of Rhode Island, USA
Julio Sevilla, University of Georgia, USA
Kelly Haws, Vanderbilt University, USA

EXTENDED ABSTRACT

We demonstrate through eight studies, including a virtual reality study, that consumers engaged in first-(third-) person visual perspective focused on the environment (themselves) derive more (less) pleasure from greater publicness leading to greater (lesser) approach behaviors. These findings contribute to environmental research while resolving seemingly conflicting research regarding public preferences

Consumer behavior is heavily influenced by the built environment (Bitner 1992; Kotler 1973; Mehrabian and Russell 1974). For instance, consumers feeling restricted by aisle width will exert their freedom by choosing more variety (Levav and Zhu 2009), while more space for products on shelves will lead consumers to deduce higher quality (Sevilla and Townsend 2016). Varying ceiling heights alters consumers' information processing (Meyers-Levy and Zhu 2007), a dimly lit environment can lead to less healthy food choices (Biswas et al. 2017), and the coldness of an environment can increase liking of romance movies (Hong and Sun 2011). Collectively, this prior research has demonstrated that the built environment can substantially shape consumer behavior; yet these environmental factors come into play only after a consumer is within a place. In the present work, we examine the environment's influence on getting consumers inside retail environments and the resultant behavior once inside. Specifically, we examine the nuanced role that publicness plays on consumer approach behavior in retail settings

Prior research has demonstrated conflicting consumer response to publicness. Theorists have posited that locales with greater publicness are more welcoming (Jacobs 2016), and that it is easier to garner consumer attention with greater publicness (Alexander, Ishikawa, and Silverstein 1977; Corbusier 1931). As consumer attention is directed inward, there are naturally more opportunities to glean information about what lies inside (e.g., products, store design, consumers). Further, well-executed retail designs, which can be perceived through greater publicness, have a positive effect on consumer behavior (Baker, Levy, and Grewal 1992). Thus, greater publicness allows a firm to showcase offerings inside, resulting in benefits for consumers and firms.

Greater privacy (the opposite of publicness) in retail environments naturally restricts the amount of information regarding what lies inside, but this restriction of information could potentially be beneficial. Limiting information can induce more curiosity for consumers (Goldsmith and Amir 2010; Lee and Qiu 2009; Loewenstein 1994). These curiosity-inducing moments can lead to higher interest in a place and the offerings inside. Additionally, greater privacy can restrict potential judgments, as consumers have privacy concerns (John, Acquisti, and Loewenstein 2011), think about how they might be seen by others (Ratner and Hamilton 2015), and will even leave if being watched by others (Esmark, Noble, and Breazeale 2017). Thus, greater privacy could be as equally beneficial to consumers as greater publicness. To resolve these seemingly conflicting dynamics, visual perspective theory is utilized to explain when and why preferences arise for one over the other.

Visual perspective theory posits that we tend to see ourselves either in first- or third-person perspectives when accessing memories or imagining events (Hung and Mukhopadhyay 2012; Libby and Eibach 2011; Nigro and Neisser 1983). Relevant to our current investigation, consumers assessing retail environments are imagining events (e.g., the possibility of entering a place, where to go once inside, how much time to spend inside), and, due to the design of the environment, should assess environments in one of these two perspectives. To answer when consumers will engage in one versus the other, an understanding of framed views is needed.

Framed views occur when an environment is designed such that consumer attention is directed towards certain areas (Friedberg 2006). Framed views are abundant in retail environments, as marketers are keen on garnering consumer attention (e.g., storefront windows, expansive lobbies). On the outside of a framed view, consumers are only spectators, but once inside a framed view they become someone to be observed (Read 2007).

A consumer on the outside of a framed view looking in is focused on seeing, not on being seen. Consequently, these consumers are more focused on environmental factors, akin to being in first-person perspective (Frank and Gilovich 1989). Consumers in first-person perspective perceive situations through their own eyes and focus on the environment around them more so than themselves (Jones and Nisbett 1972; Libby and Eibach 2011). Therefore, we propose that consumers outside of framed views exhibit greater approach behaviors to greater publicness, as more public environments provide more evidence as to the benefits and appropriateness of entering a place.

Conversely, once inside a framed view, consumers become part of the display to be seen and, become aware of being seen by others – akin to a third-person perspective. Consumers in third-person perspective are more prone to see themselves as others would see them (Frank and Gilovich 1989; Jones and Nisbett 1972; Nigro and Neisser 1983), giving rise to more self-conscious emotions such as embarrassment and shame (Hung and Mukhopadhyay 2012). Hence, we argue that consumers inside of framed views will exhibit less approach behaviors to publicness, as these consumers become aware of how they are seen by others and prefer not to be watched (Esmark et al. 2017). So, quite ironically, consumers approach behaviors when outside a public framed view will attenuate once inside this framed view, unless some privacy is provided.

Further, since consumers outside of framed views are more focused on seeing the environment, inducing consumers into a third-person perspective should increase awareness of how they are being seen and consequently attenuate approach behaviors towards publicness. Conversely, consumers inside of framed views are aware of being seen and inducing consumers into a first-person perspective should increase focus on the environment and should consequently exacerbate approach behavior towards publicness.

Hypothesis 1:   *Consumers outside (inside) of a public framed view are more (less) likely to exhibit approach behavior*

Hypothesis 2:   *A third-(first) person perspective attenuates (exacerbates) consumer approach behavior when outside (inside) of a public framed view*

Environmental influences on consumer behavior tend to be mediated by pleasure or arousal, as these emotional states are imme-

diate, visceral reactions to the environment (Donovan and Rossiter 1982; Mehrabian and Russel 1974). In our context, we contend that pleasure mediates the hypothesized approach behavior, as prior research points to environmental factors leading to pleasure (Baker et al. 1992; Donovan, Rossiter, Marcoolyn, and Nesdale 1994; Gorn, Pham, and Sin 2001; Machleit, Eroglu, and Mantel 2000; Orth and Wirtz 2014). Additional research notes that pleasure is the typical reaction experienced when imagining events engaged in a visual perspective (D'Argembeau and Van der Linden 2004). Accordingly, we argue that the experienced pleasure from framed views mediates this phenomenon.

Hypothesis 3: *The amount of pleasure experienced by consumers from framed views mediates consumer approach behavior*

Due to the magnitude of testing an environmental phenomenon, we conservatively test our hypotheses in a series of eight experiments. Our first three studies examine our hypotheses as they relate to consumers outside framed views, the next three investigate inside framed views, and our final two studies utilize marketplace methods, including virtual reality, to investigate our hypotheses collectively.

In Study 1, we examine consumer approach to a retail environment based on more versus less publicness when outside of a framed view. We predicted that participants would be more likely to engage in approach behaviors when outside a public framed view. 118 undergraduates were randomly assigned one of two images of the exterior of a retail store. To assess consumer approach behavior, participants were asked their liking, the attractiveness, and the estimated time spent in this place on 7-point Likert scales with 1 being negative and 7 being positive. An ANOVA with our indexed dependent variable of consumer approach (see results table for α, SD, and effect sizes) reveals that participants were significantly more likely to exhibit approach behavior towards the public framed view (M_{Public}=4.95, vs. $M_{Private}$=3.87; $F(1,116)$=19.622, p<.001), providing initial support for H1.

In Study 2, we manipulate visual perspectives. We predict that participants receiving a first-(third-) person perspective prime will be more (less) likely to choose a restaurant with a public framed view. 150 MTurk workers were randomly assigned a first- or third-person perspective adapted from Libby and Eibach (2011). Next, participants were shown two restaurant images offering differing levels of publicness and asked to choose which they preferred. Logistic regression reveals a significant effect based on the visual perspective manipulation received (choice of public framed view: $M_{1stPerson}$=94.1% vs. $M_{3rdPerson}$=83.1%; β=-.589, Wald $χ^2$ (1)=3.944, p=.047). Participants assigned to the third-person perspective condition were significantly less likely to choose the more public framed view, supporting H1 and H2.

In Study 3, we manipulate visual perspective while investigating the mediating role of pleasure predicting that consumer approach behaviors will be mediated by pleasure. 131 MTurk workers were randomly assigned either the first- or third-person perspective manipulation utilized in Study 2. Following, all participants saw the outside of a public framed view of a restaurant. On the next page, participants were asked to respond to the Self-Assessment Manikin (SAM) pleasure scale ranging from -4 to 4, and typically utilized to assess the range of displeasure to pleasure that consumers experience (Bradley and Lang 1994; Mehrabian and Russell 1974). Following, participants approach behavior was assessed using the same questions from Study 1. An ANOVA reveals that those with a first-person perspective were significantly more likely to engage in approach be-

haviors ($M_{1stPerson}$=5.63 vs. $M_{3rdPerson}$=5.19; $F(1,129)$=7.291, p=.008). Another ANOVA reveals that those with a first-person perspective experienced marginally significant more pleasure ($M_{1stPerson}$=2.52 vs. $M_{3rdPerson}$=2.09; $F(1,129)$=3.749, p=.055). Mediation analysis indicates that pleasure mediates consumer approach behavior (indirect effect=-.1181, SE=.06; 95%CI=-.2322 to -.0013; direct effect p=.07), supporting H3.

In Study 4, we begin to focus inside framed views. For this study, we predict that consumers inside of a framed view will exhibit approach behavior towards less publicness. 110 undergraduates were randomly assigned either a public or private framed view of a restaurant. Next, participants evaluated the restaurant using our previous approach measures. An ANOVA reveals that those inside a private framed view exhibited significantly greater approach behavior than those inside a public framed view (M_{Public}=4.16 vs. $M_{Private}$=4.78; $F(1,108)$=6.506, p=.012). This reveals a reversal of the findings from our first three studies, further supporting H1.

In Study 5, we focus inside a framed view of a retail store, while assessing mediation. 180 undergraduates were randomly assigned inside a public or private framed view. Following, participants evaluated the store using the pleasure scale with approach behavior assessed as previously. An ANOVA, in support of H1, reveals that those encountering the private framed view had a significantly more positive approach behavior towards the retail store (M_{Public}=3.62 vs. $M_{Private}$=4.19; $F(1,178)$=8.680, p=.004). Another ANOVA reveals that those seeing the private framed view experienced significantly more pleasure ($M_{MorePublic}$=1.24 vs. $M_{MorePrivate}$=1.69; $F(1,178)$=4.046, p=.046). Pleasure, again, mediates approach (indirect effect=-.2989, SE=.15; 95%CI=-.5967 to -.0071; direct effect p=.03), supporting H3.

In Study 6, we manipulate perspective while inside a public framed view. Consequently, we anticipate that participants with the first-person perspective will exhibit greater approach behavior. 124 MTurk workers were randomly assigned one version of the public restaurant image from study 4, with either a first- or third-person visual perspective. An ANOVA reveals that those seeing the first-person perspective reported significantly greater approach behavior than those seeing the third-person perspective ($M_{1stPerson}$=4.69 vs. $M_{3rdPerson}$=4.05; $F(1,122)$=6.358, p=.013), supporting H1 and H2. Another ANOVA reveals that those with a first-person perspective experienced significantly more pleasure ($M_{1stPerson}$=1.37 vs. $M_{3rdPerson}$=.65; $F(1,122)$=4.805, p=.030), and pleasure mediates approach (indirect effect=-.2317, SE=.11; 95%CI=-.4403 to -.0227; direct effect p=.22), supporting H3.

For study 7A, we show participants one of four rendered videos from a perspective of someone navigating an environment in real life. In these videos, participants had a view of a restaurant from outside the framed view, making their way inside this framed view, and then taking a seat in the restaurant. Every participant saw the same sequence and the same other consumers, however the texture of the glass in the restaurant was manipulated so that four distinct conditions were created (outside/inside): 1) public/private 2) public/public 3) private/public and 4) private/private. In alignment with H1, the optimal arrangement to increase approach behaviors both outside and inside of a framed view is to be outside a public framed view and then inside a private framed view. Thus, we predict that participants will have significantly higher approach behaviors for video 1, as this video had the optimal arrangement of public/private.

259 MTurk workers were randomly assigned one of these four videos. Once finished viewing, participants responded to our pleasure and approach questions. An ANOVA reveals a significant main effect ($F(3,255)$=3.175, p=.025). Simple contrasts (see results

table) reveal video 1 elicited significantly higher approach behavior than the other videos, supporting H1. Similar results also emerge for pleasure ($F(3,255)=3.559$, $p=.015$) and pleasure, again, mediates (indirect effect=.2023, SE=.07; 95%CI=-.3361 to -.0707; direct effect p=.78), supporting H3.

Increasingly, firms utilize virtual reality to allow consumers/clients to evaluate places before design changes and construction. In Study 7B, we provide participants with this marketplace experience of virtual reality while investigating actual behavior – time spent in a place. 104 undergraduates were randomly assigned one of two conditions: a very public restaurant to evaluate in either a first- or third-person perspective. In the first-person perspective they had an eye-height view, where they could see their avatar's hands. In the third-person perspective they had an over the shoulder view of their avatar. Research assistants kept time for each participant, making a note of when participants entered the restaurant. In alignment with H2, we predict that participants in a first-person perspective will have greater approach behavior directed toward the outside public framed view because they are more focused on the environment. This should lead them to entering the building before those in third-person perspective. Additionally, these participants should spend more time inside this public framed view because they will be less self-conscious than those in third-person perspective.

An ANOVA with the time spent evaluating the exterior of the restaurant reveals that those in a first-person perspective spent significantly less time evaluating the exterior ($M_{1stPerson}$ = 52.53, SD = 50.5 vs. $M_{3rdPerson}$ = 82.8, SD = 50.5; $F(1,102)$ = 9.337, p = .003; η^2 = .084). That is, they entered the building more quickly. An ANOVA with the time spent evaluating the interior of the restaurant reveals that those in a first-person perspective spent significantly more time evaluating the interior ($M_{1stPerson}$ = 51.10, SD = 26.2 vs. $M_{3rdPerson}$ = 32.68, SD = 26.2; $F(1,102)$ = 12.859, p = .001; η^2 = .112). This is a reversal of the time spent on the exterior supporting H1 and H2 in a marketplace context with actual behavior.

Our work contributes theoretically and practically. Theoretically, we integrate architectural theory with visual perspective theory, demonstrating that consumer location regarding framed views tends to dictate consumer approach behavior to more and less public areas. By so doing, we resolve this apparent conflict between prior research indicating that consumers prefer both more publicness and more privacy. Practically, our work provides important insights for marketers. In the design and construction of retail environments, it is crucial that marketers work closely with designers to ensure that retail spaces provide substantial publicness from framed views, but once inside these framed views that consumers are given ample opportunity for privacy. The implications of perspectives must be carefully considered by marketers designing environments for consumers, as well, while marketing researchers need to consider the allotted publicness of retail spaces when studying consumer marketplace interactions.

REFERENCES

Alexander, Christopher, Sara Ishikawa, and Murray Silverstein (1977), *A Pattern Language: Towns, Buildings, Construction,* Oxford University Press.

Baker, Julie, Michael Levy, and Dhruv Grewal (1992), "An Experimental Approach to Making Retail Store Environmental Decisions," *Journal of Retailing,* 68 (4), 445.

Biswas, Dipayan, Courtney Szocs, Roger Chacko, and Brian Wansink (2017), "Shining Light on Atmospherics: How Ambient Light Influences Food Choices," *Journal of Marketing Research*, 54 (1), 111-23.

Bitner, Mary J. (1992), "Servicescapes: The Impact of Physical Surroundings on Customers and Employees," *Journal of Marketing,* 56 (2), 57-71.

Bradley, Margaret M., and Peter J. Lang (1994), "Measuring Emotion: The Self-Assessment Manikin and the Semantic Differential," *Journal of Behavior Therapy and Experimental Psychiatry,* 25 (1), 49-59.

Corbusier, Le (1931), *Towards a New Architecture,* Courier Corporation.

D'Argembeau, Arnaud and Martial Van der Linden (2004), "Phenomenal Characteristics Associated with Projecting Oneself Back into the Past and Forward into the Future: Influence of Valence and Temporal Distance," *Consciousness and Cognition*, 13 (4), 844-58.

Donovan, Robert and John R. Rossiter (1982), "Store Atmosphere: An Environmental Psychology Approach," *Journal of Retailing,* 58 (1), 34-57.

Donovan, Robert J., John R. Rossiter, Gilian Marcoolyn, and Andrew Nesdale (1994), "Store Atmosphere and Purchasing Behavior," *Journal of Retailing,* 70 (3), 283-94.

Esmark, Carol L., Stephanie M. Noble, and Michael J. Breazeale (2017), "I'll be Watching You: Shoppers' Reactions to Perceptions of being Watched by Employees," *Journal of Retailing,* 93 (3), 336-49.

Frank, Mark G. and Thomas Gilovich (1989), "Effect of Memory Perspective on Retrospective Causal Attributions," *Journal of Personality and Social Personality*, 57 (3), 399–403.

Friedberg, Anne. The virtual window: from Alberti to Microsoft. Cambridge, MA: MIT press, 2006.

Goldsmith, Kelly, and On Amir (2010), "Can Uncertainty Improve Promotions?" *Journal of Marketing Research,* 47 (6), 1070-7.

Gorn, Gerald, Michel Tuan Pham, and Leo Yatming Sin (2001), "When Arousal Influences Ad Evaluation and Valence Does Not (and Vice Versa)," *Journal of Consumer Psychology,* 11 (1), 43-55.

Hong, Jiewen, and Yacheng Sun (2011), "Warm it Up with Love: The Effect of Physical Coldness on Liking of Romance Movies," *Journal of Consumer Research,* 39 (2), 293-306.

Hung, Iris W., and Anirban Mukhopadhyay (2011), "Lenses of the Heart: How Actors' and Observers' Perspectives Influence Emotional Experiences," *Journal of Consumer Research,* 38 (6), 1103-15.

Jacobs, Jane (2016), *The Death and Life of Great American Cities,* Vintage.

John, Leslie K., Alessandro Acquisti, and George Loewenstein (2010), "Strangers on a Plane: Context-Dependent Willingness to Divulge Sensitive Information," Journal of Consumer Research, 37 (5), 858-73.

Jones, Edward E. and Richard E. Nisbett (1972), "The Actor and the Observer: Divergent Perceptions of the Cause of Behavior," in *Attribution: Perceiving the Causes of Behavior*, ed. Edward E. Jones, David E. Kanhouse, Harold H. Kelley, Richard E. Nisbett, Stuart Valins, and BernardWeiner, Morristown, NJ: General Learning Press, 79–94.

Kotler, Philip (1973), "Atmospherics as a Marketing Tool," *Journal of Retailing,* 49 (4), 48-64.

Lee, Yih H., and Cheng Qiu (2009), "When Uncertainty Brings Pleasure: The Role of Prospect Imageability and Mental Imagery," *Journal of Consumer Research,* 36 (4), 624-33.

Levav, Jonathan, and Rui Zhu (2009), "Seeking Freedom through Variety," *Journal of Consumer Research,* 36 (4), 600-10.

Libby, Lisa K., and Richard P. Eibach (2002), "Looking Back in Time: Self-Concept Change Affects Visual Perspective in Autobiographical Memory." *Journal of Personality and Social Psychology,* 82 (2), 167.

_____ (2011), "Visual Perspective in Mental Imagery: A Representational Tool that Functions in Judgment, Emotion, and Self-Insight," *Advances in Experimental Social Psychology,* 44, 185.

Loewenstein, George (1994), "The Psychology of Curiosity: A Review and Reinterpretation." *Psychological Bulletin,* 116 (1), 75.

Machleit, Karen A., Sevgin A. Eroglu, and Susan P. Mantel (2000), "Perceived Retail Crowding and Shopping Satisfaction: What Modifies this Relationship?" *Journal of Consumer Psychology,* 9 (1), 29-42.

Mehrabian, Albert, and James A. Russell (1974), *An Approach to Environmental Psychology,* The MIT Press.

Meyers-Levy, Joan, and Rui Zhu (2007), "The Influence of Ceiling Height: The Effect of Priming on the Type of Processing that People use," *Journal of Consumer Research,* 34 (2), 174-86.

Nigro, George and Ulric Neisser (1983), "Point of View in Personal Memories," *Cognitive Psychology*, 15 (4), 467–82.

Orth, Ulrich R., and Jochen Wirtz (2014), "Consumer Processing of Interior Service Environments: The Interplay among Visual Complexity, Processing Fluency, and Attractiveness," *Journal of Service Research,* 17 (3), 296-309.

Ratner, Rebecca K., and Rebecca W. Hamilton (2015), "Inhibited from Bowling Alone," *Journal of Consumer Research,* 42 (2), 266-83.

Read, Gray. The Miniature and the Gigantic in Philadelphia Architecture: Essays on Designing the City to Human Scale. Edwin Mellen Press, 2007.

Sevilla, Julio, and Claudia Townsend (2016), "The Space-to-Product Ratio Effect: How Interstitial Space Influences Product Aesthetic Appeal, Store Perceptions, and Product Preference," *Journal of Marketing Research,* 53 (5), 665-81.

Pay Less, Spend More: Consumers' Mental Accounting for Discounted Gift Cards

Gianluca Scheidegger, University of St.Gallen, Switzerland
Thomas Rudolph, University of St.Gallen, Switzerland
Marc Linzmajer, University of St.Gallen, Switzerland
Severin Friedrich Bischof, Copenhagen Business School, Denmark

EXTENDED ABSTRACT

The downward pressure on prices seems to intensify across various industries worldwide. Companies are increasingly discounting their products to remain competitive and drive sales. Price- and deal-sensitive consumers are targeted by discount mechanisms that are becoming more and more opaque. These alternative discount forms and their effect on consumer behavior have attracted the attention of marketing and consumer-behavior researchers in recent years.

One increasingly popular discount mechanism that has not yet been subject to research are discounted gift cards (DGCs). DGCs are company-specific funds that can only be redeemed for purchases at the card-issuing company and. Gift cards are traditionally seen a gift, a bonus, or as part of a promotion, but a DGC can be attractive for self-purchase because its selling price lies below its face value. Thus, the topic is no longer limited to gift-givers and gift-takers.

We hypothesize that the combination of both the discount, accounted for as current income, and the low payment transparency (see Soman, 2003) of a gift card reduces consumers' perceived costs at the time of the purchase. Although the DGC resembles other price promotions designed to incentivize immediate purchases, such as regular price discounts, a DGC is distinct from these promotions. Receiving a DGC is conditional on purchasing the gift card and redeeming it for a future purchase. Therefore, DGCs represent partially prepaid consumption as well as a pre-received promotion compared to other similar price promotions. Based on that reasoning, we hypothesize:

Hypothesis 1: *Consumers who receive DGCs (a) report lower subjective costs and (b) spend more than consumers who receive a financially equivalent price discount.*

Temporally separating payment and consumption leads to counterintuitive decisions (Gourville & Soman, 1998). Sunk costs (Arkes & Blumer, 1985) are a prominent example of this effect. When consumption and payment are temporally separated, the impact of sunk costs decreases (Gourville & Soman, 1998). Hence, the less the consumption decision is influenced by the upstream costs, the greater the time difference. Gourville and Soman (1998) referred to this phenomenon as payment depreciation. Thus, we hypothesize:

Hypothesis 2: The longer the time span between DGC purchase and redemption, the lower consumers' subjective costs.

Study 1 (N=463) was a 2x2 between-subjects experiment conducted on MTurk. Half of the participants were told that they would acquire a $500 gift card for $400. Participants in the control condition bought the same gift card for $1. They were either told that they would redeem the DGC for a $800 laptop one day or six months later. Lastly, participants' subjective costs (in US dollars) during the laptop purchase were measured in an open-ended format.

Study 2 (N=212) consisted of real-world booking data from an airline who issued two different DGCs. DGCs had a face value of 30 and 90 monetary units (MU)[1] with an absolute discount of 6 and 15 MU, respectively. About nine months later, we received booking data for DGC and regular gift card bookings after issuing the DGCs. The booking data was limited to long-haul flights in Economy class. To ensure comparability, we only considered regular gift cards of the same face value as the DGC (30 and 90 MU) in our analyses.

In Study 1, we provide evidence for reduced subjective (H1a) costs and payment depreciation (H2) in the context of DGC-usage. Among DGC-users in the one-day-later-condition, the subjective costs (M = $578.07) were already lower than the objective costs of $700 (t(114) = -6.28, p < 0.001). Subjective costs for the $800 laptop purchase were significantly lower (t(228) = 2.05, p < .05) six months after (M = $520.91, SD = $215.49) the DGC purchase compared to one day after (M = $578.07, SD = $208.30). No differences were found in the control condition.

In Study 2, we found a significant interaction effect (b = 0.368, p = 0.032) between gift card type and time difference. A conditional effect of time difference on booking price only existed when consumers were using a DGC (b = 0.350, t = 2.074, p = 0.039). For regular gift card users, there was no significant conditional effect of time difference on booking prices (b = -0.017, t = -0.082, p = 0.423). This field evidence further supports H1b and H2.

The results from this article have both theoretical and practical implications. First, this article contributes to the mental accounting literature by demonstrating that payment depreciation exists not only in the context of sunk costs but also in regular product purchases that are based on partial rather than complete prepayment. Second, we introduce a new payment mechanism and promotion type to the academic literature which extends and combines evidence from recent publications in this field. On the practical side, it is important for gift card providers to understand that DGCs are an attractive alternative to regular price discounts, which should be considered by companies in a price-sensitive environment. In our field study, we showed that even shallow discounts can lead to a significant increase in booking prices in a competitive industry.

REFERENCES

Arkes, H. R., & Blumer, C. (1985). The Psychology of Sunk Costs. *Organizational Behavior and Human Decision Processes*, *35*(February), 124–140.

Gourville, J. T., & Soman, D. (1998). Payment Depreciation: the Behavioral Effects of Temporally Separating Payments From Consumption. *Journal of Consumer Research*, *25*(2), 160–174.

Khouja, M., Pan, J., Ratchford, B. T., & Zhou, J. (2011). Analysis of free gift card program effectiveness. *Journal of Retailing*, *87*(4), 444–461.

Soman, D. (2003). The Effect of Payment Transparency on Consumption: Quasi-Experiments from the Field. *Marketing Letters*, *14*(2001), 173–183.

---

1   At the request of our partner company, we anonymized the currency as well as the ticket prices.

Autonomous Products Make You Look Lazy!

Tobias Schlager, University of Lausanne HEC, Switzerland
Fabian Nindl, WU Vienna, Austria

EXTENDED ABSTRACT

Recently, autonomous products have entered our daily lives and have become rapidly more popular. These products take over mundane tasks such as cleaning, mowing, or driving and will likely change our lives (Jörling et al. 2019; Rijsdijk & Hultink 2003).

Evidence suggests that people choose products to communicate their desired identities, attitudes, and characteristics (Belk 1988; Holt 1995). Moreover, it has to be emphasized that products might provide an indicator for class and success (Flynn et al. 2016). Considering this evidence along with the ability of autonomous products to free up users' time, we propose that displaying the usage of such products systematically alters people's social perceptions. The question that we seek to answer by this research is: *How will autonomous products affect a peers' perceptions*?

Autonomous products free up people's time for other tasks by taking over daily chores (Leung et al. 2018; Festjens & Janiszewski 2015). Without any further information on why consumers delegate those tasks, one should assume that owners should thus complete less work. Accordingly, we propose that the peers of users of such products will perceive them to be less hardworking, or even lazy.

Drawing on prior studies, which analyzed the social perceptions of hard work and busyness (Burke & Ng 2007; Yang & Hsee 2019) it is hypothesized that owning autonomous products can have a significant effect on social perceptions. While people may understand owners of autonomous products as particularly busy, they might also construe them as those who are simply not motivated to do their daily chores. This suggests that other people's perceptions of owners of autonomous products depends on several moderators, such as how they use their time (i.e., for work, or leisure). While we assume that—without any further information—peers intuitively perceive owners of such products to be less hardworking, the opposite is true when the information is provided that they use the freed-up time for additional work.

Accordingly, we form the following hypotheses:

Hypothesis 1: *Peers will perceive users of autonomous products to be less hardworking.*

Hypothesis 2: *Time use (work vs. leisure) moderates the effect of autonomous products on perceptions of hardworking.*

Our key theoretical contribution is that autonomous products can send strong signals to their owners' peers (Belk 1988) and thus we uncover the social effects of this novel product class. A second contribution is that we extend prior work on busyness (Bellezza et al. 2016; Yang & Hsee 2019) by revealing a key antecedent, namely, product type. Moreover, we extend findings on the evolving research on autonomous products (Schmitt 2019; de Bellis & Johar 2020).

Five studies (using US respondents 2019 and 2020; see table below for further details) test and support the hypotheses that people perceive owners of autonomous products as less hard-working than those who operate traditional (i.e., non-autonomous) products.

In a pilot study we collected 52,859 tweets related to autonomous and traditional products of the same product category and found that responses to tweets on autonomous products included significantly less words related to work than those related to traditional products (M_{AP}=.27, M_{Trad}=.58; t(163,959)=8.99, Cohens *d*=.33).

In Study 1, 2, and 3 participants were randomly assigned to one of four conditions of 2×2 between-subjects experimental designs and we tested whether people perceive owners of autonomous products to be less hard-working than owners of traditional products. A series of ANOVAs showed that autonomous products can have a detrimental effect on people's perception of how hardworking a person is.

The objective of Study 4 was to provide further insights into how one can prevent the negative effects of autonomous products on perceptions of hard work. Moreover, this study used a highly realistic configuration of Facebook profiles. Another series of ANOVAs showed that autonomous products only reduce perceptions of hard-work when time is used for leisure, but not when time is dedicated for work, thus we reveal a critical moderator. We also shed light on the consequences of perceptions of hard working by revealing their effect on perceived success (moderated mediation index is significant).

We reveal a novel consequence of how those products affect social perceptions and provide three important insights: The key insight is that highlighting that freed-up time is not only used for work can attenuate the detrimental effect of autonomous products on perceptions of hard work. Second, even while owners of autonomous products are perceived to work longer, they are not perceived to be more hard-working than their counterparts with traditional products. Finally, we show that the effect of autonomous products translates to perceived success and thus a highly status relevant variable.

Consumers and companies will most likely benefit from autonomous products, however, potential negative consequences should be recognized: Autonomous products can have detrimental effects on peer perceptions in meritocratic societies. Therefore, marketers can adjust their communication strategy. For consumers, who are more intrigued by less hardworking people, one may proactively communicate the opportunity to relax. In cultures and environments where busyness is considered a status symbol, firms should highlight the opportunity to be productive while the autonomous product is completing work. In all societies, time saving and time pressure should be emphasized.

REFERENCES

Belk, R. W. (1988). Possessions and the extended self. *Journal of Consumer Research*, *15*(2), 139-68.

Bellezza, S., N. Paharia, and A. Keinan (2017). Conspicuous consumption of time: When busyness and lack of leisure time become a status symbol. *Journal of Consumer Research*, 44(1), 118–38.

Burke, R. J., & Ng, E. S. (2007). Workaholic behaviors: Do colleagues agree?. *International Journal of Stress Management*, *14*(3), 312-20.

de Bellis, E., & Johar, G. (2020). Autonomous Shopping Systems: Identifying and Overcoming Barriers to Consumer Adoption. *Journal of Retailing*. 96(1), 74-87.

Festjens, A. and C. Janiszewski (2015), "The value of time," *Journal of Consumer Research*, 42(2), 178–95.

Flynn, L. R., Goldsmith, R. E., & Pollitte, W. (2016). Materialism, status consumption, and market involved consumers. *Psychology & Marketing*, *33*(9), 761-76.

Holt, D. B. (1995). How consumers consume: A typology of consumption practices. *Journal of Consumer Research*, *22*(1), 1-16.

Jörling, M., R. Böhm, and S. Paluch (2019), "Service Robots: Drivers of Perceived Responsibility for Service Outcomes," *Journal of Service Research*, 22(4), 404–20.

Leung, E., G. Paolacci, and S. Puntoni (2018), "Man versus machine: Resisting automation in identity-based consumer behavior," *Journal of Marketing Research*, 55(6), 818–31.

Rijsdijk, S. A., and E. J. Hultink (2003), "'Honey, have you seen our hamster?' Consumer evaluations of autonomous domestic products," *Journal of Product Innovation Management*, 20(3), 204–16.

Schmitt, B. (2019). "From Atoms to Bits and Back: A Research Curation on Digital Technology and Agenda for Future Research" *Journal of Consumer Research*, 46(4), 825-32.

Yang, A. X. and C. K. Hsee (2019), "Idleness versus busyness," *Current Opinion in Psychology*, 26, 15–18.

Time to be Happy: Autonomous Products Increase
Consumer Happiness by Reducing Time Stress

Tobias Schlager, HEC Lausanne, Switzerland
Emanuel de Bellis, University of St. Gallen, Switzerland
Ashley V. Whillans, Harvard Business School, USA

EXTENDED ABSTRACT

Products are increasingly becoming autonomous, able to initiate their own behavior to complete tasks on behalf of consumers (Beer et al. 2014; de Bellis and Johar 2020; Schmitt 2019). For example, robotic vacuum cleaners keep one's home tidy, robotic lawn mowers take care of one's garden, and smart kitchen devices implement various recipes. These autonomous products are quickly gaining in popularity, with over 14 million Americans owning solely a robotic vacuum cleaner (Statista 2020).

Although automated consumer products have a long history (e.g., kitchen appliances such as food processors and automatic transmission in cars), it is only now that products are being equipped with higher levels of autonomy and intelligence (Hoffman and Novak 2018; Schmitt 2019; Wertenbroch et al. 2020). Whereas autonomous products may be connected to other products and systems, they are typically meant to accomplish a specific task. Importantly, as autonomous products increasingly take over tasks from consumers, they provide consumers with the opportunity to take part in other tasks and activities (André et al. 2018; Leung, Paolacci, and Puntoni 2018; Rijsdijk and Hultink 2003).

In fact, a key sales argument for many of these technologies is that they free up time. Given that time may be the most limited resource in our lives (Chung et al. 2019), time savings are related to various beneficial effects. For example, consumers were happier when they spent money on a time-saving purchase, such as paying for housecleaning, than when they spent money on a material purchase, such as buying new clothes (Whillans et al. 2017). Other research argued that convenience and time savings are strong drivers of the adoption of new technologies (Willems et al. 2017; Wu 2018). We follow up on these findings and ask: Do the time savings generated by autonomous products also affect consumers' happiness?

Although prior work has provided initial insights into why people are reluctant to adopt autonomous products (de Bellis, Johar, and Schweitzer 2020; Leung et al. 2018; Longoni, Bonezzi, and Morewedge 2019), the larger consequences for people's lives have not been well understood. Our key proposition is that autonomous products affect happiness as they reduce the time stress of consumers. This builds on recent findings that time is indeed a key predictor of happiness (Whillans et al. 2017; Whillans, Weidman, and Dunn 2016).

Moreover, we also believe that compared to other ways of saving time in one's daily chores, autonomous products have one key advantage: Consumers tend to feel less guilty for delegating the tasks they should typically do. This is important, since prior work found that the psychological implications of outsourcing tasks is critically undermined by feelings of guilt (Whillans, Lee-Yoon, and Dunn 2020). Finally, we propose a key moderator of this effect by conceptualizing the extent to which consumers perceive autonomous products as more than just a product. In particular, we propose that ascribing human characteristics to a product may undermine the positive effect of autonomous products against other ways to delegate a task as consumers indeed develop a feeling of guilt in this case.

We tested these predictions in a series of four studies. Study 1 was designed with the objective of obtaining initial field evidence on whether people become happier when they own autonomous products. Study 2 was designed with the objective of getting correlational insights into whether people become happier when they own autonomous products. Study 3 was designed with the key objective of providing causal evidence on whether owning and operating autonomous products increases happiness. A second objective was to shed light on the psychological mechanism underlying the effect. Study 4 was designed with the objective of examining the effects of autonomous products compared to other ways of saving time. Specifically, this study tests the effects against delegating tasks to other persons, i.e., home helpers. A summary of methods and results is provided in Table 1.

The findings of these studies, conducted in the field and online, show that autonomous products may indeed make people happier as they free up time and as a consequence feel less pressed for time. Moreover, we also find support for the hypothesis that consumers feel less guilty when they outsource their tasks to autonomous products (vs. home helpers). Finally, we find that if consumers ascribe human characteristics to an autonomous product, this positive effect is undermined and they feel guiltier and less happy than if they would construe the product simply as an object.

Our findings make several important theoretical contributions: First, we examine a key characteristic of autonomous products (i.e., to save time) and its implications for consumer happiness. Identifying time saving as process also contributes to literature on the importance of time, which is an increasingly proliferating field in psychology research (Lee-Yoon and Whillans 2019; Rudd, Catapano, and Aaker 2019; Whillans et al. 2016). Finally, we contribute to research on consumers' relationships with products (Belk 2013; Seeber et al. 2020) and reveal a potentially negative consequence of too humanlike products.

REFERENCES

André, Quentin, Ziv Carmon, Klaus Wertenbroch, Alia Crum, Douglas Frank, William Goldstein, et al. (2018), "Consumer Choice and Autonomy in the Age of Artificial Intelligence and Big Data," *Customer Needs and Solutions*, 5 (1-2), 28-37.

Beer, Jenay M., Arthur D. Fisk, and Wendy A. Rogers (2014), "Toward a Framework for Levels of Robot Autonomy in Human-Robot Interaction," *Journal of Human-Robot Interaction*, 3 (2), 74-99.

Belk, Russell W. (2013), "Extended Self in a Digital World," *Journal of Consumer Research*, 40 (3), 477-500.

Chung, Jaeyeon, Leonard Lee, Donald R. Lehmann, and Claire Tsai (2019), "How People Use Found Time," working paper.

de Bellis, Emanuel and Gita Venkataramani Johar (2020), "Autonomous Shopping Systems: Identifying and Overcoming Barriers to Consumer Adoption," *Journal of Retailing*, 96 (1), 74-87.

de Bellis, Emanuel, Gita Venkataramani Johar, and Nicola Schweitzer (2020), "The Protestant Work Ethic, Consumers' Quest for Meaning, and the Adoption of Autonomous Products," working paper.

Hoffman, Donna L. and Thomas P. Novak (2018), "Consumer and Object Experience in the Internet of Things: An Assemblage Theory Approach," *Journal of Consumer Research*, 44 (6), 1178-1204.

Lee-Yoon, Alice and Ashley V. Whillans (2019), "Making Seconds Count: When Valuing Time Promotes Subjective Well-Being," *Current Opinion in Psychology*, 26, 54-57.

Leung, Eugina, Gabriele Paolacci, and Stefano Puntoni (2018), Man Versus Machine: Resisting Automation in Identity-Based Consumer Behavior," *Journal of Marketing Research*, 55 (6), 818-831.

Longoni, Chiara, Andrea Bonezzi, and Carey Morewedge (2019), "Resistance to Medical Artificial Intelligence," *Journal of Consumer Research*, 46 (4), 629-650.

Rijsdijk, Serge A. and Erik Jan Hultink (2003), "'Honey, Have You Seen Our Hamster?' Consumer Evaluations of Autonomous Domestic Products," *Journal of Product Innovation Management*, 20 (3), 204-216.

Rudd, Melanie, Rhia Catapano, and Jennifer Aaker (2019), "Making Time Matter: A Review of Research on Time and Meaning," *Journal of Consumer Psychology*, 29 (4), 680-702.

Schmitt, Bernd (2019), "From Atoms to Bits and Back: A Research Curation on Digital Technology and Agenda for Future Research," *Journal of Consumer Research*, 46 (4), 825-832.

Seeber, Isabella, Eva Bittner, Robert O. Briggs, Triparna de Vreede, Gert-Jan de Vreede, Aaron Elkins, Ronald Maier et al. (2020), "Machines as Teammates: A Research Agenda on AI in Team Collaboration," *Information & Management*, 57 (2), 103174.

Statista (2020), "Robotic Vacuum Cleaner Installed Base in the United States in 2017 and 2018," https://www.statista.com/statistics/1068291/united-states-robotic-vacuum-cleaner-installed-base/.

Wertenbroch, Klaus, Rom Y. Schrift, Joseph W. Alba, Alixandra Barasch, Amit Bhattacharjee, Markus Giesler, et al. (2020), "Autonomy in Consumer Choice," *Marketing Letters*, forthcoming.

Whillans, Ashley V., Aaron C. Weidman, and Elizabeth W. Dunn (2016), "Valuing Time over Money is Associated with Greater Happiness," *Social Psychological and Personality Science*, 7 (3), 213-222.

Whillans, Ashley V., Alice Lee-Yoon, and Elizabeth W. Dunn (2020), "Service Provider Salience: When Guilt Undermines Consumer Willingness to Buy Time," *Collabra: Psychology*, 6 (1), 28.

Whillans, Ashley V., Elizabeth W. Dunn, Paul Smeets, Rene Bekkers, and Michael I. Norton (2017), "Buying Time Promotes Happiness," *Proceedings of the National Academy of Sciences*, 114 (32), 8523-8527.

Willems, Kim, Annelien Smolders, Malaika Brengman, Kris Luyten, and Johannes Schöning (2017), "The Path-to-Purchase is Paved with Digital Opportunities: An Inventory of Shopper-Oriented Retail Technologies," *Technological Forecasting and Social Change*, 124, 228-242.

Wu, Tim (2018), "The Tyranny of Convenience," https://www.nytimes.com/2018/02/16/opinion/sunday/tyranny-convenience.html.

Living in Glass Houses: The Effect of Transparent Products on Self-Presentation

Ann Schlosser, University of Washington, USA
Evelyn Smith, University of Washington, USA

EXTENDED ABSTRACT

What does she keep in that thing?

A recent article about stadium bags (i.e., clear bags) being required at football games posed the above question and continued: "That particular question has been a source of mystery surrounding women's purses for decades. But now fashion trends—and the National Football League—are making it completely, well, clear" (Fitzgerald 2019). What is unclear is what effect transparent (i.e., visually clear) products have on consumer behavior. In particular, will it cause consumers to be more honest with others and/or to manage their impressions more?

Visual stimuli and imagery can significantly influence consumer behavior (e.g., Andrade et al. 2014; Elder and Krishna 2010; Elder et al. 2017; Ittersum and Wansink 2012). For example, a red (vs. blue) background can cause aggression, leading people to bid with larger jumps (Bagchi and Cheema 2012), and people favor unusual colors in marketing messages (Miller and Kahn 2005). Furthermore, people use products' visual appearances to manage their impressions on others, such as favoring larger logo sizes to show devotion to a brand (Wang and Griskevicius 2014).

Transparency as a visual design feature has been examined primarily in the food packaging literature (e.g., Cavallo and Piqueras-Fiszman 2017; Deng and Srinivasan 2013; Simmonds, Woods, and Spence 2019). For example, transparent packaging can increase food salience as well as consumption monitoring (Deng and Srivivasan 2013). Our research question is whether transparent products (such as transparent backpacks or shopping bags) automatically trigger self-presentation concerns, and if so, what type? This is an important question from a practical standpoint given that transparent products are fashionable (e.g., Givenchy's Transparent Windbreaker, Christian Louboutin's Just Nothing Slide Sandal) and even required at large stadium events (e.g., sports, concerts). This is also important theoretically because it contributes to our understanding of how visual transparency might automatically prompt different self-presentation tactics, including the nuances underlying creating a desirable impression by being honest or self-flattering.

Self-presentation is defined as "the goal-directed activity of controlling information to influence the impressions formed by an audience about oneself" (Schlenker and Wowra 2003, 871), and can take one of two forms: being socially transparent or socially impenetrable (Gilovich, Savitsky, and Medvec 1998; Gilovich, Medvec, and Savitsky 2000; Schlenker and Wowra 2003). On the one hand, transparent products may trigger social transparency. Social transparency occurs when people feel that their "internal states are more readily discernible by audiences than they actually are" (Schlenker and Wowra 2003, 874). This causes people to present themselves more honestly to avoid any negative social repercussions resulting from being discovered as dishonest (Schlenker and Leary 1982). On the other hand, transparent products may trigger social impenetrability, where people feel that "their thoughts and feelings are hidden from others" (Schlenker and Wowra 2003, 874). Under such circumstances, people manage the impression they have on others by presenting themselves in more self-flattering ways, even if these presentations are not entirely true. In fact, transparent (vs. opaque) products may cause consumers to feel more exposed to others' scrutiny, which may cause them to present themselves in ways that are more favorable. Notably, such self-presentation effects can occur automatically (Schlenker and Wowra 2003). We propose that product transparency will be such an automatic cue priming self-presentation. Importantly, how such self-presentation tactics manifest (i.e., to be honest or self-flattering) will depend on whether the self-presentation measure is indirect (self-presentation is inferred from someone's behavior without explicit instructions to report it) or a direct measure (self-presentation is assessed with explicit instructions to report it; Greenwald and Lai 2002, 420-421).

People tend to portray themselves in a flattering manner (e.g., never swearing or littering) both intentionally and unintentionally (Paulhus 2002; Holden and Passey 2010; Ziegler, MacCann, and Roberts 2011). Yet, detecting self-presentation can be challenging because sometimes people divulge true information about themselves (e.g., "I read a book a week" or "I work out every day") because it conveys a desirable impression (e.g., a bibliophile or athlete; Schlosser 2020). One common method used in psychology to detect a positive distortion is the overclaiming technique (Bruce and Trapnell 1995; Müller and Moshagen 2019; Paulhus et al. 2003). A benefit of this technique is that compared to other impression-management and self-deception measures, it is the most distinct indicator of positive distortion that is not confounded with personality and/or cognitive ability (Bensch et al. 2019).

With this technique, participants rate their familiarity with a series of topics, some of which are nonexistent. The nonexistent topics eliminate the possibility that answers reflect an honest response. This technique is an indirect measure because a flattering self-portrayal is inferred by observing whether participants overclaim their knowledge without explicitly telling participants that this is being assessed. We predict that if transparent products cause consumers to present themselves in more self-flattering ways when doing so is ostensibly not detectable (i.e., with an indirect measure), then they should present themselves in more self-flattering (rather than entirely honest) ways by overclaiming their knowledge. We test this prediction in the first two studies.

In Study 1, 223 MTurk participants were randomly assigned to see a transparent, semi-transparent, or opaque backpack image (the transparency manipulation). Specifically, all participants began by imagining that they were going to a sporting event and listing in an open-ended textbox all of the items they would bring. Participants then saw one of three backpacks. To reinforce the transparency manipulation, participants reported where they would put each personal item in the backpack's different compartments. Afterwards, as part of an ostensibly separate study, participants completed the physics category of the Over-Claiming Questionnaire (OCQ; Paulhus and Bruce 1990; Paulhus et al. 2003). To reduce participants' fatigue due to a lengthy questionnaire, we chose a single category. We selected physics because we believed it would be outside the areas of expertise of most of the MTurk (and later, business student) samples.

Overclaiming occurs when participants claim familiarity with nonexistent topics. As predicted, a significant transparency effect emerged ($F(2, 220) = 3.05$, $p = .050$; see Table for all means across studies). Overclaiming was greater for those in the transparent condition than the semi-transparent ($F(1,220) = 4.18$, $p = .042$) and opaque conditions ($F(1,220) = 4.99$, $p = .027$).

In Study 2, 212 undergraduates at a large university were randomly assigned to have direct experience with a transparent or opaque bag. Specifically, participants were told that the university

bookstore was considering selling the bag with the university's logo on it, but before doing so, it wanted students' opinions of the bag. Participants were informed that in order to get a better sense of the bag, they should place their personal items in the bag. In actuality, this was done to reinforce the transparency manipulation. While their belongings were in the bag, participants completed the OCQ. As in Study 1, overclaiming was greater for those using a transparent (vs. opaque) bag ($F(1,210) = 6.42$, $p = .012$). Thus, the results of Studies 1-2 suggest that when self-presentation is measured indirectly, consumers will exhibit greater impression management when using a transparent (vs. opaque) product.

In Study 3, we further test the effect of transparent products on self-presentation in two ways. First, we use both an indirect measure (OCQ) and a direct measure of self-presentation. Specifically, the direct measure involves explicitly asking participants to disclose personal information. If consumers are portraying themselves in a positive light with transparent (vs. opaque) products, then they should disclose more flattering information about themselves (e.g., what they are proud of) and less unflattering information (e.g., what they feel guilty about). However, if they are responding more honestly, we should observe more flattering and unflattering disclosures. Second, we varied the extent to which the context supports disclosing more personal details about themselves to others. We expect that when the context does not support disclosing personal details, a transparent (vs. opaque) product will cause consumers to portray themselves favorably on the indirect measure: to overclaim their knowledge (as observed in Studies 1-2). Furthermore, if the results generalize to direct measures, then they should also disclose more flattering (but not unflattering) information. However, when the communication partner speaks more honestly (i.e., disclosing personal information), then the differences between the transparent and opaque product should be attenuated for both flattering and unflattering disclosures. Indeed, it appears that even when interacting with computers, consumers disclose more when the computer discloses (vs. does not disclose) information about itself (Moon 2000).

To test the predicted interactive effect, 194 MTurk participants were randomly assigned to a condition in a 2 (transparency: transparent vs. opaque) × 2 (disclosure: disclose vs. control) design. Participants were shown a picture of a transparent versus opaque artificial intelligence (AI) speaker (the transparency manipulation) and were told to engage in a conversation with this speaker. We chose an AI speaker because we wanted to assess whether the effects were driven by (a) product transparency itself or (b) participants' personal belongings being observable to others. With the transparent speaker, only its inside mechanics were observable. Furthermore, we varied whether the AI speaker disclosed personal information about itself or not. The questions and information provided by the AI speaker were like that used in prior research (Moon 2000). More specifically, the AI speaker asked eight questions (e.g., "what are your favorite things to do in your free time?") after stating either a similar answer of itself (e.g., "When this speaker doesn't have any work to do, it usually just runs its energy saver program"), or a control paragraph with similar word counts (e.g., "The next question in this part asks about the different things you like to do in your spare time"). Number of disclosures in participants' answers were coded by two independent judges blind to the conditions (αs > .83 between judges' codings across the questions). Afterwards, participants completed the OCQ.

For responses to the OCQ, there was a significant transparency × disclosure interaction for overclaiming ($F(1,190) = 4.22$, $p = .041$). Specifically, in the control condition (i.e., when the AI speaker did not disclose any information), overclaiming was greater for those who spoke to a transparent (vs. opaque) AI speaker ($F(1,190) = 3.43$,

$p = .066$), consistent with the results of Studies 1-2. However, the effect was attenuated when the speaker behaved honestly by disclosing flattering and unflattering information about itself ($F(1,190) = 1.13$, $p = .289$).

For number of disclosures to the AI's questions, we observed more disclosures in the transparent (vs. opaque) condition ($F(1,190) = 4.45$, $p = .036$), although closer examination revealed that the effects were stronger in the control condition as predicted (see Table). Looking more specifically at each question, we find that the transparent speaker led to more proud disclosures ($F(1,190) = 5.32$, $p = .022$). However, participants also disclosed more in areas that are unflattering, such as what made them furious ($F(1,190) = 3.37$, $p = .068$), and what they felt guilty about ($F(1,190) = 5.80$, $p = .017$). Overall, the results suggest that when self-presentation is ostensibly undetectable (i.e., with an indirect measure), participants present themselves in a self-flattering way by overclaiming their knowledge, replicating the results of Studies 1-2. This effect was attenuated when they had recent experience favoring honesty (i.e., interacting with an honest AI speaker). Moreover, when self-presentation is more clearly detectable (i.e., with a direct measure), participants in the transparency (vs. opaque) condition are more honest (i.e., disclose flattering and unflattering information about the self).

In the final study, we examine further the nature of self-presentation by applying a social comparison framework. According to social comparison theory, an upward (vs. downward) social comparison occurs when consumers compare themselves to someone who is better (vs. worse) off than themselves (Buunk and Gibbons, 2007; Festinger 1954; Taylor, Wayment, and Carrillo 1996). Being a smart shopper is one important positive self-evaluation and the failure to do so is self-threatening (Argo et al. 2006; Schindler 1998). For example, after learning that they paid more than another consumer for the same product (an upward comparison), consumers might be honest by admitting to paying a higher price (an unflattering portrayal), or they might manage impressions by stating that they paid a lower price (a flattering portrayal). In other words, impression management is most likely to emerge when one's shopping ability is more threatened (i.e., when they paid more for the same product as someone else).

To test this, 303 MTurk participants were randomly assigned to a condition in a 2 (transparency: transparent vs. opaque) × 2 (comparison: upward vs. downward) design. For the transparency manipulation, participants saw a picture of a transparent or opaque shopping bag. All participants were told to imagine carrying their newly purchased bath towels in the pictured shopping bag while walking through the mall and the parking lot to their car where they run into a co-worker. Based on prior research (Argo et al. 2006), we told participants that their co-worker informs them that they just purchased the same new car as they did for a specific price, which was either lower (upward comparison) or higher (downward comparison) than the amount they paid. Participants recorded the price they would tell the co-worker that they paid. They also learned that the co-worker had purchased the same set of bath towels for a lower (vs. higher) price. Participants reported the towel prices they would disclose to the co-worker.

We standardized the car and towel prices and analyzed them as repeated measures in a mixed-design ANOVA. The transparency × comparison interaction was significant ($F(1,299) = 3.75$, $p = .054$). As predicted, those in the upward condition (i.e., those who paid a higher price than their co-worker) stated higher prices to their co-worker when their shopping bag was transparent than opaque (Ms = 1.06 vs. .88; $F(1,299) = 6.33$, $p = .012$). There was no transparency effect in the downward condition ($F(1,299) = .49$, $p = .483$).

To assess the degree of shift in the price disclosed to the co-worker, we subtracted the actual prices paid from the disclosed prices paid based on the social comparison direction. By doing this, we control for the higher actual price paid by the participant in the upward than downward condition. We then standardized the differences. Again we observed a transparency × comparison interaction $(F(1,299) = 3.68, p = .056)$. In the upward comparison condition, although all participants said they paid a lower price than they actually did, the degree of shift was smaller in the transparent than opaque condition, thereby reflecting greater honesty (Ms = -.22 vs. -.54; $F(1,299) = 11.69, p = .001$). Furthermore, as predicted, this effect was observed only when revealing the actual price paid would be unflattering: there was no transparency effect when participants paid less than their co-worker $(F(1,299) = .05, p = .819)$. Thus, when disclosures were unflattering, participants in the transparent (vs. opaque) condition were more honest, suggesting greater feelings of social transparency.

In summary, we find that transparent (vs. opaque) products trigger greater self-presentation behaviors but that the type of self-presentation depends on whether honesty (vs. impression management) is detectable. Consequently, transparent products can make consumers more socially transparent (honest) and more impenetrable (self-flattering).

REFERENCES

Aarts, Henk and Ap Dijksterhuis (2000), "Habits as Knowledge Structures: Automaticity in Goal-directed Behavior," Journal of Personality and Social Psychology, 78(1), 53.

Andrade, Heidi, Joanna Hefferen, and Maria Palma (2014), "Formative Assessment in the Visual Arts," Art Education, 67(1), 34-40.

Argo, Jennifer J., Katherine White, and Darren W. Dahl (2006), "Social Comparison Theory and Deception in the Interpersonal Exchange of Consumption Information," Journal of Consumer Research, 33(1), 99-108.

Bagchi, Rajesh, and Amar Cheema (2013), "The Effect of Red Background Color on Willingness-to-pay: The Moderating Role of Selling Mechanism," Journal of Consumer Research, 39(5), 947-960.

Bensch, Doreen, Delroy L. Paulhus, Lazar Stankov, and Matthias Ziegler (2019), "Teasing Apart Overclaiming, Overconfidence, and Socially Desirable Responding," Assessment, 26(3), 351-363.

Buunk, Abraham P., and Frederick X. Gibbons (2007), "Social Comparison: The End of a Theory and the Emergence of a Field," Organizational Behavior and Human Decision Processes, 102(1), 3-21.

Cavallo, Carla, and Betina Piqueras-Fiszman (2017), "Visual Elements of Packaging Shaping Healthiness Evaluations of Consumers: The Case of Olive Oil," Journal of Sensory Studies, 32(1), e12246.

Deng, Xiaoyan, and Raji Srinivasan (2013), "When do Transparent Packages Increase (or Decrease) Food Consumption?" Journal of Marketing, 77(4), 104-117.

Elder, Ryan S., and Aradhna Krishna (2010), "The Effects of Advertising Copy on Sensory Thoughts and Perceived Taste," Journal of Consumer Research, 36(5), 748-756.

Elder, Ryan S., Ann E. Schlosser, Morgan Poor, and Lidan Xu (2017), "So Close I Can Almost Sense it: The Interplay between Sensory Imagery and Psychological Distance," Journal of Consumer Research, 44(4), 877-894.

Eyal, Tal, Mary Steffel, and Nicholas Epley (2018), "Perspective Mistaking: Accurately Understanding the Mind of Another Requires Getting Perspective, not Taking Perspective," Journal of Personality and Social Psychology, 114(4), 547.

Festinger, Leon (1954), "A Theory of Social Comparison Processes," Human Relations, 7(2), 117-140.

Fitzgerald, Shannon (2019), "Behind the Rise in 'Stadium' Bags—and Why You'll be Needing One at Football Games This Fall", Fortune, September 1, 2019, https://fortune.com/2019/09/01/stadium-bags-football-games/

Gilovich, Thomas, Kenneth Savitsky, and Victoria Husted Medvec (1998), "The Illusion of Transparency: Biased Assessments of Others' Ability to Read One's Emotional States," Journal of Personality and Social Psychology, 75(2), 332.

Gilovich, Thomas, Victoria Husted Medvec, and Kenneth Savitsky (2000), "The Spotlight Effect in Social Judgment: an Egocentric Bias in Estimates of the Salience of One's Own Actions and Appearance," Journal of Personality and Social Psychology, 78(2), 211.

Greenwald, Anthony G., and Calvin K. Lai (2020), "Implicit Social Cognition," Annual Review of Psychology, 71.

Holden, Ronald R., and Jennifer Passey (2010), "Socially Desirable Responding in Personality Assessment: Not Necessarily Faking and Not Necessarily Substance," Personality and Individual Differences, 49(5), 446-450.

Miller, Elizabeth G., and Barbara E. Kahn (2005), "Shades of Meaning: the Effect of Color and Flavor Names on Consumer Choice," Journal of Consumer Research, 32(1), 86-92.

Moon, Youngme (2000), "Intimate Exchanges: Using Computers to Elicit Self-disclosure from Consumers," Journal of Consumer Research, 26(4), 323-339.

Müller, Sascha, and Morten Moshagen (2019), "True Virtue, Self-presentation, or Both?: A Behavioral Test of Impression Management and Overclaiming," Psychological Assessment, 31(2), 181.

Paulhus, Delroy L., M. Nadine Bruce, (1990), "Validation of the OCQ: A preliminary study," Paper presented at the annual convention of the Canadian Psychological Association, Ottawa, Ontario, Canada.

Paulhus, Delroy L., M. Nadine Bruce, and Paul D. Trapnell (1995), "Effects of Self-presentation Strategies on Personality Profiles and Their Structure," Personality and Social Psychology Bulletin, 21(2), 100-108.

Paulhus, Delroy L. (2002), "Socially desirable responding: The Evolution of a Construct," The Role of Constructs in Psychological and Educational Measurement, 49459.

Paulhus, Delroy L., Peter D. Harms, M. Nadine Bruce, and Daria C. Lysy (2003), "The Over-claiming Technique: Measuring Self-enhancement Independent of Ability," Journal of Personality and Social Psychology, 84(4), 890.

Schlenker, Barry R., and Mark R. Leary (1982), "Social Anxiety and Self-presentation: A Conceptualization Model," Psychological Bulletin, 92(3), 641.

Schindler, Robert M. (1998), "Consequences of Perceiving Oneself as Responsible for Obtaining a Discount: Evidence for Smart-shopper Feelings," Journal of Consumer Psychology, 7(4), 371-392.

Schlenker, Barry R., and Scott A. Wowra (2003), "Carryover Effects of Feeling Socially Transparent or Impenetrable on Strategic Self-presentation," Journal of Personality and Social Psychology, 85(5), 871.

Schlosser, Ann E. (2020), "Self-disclosure versus Self-presentation on Social Media," Current Opinion in Psychology, 31, 1-6.

Simmonds, Gregory, Andy T. Woods, and Charles Spence (2019), "'Shaping Perceptions': Exploring How the Shape of Transparent Windows in Packaging Designs Affects Product Evaluation," Food Quality and Preference, 75, 15-22.

Taylor, Shelley E., Heidi A. Wayment, and Mary Carrillo (1996), "Social Comparison, Self-regulation, and Motivation," Handbook of Motivation and Cognition, Vol. 3. The interpersonal context (p. 3–27), The Guilford Press.

Wang, Yajin, and Vladas Griskevicius (2014) "Conspicuous Consumption, Relationships, and Rivals: Women's Luxury Products as Signals to Other Women," Journal of Consumer Research, 40(5), 834-854.

Wansink, Brian, and Koert Van Ittersum (2012), "Fast Food Restaurant Lighting and Music can Reduce Calorie Intake and Increase Satisfaction," Psychological Reports, 111(1), 228-232.

Van Ittersum, Koert, and Brian Wansink (2012), "Plate Size and Color Suggestibility: The Delboeuf Illusion's Bias on Serving and Eating Behavior," Journal of Consumer Research, 39(2), 215-228.

Ziegler, Matthias, Carolyn MacCann, and Richard Roberts, (Ed.). (2011). New Perspectives on Faking in Personality Assessment, Oxford University Press.

Do Survey Invitations Affect Non-Respondents?

Kristina Schmidt, Aston University, UK
Walter Herzog, WHU, Germany
Maik Hammerschmidt, University of Goettingen, Germany
Vicki G. Morwitz, Columbia University, USA

EXTENDED ABSTRACT

Research on the "mere-measurement effect" (MME) shows that the mere act of participating in surveys can modify consumers' preferences and behaviors (Morwitz, Johnson, and Schmittlein 1993; Spangenberg et al. 2016). The present investigation suggests that the mere act of *not* participating in surveys can also affect consumers' preferences and behaviors. Specifically, we find that companies' survey invitations impair non-responding customers' attitudinal and behavioral loyalty. We label this effect the "survey effect for non-respondents" (SEN).

Several well-known schools of thought (e.g., Bem 1972; Lord and Lepper 1999) emphasize that "individuals assess their current attitudes in part by reference to the actions they have taken toward the attitude object in the past" (McIntyre et al. 2004, 1162). We thus anticipate that non-respondents might interpret their reaction to a company's survey invitation (e.g., for telephone surveys, the act of declining and hanging up) as a signal of their own (negative) attitude toward the company. Consequently, behavior-induced attitude construction predicts that survey invitations may impair non-respondents' attitudes and relational behaviors toward the company—i.e., a negative SEN.

Importantly, attitude construction theory also emphasizes that links from behavior to attitudes only develop when individuals *interpret* a particular behavior as a diagnostic manifestation of their attitudes (Schwarz and Bohner 2001). Hence, we conjecture that the negative link from nonresponse behavior to attitudes weakens if non-respondents do not interpret their nonresponse decision as resulting from their attitude toward the company, but from contextual factors (e.g., lack of time). We designed four experiments to test our predictions and to explore how companies can avoid the SEN.

Study 1 was a field experiment in which 1173 customers of a car manufacturer were randomly assigned to a survey condition (invitation to a satisfaction survey via telephone) or a control condition (no invitation). The dependent variable was repurchase probability. The results of a causal mediation model (cf. Jo 2008) revealed that the survey invitation reduced non-responding customers' repurchase probability by 7% ($p<.05$)—a negative SEN.

Furthermore, we asked interviewers to categorize non-respondents' reasons for not responding into context-related reasons (e.g., lack of time) versus other reasons. Non-respondents mentioning other reasons had a lower repurchase probability (32.8%) than control group members (44.9%; $\chi^2(1)=4.68$, $p<.05$). Non-respondents providing context-related reasons had a similar repurchase probability (41.1%) to control group members (44.9%; $\chi^2(1)=.19$, $p>.10$). These results are consistent with an attitude construction account.

Study 2 was designed to revalidate study 1 in a more controlled setting. It was a 2 (context salience high vs. low) x 2 (rejection of focus vs. control company survey) between-subjects experiment ($N=158$). In the first study part, subjects read a newspaper article designed to prime high versus low context salience. The article either focused on time pressure (high context salience) or a neutral topic (low context salience). In the second part, subjects read a scenario about the car manufacturer "Proton" and imagined owning a Proton. In the scenario, subjects had just returned home and were surfing the web. They then saw a cell phone screen displaying an incoming call and heard a ring tone playing in loop. When they took the call by clicking the answer button, subjects received a survey invitation from a market research institute calling on behalf of Proton (focus company) or their telecommunications provider (control company). We then asked subjects to write down how they would decline participating. The interviewer then said goodbye and subjects ended the call by clicking the hang up button. Finally, subjects reported their attitude toward the *focus* company (alpha=.97).

Results revealed a significant interaction effect ($F(1,154)=3.91$, $p<.05$): For low context salience, not responding to the survey of the focus (vs. control) company reduced subjects' attitude toward the focus company ($M_{control\_company}=6.11$, $M_{focus\_company}=5.62$; $F(1,154)=5.85$, $p<.05$)—a negative SEN. For high context salience, however, the SEN was absent ($M_{control\_company}=6.00$, $M_{focus\_company}=6.09$; $F(1,154)=.16$, $p>.10$). These results are consistent with study 1.

In *study 3a*, we tried to eliminate the SEN by manipulating interviewers' survey invitation. We conducted a 2 (context-related vs. neutral invitation) x 2 (rejection of focus vs. control company survey) between-subjects experiment ($N=101$). We used the same basic materials from study 2. However, in study 3a, we manipulated interviewers' survey invitation to highlight context factors ("Do you have a couple of minutes to participate in this survey?") or not ("Would you like to participate in this survey?"). Then subjects wrote down how they would decline the invitation of the focus versus control company and reported their attitude toward the *focus* company (alpha=.94).

Results revealed a significant interaction effect ($F(1,97)=5.87$, $p<.05$): For the neutral survey invitation, not responding to the survey of the focus (vs. control) company reduced subjects' attitude toward the focus company ($M_{control\_company}=6.12$, $M_{focus\_company}=5.35$; $F(1,97)=11.46$, $p<.01$)—a negative SEN. However, the context-related survey invitation eliminated the SEN ($M_{control\_company}=6.10$, $M_{focus\_company}=6.06$; $F(1,97)=.03$, $p>.10$).

Study 3a indicates that interviewers can proactively prevent the SEN. However, context-related invitations may provide a welcome excuse for consumers to decline survey invitations, thereby potentially decreasing response rates. Hence, we next investigated a reactive strategy which, by definition, cannot affect response rates.

In *study 3b*, we manipulated interviewers' reply after consumers had decided not to respond. We conducted a 2 (context-related reply vs. neutral reply) x 2 (rejection of focus vs. control company survey) between-subjects experiment ($N=163$). We used the same basic materials from studies 2 and 3a, but manipulated interviewers' reply to subjects' nonresponse statements to either highlight context factors ("…I apologize for the interruption, I totally understand that you don't have time right now. Have a nice day.") or not ("…Have a nice day."). Subjects' then reported their attitudinal loyalty toward the *focus* company (alpha=.93) as a closer proxy of behavioral loyalty (cf. study 1).

Results revealed a significant interaction effect ($F(1,159)=4.38$, $p<.05$): For the neutral reply, not responding to the focus (vs. control) company survey reduced subjects' attitudinal loyalty toward the focus company ($M_{control\_company}=5.39$, $M_{focus\_company}=4.53$; $F(1,159)=6.55$, $p<.05$)—a negative SEN. However, the context-related reply eliminated the SEN ($M_{control\_company}=5.01$, $M_{focus\_company}=5.12$; $F(1,159)=.12$,

p>.10). Overall, study 3b suggests that interviewers can eliminate the SEN even *after* consumers have declined to participate.

REFERENCES

Bem, Daryl J. (1972), "Self-Perception Theory," *Advances in Experimental Social Psychology*, 6, 1–62.

Jo, Booil (2008), "Causal Inference in Randomized Experiments with Mediational Processes," *Psychological Methods*, 13 (4), 314–36.

Lord, Charles G. and Mark R. Lepper (1999), "Attitude Representation Theory," *Advances in Experimental Social Psychology*, 31, 265–343.

McIntyre, Rusty B., René M. Paulson, Charles G. Lord, and Mark R. Lepper (2004), "Effects of Attitude Action Identification on Congruence between Attitudes and Behavioral Intentions toward Social Groups," *Personality and Social Psychology Bulletin*, 30 (9), 1151–64.

Morwitz, Vicki G., Eric Johnson, and David Schmittlein (1993), "Does Measuring Intent Change Behavior?" *Journal of Consumer Research*, 20 (1), 46–61.

Schwarz, Norbert and Gerd Bohner (2001), "The Construction of Attitudes," in *Blackwell Handbook of Social Psychology: Intraindividual Processes*, Abraham Tesser and Norbert Schwarz, eds. Malden, MA: Blackwell, 436–57.

Spangenberg, Eric R., Ioannis Kareklas, Berna Devezer, and David E. Sprott (2016), "A Meta-Analytic Synthesis of the Question-Behavior Effect," *Journal of Consumer Psychology*, 26 (3), 441–58.

A Sense of Who we Are: How TV Viewing Contributes to Negotiating Couple Identity

Julien Schmitt, ESCP, France
Mathilde Lapostolle, ESCP, France

EXTENDED ABSTRACT

"Before, to test if we could live together as a couple under the same roof, we used to adopt a cat or a dog; nowadays, we take out a Netflix subscription." In this observation, comedian Charline Voenenacker humorously encapsulates the importance that new digital TV platforms take in the everyday lives of romantic couples. A 2016 Netflix study shows that 72% of individuals feel that staying home and watching Netflix with their partners represents the ideal casual date night. This echoes the growing importance of TV viewing in consumer lives, and particularly the role played by new digital TV platforms in structuring everyday life and shaping social relationships (Feiereisen et al. 2019). Despite this increasing importance taken by digital TV in couples' consumption time, no research to date has explored how couples construct, negotiate, and enact their identity through shared (or unshared) TV viewing. Since, with digitalization, TV viewing has become more flexible and controlled by viewers, the practice configurations adopted by couples must inform much about the construction of their collective identity. The objective of this research is to investigate this process.

Existing research on couples' consumption is mostly based on a positivist and individualistic approach that focuses on topics such as how each individual partner participates in the decision or how they influence each other (Barlés-Arizón et al. 2013). The way a couple builds a collective identity through consumption is, however, largely overlooked. Yet, literature shows that people consume not only to benefit from products' utilities but also to enjoy their symbolic meanings, to create and sustain the self, and to locate the self in society (Wattanasuwan 2005). This is true both on an individual and collective level, as groups, including couples (Hickman-Evans et al. 2017), use market resources partly to construct, negotiate, and enact a collective identity (Lamont and Molnár 2001), particularly in the mundanity of everyday life such as TV viewing behavior (Edirisingha, Ferguson, and Aitken 2015). Therefore, in this research, we approach couples through the lens of family identity (Epp and Price 2008), seen as the collective enterprise, central to many consumption experiences, that defines "who we are as a family." We apply this concept to the context of couples in order to study "couple identity," by which we refer to "the partners' sense of who they are as a unit" (Miller and Caughlin 2013, 64). To this end, we do not consider a couple as the sum of its members' individual identities but as an integral consumption unit.

To investigate the construction, negotiation, and enactment processes of couples' identities through TV viewing, we focus on a specific type of content, TV series. This content is particularly well suited to study identity processes. First, TV series occupy an important place in couples' daily lives. Second, due to the serial dimension of this media, viewers tend to develop an important level of connectedness with TV series' characters and universes (Russell and Schau 2014). Third, this media is particularly affected by digitalization, which offers partners great flexibility in their viewing configurations (Watkins 2015). Drawing from a thematic analysis of 11 (seven individual and four collective) phenomenological interviews conducted with nine couples, we identify three processes through which informants negotiate their couple identity through TV series consumption:

- *Who is "we"* – This first process refers to the answers that partners give to the question "who do we want to be as a couple?" First, most couples spend a significant proportion of their shared time watching TV series. Therefore, the practice configuration adopted (for instance, the rituals surrounding the viewing activity) represents an important part of the shared experience constructed and meanings generated. Second, TV series viewing is charged with strong social stigma (i.e., passivity, isolation, or lowbrow culture). Therefore, the time allocated to this activity compared to other social or cultural occupations reflects a shared representation of what a "good" relationship should be made of.

- *How "we" works* – This second process represents the specific behavioral patterns that couples adopt to cope with certain contextual situations. First, with digitalization, TV series viewing is now one of the most adaptable activities in space and time. Therefore, couples can easily integrate this activity into the structure of their daily functioning and use it, for instance, to cope with irregular professional rhythms. This sometimes helps to overcome potential barriers to identity enactment. Second, TV series viewing practices also contribute to shaping couples' relational functioning and can even resolve conflicting situations, for instance by adopting solitary viewing when space and tranquility are required. With such coping strategies, tensions can arise from a misalignment between the negotiation of how "we" works and the pursued couple identity (who is "we").

- *Who am I within "we"* – This third process refers to the management of the interplay between the partners' individual identities and the collective performance of the couple's identity. Choosing among the plethora of available TV series is often a source of identity tension within couples as TV shows can be charged with strong stigma and contribute to shaping identities. Being a regular viewer of a specific TV show in order to please one's partner and fulfill the couple identity can threaten one's own individual identity. Specific coping strategies (distancing, implementing different rituals for these TV series, etc.) can allow the fulfillment of couple identity without endangering individual identities.

Our contribution is threefold. First, we help improve the understanding of the under-researched topic of couples' shared identity. Second, we show that Epp and Price's framework for family identity is well suited to the study of the construction, negotiation, and enactment processes of couple identity. Third, we extend this framework by identifying two additional moderating variables influencing the process of identity negotiation and enactment: individual conscience of couple identity (i.e., the degree of awareness a partner has of the fact that his/her couple has its own identity and of what he/she desires for the relationship) and social influence (i.e., the extent to which partners are influenced by social norms).

REFERENCES

Barlés-Arizón, María José, Elena Fraj-Andrés, and Eva Martínez-Salinas (2013), "Purchase Decision-Making in the Couple. Conflict-Solving Tactics," *International Journal of Business and Social Science,* 4 (June), 28-43.

Edirisingha, Prabash A., Shelagh Ferguson, and Rob Aitken (2015), "From 'me' to 'we': negotiating new family identity through meal consumption in Asian cultures," *Qualitative Market Research*, 18 (September), 477-96.

Epp, Amber M. and Linda L. Price (2008), "Family Identity: A Framework of Identity Interplay in Consumption Practices," *Journal of Consumer Research,* 35 (June), 50-70.

Feiereisen, Stéphanie, Dina Rasolofoarison, Kristine De Valck, and Julien Schmitt (2019), "Understanding emerging adults' consumption of TV series in the digital age: A practice theory-based-approach," *Journal of Business Research*, 95 (February), 253-65.

Hickman-Evans, Colette, Jesse P. Higgins, Ty B. Aller, Chavez J. et Piercy K.W. (2017), "Newlywed Couple Leisure: Couple Identity Formation Through Leisure Time, Marriage and Family Review," 54 (March), 105-127.

Lamont, Michèle and Virág Molnár (2001), "How blacks use consumption to shape their collective identity: Evidence from marketing specialists," *Journal of Consumer Culture*, 1 (March), 31-45.

Miller, Laura E. and John P. Caughlin (2013), "We're Going to be Survivors": Couples' Identity Challenges During and After Cancer Treatment," *Communication Monographs*, 80 (March), 63-82.

Russell, Cristel A. and Hope J. Schau (2014), "When Narrative Brands End: The Impact of Narrative Closure and Consumption Sociality on Loss Accommodation," *Journal of Consumer Research*, 40 (April), 1039-62.

Watkins, Rebecca (2015), "Conceptualising the ontology of digital consumption objects," in *Advances in Consumer Research*, Vol. 43, ed. *Kristin Diehl and Carolyn C. Yoon, Duluth, MN: Association for Consumer Research,* 275-81.

Wattanasuwan, Kritsadarat (2005), "The self and Symbolic Consumption," Journal of American Academy of Business, 6 (March), 179-84.

Twelve of One or a Dozen of the Other: How Numerical Expressions Influence Preferences

Gustavo Schneider, University of South Carolina, USA
Elise Chandon Ince, University of South Carolina, USA
Rajesh Bagchi, Virginia Tech, USA

EXTENDED ABSTRACT

Although extant research has considered the role of numbers on consumer decision making, past literature has mainly focused on framing effects using different numbers or quantities (Thomas and Morwitz 2005). Specifically, the focus has been on round (vs. precise) numbers of similar magnitude (Thomas et al. 2010; Yan and Pena-Marin 2017) or odd (vs. even) numbers (Wilkie and Bodenhausen 2012). In all these cases, although of similar magnitude, the numbers are objectively different.

In the current research, we focus on how to frame the *same* quantity using different formats, such as: 12-pack vs. a dozen pack of probiotics, memberships for 4 months vs. a semester. In these instances, a number (12) is compared to a numerical expression (dozen). We define numerical expressions as non-numerical quantifiers, such as pairs, trios, dozens, hours. Although numerical expressions represent a quantity, they do so without using an actual number such as 2, 3, 12, or 60 minutes, nor a written number such as twelve. We argue that written numbers, such as twelve, do not qualify as numerical expressions as they spontaneously elicit the number 12 itself and not a distinct non-numerical quantifier as the examples above. Numerical expressions, on the other hand, prompt consumers to focus on the collective unit (dozen, pair, trio, etc.), which can serve as a goal in and of itself. This is because, these numerical expressions appear complete and finite relative to their normatively equivalent values. While dozen appears bounded since there is no equivalent expression for 11 or 13, 12 does not suffer from the same constraint as it is part of a continuum (11, 12, 13, etc.). Consequently, we propose that consumers are more likely to aspire towards numerical expressions.

Prior research has shown that perceptions of completeness are malleable and influence consumer judgment for visual stimuli and numbers (Sevilla and Kahn 2014; Yan and Pena-Marin 2017). We similarly propose that consumers will perceive a quantity framed using a numerical expression (e.g., dozen bottles) to be more complete relative to the same quantity framed using numbers (e.g., twelve bottles). We argue that the increased perception of completeness will translate into an easier justification to purchase more or extend the duration of a planned service. We expect that the enhanced completeness when the offer is framed using numerical expressions will make it more easily justifiable, and therefore more likely to be preferred by consumers. We investigate these predictions in eight studies.

We contribute to this literature in two ways. First, focusing on numerical expressions allows us to examine new types of numerical frames (12 vs. dozen) never studied before. Second, in the current research we also investigate the role of numerical expressions when there is a change in the originally planned purchase or task duration (e.g., change from 11 to 12 vs. from 11 to a dozen).

In Study 1A, we demonstrate that participants are more likely to add a product to reach a dozen (vs. 12) products. In Study 1B we conceptually replicate our finding using a different numerical expression (detailed results available on Table 1).

In Study 2, we show that the proposed effect is unique to numerical expressions (e.g., dozen) and not general for written numbers (e.g., twelve) versus Arabic numerals (e.g., 12). Results revealed that when the offer was framed as dozen, participants were more likely to add the extra product compared to 12 and to twelve.

In Study 3, we provide evidence for the proposed underlying mechanism of completeness and justification. In this study, we asked students to imagine they were planning to buy a 3-month gym plan, then the gym associate offers them to add one more month to have a 4-month plan or a semester plan. As predicted, participants were more likely to extend the duration of their gym plan in the numerical expression condition, and a bootstrap analysis showed that the indirect effect of numerical expression on likelihood to add via completeness and justification was significant $CI_{95\%}$ [.090, .385].

In Study 4, we test a boundary condition of the effect, namely when a numerical expression itself is incomplete (i.e., part of a semester). We replicate the findings from previous studies in the complete expression condition (more likely to extend membership to semester rather than 4-month plan). However, when the numerical expression was incomplete there was no difference in likelihood to add the extra month between part of semester or 2-month membership. Confirming our expectations, a bootstrap analysis revealed a significant index of moderated mediation

In our final set of studies, we provide evidence that consumers are also willing to pay more for offers framed using numerical expressions and that restaurants and online retailers put a premium on products framed using numerical expressions. In Study 5, we show that consumers are willing to pay more for kitchen utensils framed using a numerical expression relative to an equivalent number. In Study 6, we compared actual restaurant menu prices (6A) and Amazon products (6B) and find that items described using numerical expressions sell for an average higher price compared to items described using equivalent numbers.

In this research, we unveil a novel type of numerical framing, namely: numerical expressions. We find evidence that consumers are more likely to include additional products or extend the duration of a service when the offer is framed using numerical expressions (vs. the equivalent number). On the theoretical side, we expand prior research on the role of units, we show that numerical expressions increase perceptions of offer completeness, we empirically test the link between completeness and justification, and show that numerical expressions also serve as consumption goals. From a managerial standpoint, our results offer insights on how managers can frame their offerings when they have the possibility of using numerical expressions. We show that these effects are consistent across different types of numerical expressions (i.e., numbers, time, units) and purchase contexts.

REFERENCES

Bettman, James R., Mary Frances Luce, and John W. and Payne (1998), "Constructive Consumer Choice Processes," *Journal of Consumer Research*, 25 (3), 187-217.

Sevilla, Julio, and Barbara E. Kahn (2014), "The Completeness Heuristic: Product Shape Completeness Influences Size Perceptions, Preference, and Consumption," *Journal of Marketing Research*, 51 (1), 57-68.

Thomas, Manoj, Daniel H. Simon, and Vrinda Kadiyali (2010), "The Price Precision Effect: Evidence from Laboratory and Market Data," *Marketing Science*, 29 (1), 175-190.

Thomas, Manoj, and Vicki Morwitz (2005), "Penny Wise and Pound Foolish: The Left-Digit Effect in Price Cognition," *Journal of Consumer Research*, 32 (1), 54-64.

Wilkie, James E., and Galen V. Bodenhausen (2012), "Are numbers gendered?," *Journal of Experimental Psychology: General*, 141 (2), 206-210.

Yan, Dengfeng, and Jorge Pena-Marin (2017), "Round Off the Bargaining: The Effects of Offer Roundness on Willingness to Accept," *Journal of Consumer Research*, 44 (2), 381-395.

Seeing and Believing: A Performative Perspective on Augmented Reality

Joachim Scholz, Brock University, Canada

EXTENDED ABSTRACT

Existing AR research predominantly adopts cognitive perspectives when analyzing augmented reality product visualization apps. The current paper offers researchers a new set of eyes by developing a performative perspective on AR. This novel perspective provides a more nuanced and substantially broadened assessment of augmented reality's potential for marketing and retailing.

Over the last few years, many brands have launched augmented reality product visualization (ARPV) apps to help consumers imagine how furniture, appliances, clothing, makeup, and other products will look like in their own spaces or on their own bodies. Prior research has examined how ARPV apps impact consumers' responses to products (e.g., Beck and Crié 2018; Hilken et al. 2017; Yim, Chu, and Sauer 2017) and relationships with brands (e.g., Huang 2019; Scholz and Duffy 2018). While this research has demonstrated AR's potential for marketing, the current paper argues that many more benefits can be identified through a shift in analytical perspectives.

Existing AR research typically adopts cognitive perspectives to examine how ARPV apps help consumers process abstract information when evaluating and selecting products for purchase. In contrast, the current study adopts a performative perspective to examine how ARPV apps facilitate consumers in their ongoing and multi-faceted consumption projects (e.g., Maciel and Wallendorf 2017). Guided by a practice theory lens (Schatzki 1996) and through a market ethnography of makeup consumers, it explores how ARPV apps help consumers become capable practitioners of everyday practices. In particular, the following two research questions are examined: (1) How do augmented reality product visualizations relate to the various components of practice performances (i.e., objects, doings, and meanings)? And (2) how can ARPV apps help consumers become and feel like capable practitioners through reducing the complexity of a practice, validating consumers' performances, or any other means?

The findings of this study contribute to AR research by providing a more nuanced and also broadened assessment of AR's potential for marketing and online retailing.

Theory background: Cognitive perspective on AR

Augmented reality, and ARPV apps more specifically, overlay three-dimensional digital simulations of products onto consumers' physical bodies or their physical environments in real time (Scholz and Smith 2016). ARPV apps have been found to make product selection easier, more interesting, and perceived to be less risky (e.g., Beck and Crié 2018; Huang and Liu 2014; Javornik 2016b). ARPV apps have also been linked to higher purchase and word-of-mouth intentions (e.g., Hilken et al. 2017; Poushneh and Vasquez-Parraga 2017; Yim, Chu and Sauer 2017).

These benefits of ARPV apps are often explained by showing how embedding information in consumers' immediate environments — the defining property of augmented reality (Javornik 2016a; Scholz and Smith 2016) — reduces the mental burden consumers face when evaluating products. Consumers who examine AR product visualizations are more immersed in the task (Javornik 2016b; Yim, Chu, and Sauer 2017) and feel more at ease with their decisions (Hilken et al. 2017), compared to web-based product representations. Drawing on situated cognition theory, which states that information processing occurs within physical environments and can be aided by bodily factors (Robbins and Aydede 2009), Hilken and colleagues

(2017) show that ARPV apps offer a more intuitive way to process information.

It is important to note that 'embodiment', in this conceptual lens, refers to how consumers utilize their bodies whilst processing product information (Barsalou 2008; Brown, Collins and Duguid 1989). Using ARPV apps, consumers can apply the same physical movements to evaluate product simulations as they would when assessing actual material products (i.e., simulatedphysical control; Hilken et al. 2017). Such naturalistic movements can lead to perceptual re- enactments of previous, actual product experiences that have been stored in memory (Petit, Velasco, and Spence 2019). In other words, the situated cognition perspective conceptualizes AR as a decision-making tool (Porter and Heppelmann 2017) that facilitates consumers' understandings of abstract product characteristics through a superior visual format.

While informative for immediate decision situations, the cognitive perspective does not capture the full potential of ARPV apps for at least two reasons: First, attention is focused on AR's benefit for evaluating product attributes (i.e., a product-centric approach). As has been pointed out by prior research, it is also important to understand the wider impact of AR across all stages of the customer-decision journey (Hilken et al. 2018; Javornik 2016a). This includes a deeper understanding of how consumers actually use AR applications (Scholz and Duffy 2018) as part of their consumption behaviors (i.e., a customer-centric approach). Second, research in psychology (e.g., Pouw and Looren de Jong 2015) and marketing (e.g., Yakhlef 2015) has pointed out that the cognitive perspective — even in its 'situated' incarnation — is still premised on a Cartesian thinking subject.

In contrast to the situated cognition perspective, which construes the body as a physical apparatus for thinking (Schürkmann 2013; Pouw and Looren de Jong 2015), a performative perspective focuses on consumers' 'embodied experiences' that unfold as they actively and continuously engage with the world and objects around them (Heidegger 1968; Merleau-Ponty 1962). Focusing on 'embodied experiences', rather than 'embodied cognition', directs attention to the material and bodily practices through which consumers experience their world in a holistic manner (Yakhlef 2015). Such a performative perspective enables researchers to adopt an alternative, customer-centric approach to AR by examining how ARPV apps facilitate consumers in their embodied routines and ongoing, complex consumption projects.

Lens: Performative perspective on AR

Practice theory (Schatzki 1996; Warde 2005), which highlights the complex relationships between consumers' minds, bodies, things, and cultural meaning systems, provides a theoretical lens for this research. Practices are defined as "routinized types of behavior" (Reckwitz 2002, p. 249) that combine bodily and mental activities. Attaining abstract knowledge about product characteristics thus remains important, but so is cultivating practical knowledge (Schatzki 1996), cultural competence (Maciel and Wallendorf (2017), and an embodied and unarticulated sensibility (Phipps and Ozanne 2017) of how and when to use things. Consumers, in this theoretical lens, are thus not simple buyers of products; rather, they are seen as practitioners who assemble various components of a practice — commonly consolidated into objects, doings, and meanings (Maggauda 2011)

— into a configuration that aligns with a discursively constructed normative system, called a taste regime (Arsel and Bean 2013).

The habitual embodiment of a taste regime is something that must be continuously achieved (Watson and Shove 2008; Wenger 1998). Consumers often worry that their own practice performances may be insufficient or incongruent with the normative system laid out by the taste regime (Arsel and Bean 2013; Entwistle 2000). Thus, consumers benchmark their performances against shared standards, engage in deliberate sampling and experimentation, and interact directly with other practitioners in order to confirm their status of being capable practitioners (Maciel and Wallendorf 2017).

Consumers also frequently draw on market-mediated resources, such as online communities and websites (e.g., Arsel and Bean 2013), to improve their practice performances. ARPV apps present an additional yet hitherto unexamined marketing touchpoint for consumers to orient and improve their practice performances. The current research thus leverages practice theory to gain insights into consumers' holistic and embodied consumption experiences, which in turn provide the foundation for analyzing how ARPV apps can facilitate consumers in their quest of becoming capable practitioners.

Empirical Context and Methodology

This study employs a market ethnography of beauty consumers. Data collection proceeded in two phases: In phase one, 31 millennial, female consumers were recruited to use the AR components within Sephora's ARPV app. Up to three rounds of mini-interviews were conducted over a period of 4 weeks. The mini-interviews ensured informants continued to use the ARPV app. Furthermore, the mini-interviews produced data regarding informants' inspirations, techniques, purchasing habits, and in-situ experience of using the ARPV app. Phase one resulted in 68 mini-interviews that lasted, on average, about 4 minutes.

This data shaped phase two, in which 16 informants from the initial group of 31 were selected (i.e., those who completed all tasks during phase one) to conduct depth interviews. Interviews lasted, on average, 1.25 hours and were transcribed verbatim, resulting in 418 pages of transcripts (1.5-spaced, 12-font). All data were analyzed using a hermeneutical approach that compared commonalities and differences in informant's responses and perceptions until saturation was reached (Arnold and Fischer 1994; Thompson 1997).

Findings

The study's findings show how ARPV apps can help consumers cultivate confidence, competence, and creative control as they pursue complex consumption projects (see Table and Figure). At the center of such customer-centric analysis lies an understanding of the core tensions consumers face (Richardson 2010). In the current context, consumers want to expand their own individual 'look' by incorporating new trends, but they worry whether their makeup performances are executed in technically proficient and socially acceptable ways (see inner triangle in Figure). There is a certain "line" they believe they must not cross, because if they do they would be perceived as "looking funny" (Lisa). This struggling for actualizing their desire for experimentation serve as the anchoring point to examine how the ARPV app helps consumers become capable practitioners.

The next three themes (see circles around the outer triangle's corners in Figure) discuss how the ARPV app helps consumers gain abstract and practical knowledge about products (i.e., objects), techniques (i.e., doings), and styles (i.e., meanings). With regards to selecting products (theme 2), the ARPV app provides consumers with *visualization* of how a certain shade or color will look like within the consumption constellation of their own faces. In contrast

to other marketing touchpoints (e.g., social media influencers), the ARPV app provides consumers with more accurate and personally tailored information about "whether or not a makeup 'look' will look good" on them (Allison). However, the *immateriality* of AR makes informants wonder about "how realistic" (Fiona) product simulations really are.

To successfully perform their makeup 'looks', consumers also must skillfully execute routines and correctly use a variety of tools. With regards to executing such techniques (theme 3), the ARPV app provides consumers with *deconstruction* and *confirmation*. Visual clues show "exactly where to put things so it's really easy to follow" (Lisa). Through deconstructing the complexity of a technique via step-by-step instructions that can be completed at "your own pace" (Lydia), the ARPV app helps even less experienced consumers learn new 'looks'. More importantly, the ARPV app provides external and even objective confirmation that consumers have executed a technique competently "because it tells you exactly where to fill in" (Abby).

Appropriating various makeup styles from a constantly evolving repertoire is the creative core of one's 'look.' The ARPV app provides *articulation* (theme 4) by allowing consumers to create a 'look' from the ground-up, based on their own vision and through playful experimentation.

Kacey notes that "you get more room to play around with [the ARPV app], because you aren't trying to replicate a 'look' that was already on someone else." The ARPV app thus supports informants' desire for a self-revealing and rapid-prototyping process that allows them to explore and play with different versions of themselves. Even informants who are intimidated by makeup are able to bring out their "punky side" (Chloe). The ARPV app thus provides informants with feelings of autonomy and creative control.

Discussion

Adopting a performative perspective clarifies and broadens the potential of augmented reality. Prior research has mostly examined how ARPV apps affect consumers' attitudes and behavioral intentions through visualizing a single product (e.g., Hilken et al. 2017; Javornik 2016b; Yim, Chu, and Sauer 2017). Expanding on these findings, the current study demonstrates that consumers derive value from ARPV apps because they can group together multiple virtual and actual products in a consumption constellations (Solomon 1983). AR's ability to bridge this *constellation-imagination gap* may provide customer value that remains relevant even after the initial novelty of AR has worn off (Yim et al. 2017) and that appeals to consumers who prefer visual information processing styles (Hilken et al. 2017); however, these issues need to be further tested through empirical research.

More importantly, this study broadens AR's potential for marketing by introducing the *competence gap* (i.e., receiving confirmation about the correct execution of techniques; theme 3) and the *autonomy gap* (i.e., feeling creatively in control when articulating styles; theme 4). From a performative perspective, augmented reality is more than just a tool that lets consumers *see* products *on themselves*: AR provides opportunities for consumers to *believe in themselves* and construct their own selves more playfully and autonomously. Additional research is needed to more fully explore this broader potential. For example, future research can examine how ARPV apps that augment spaces rather than faces can also help consumers to feel more confident in their domestic consumption projects. Aside from visualizing products, augmented reality can also be used to simulate certain doings (e.g., blood donation simulation by Britain's National Health Service). Future research can explore

how simulating doings (versus objects) impact associated meanings and actual behavior. Altogether, research that adopts performative perspectives would broaden our understandings of what value this emerging marketing touchpoint provides to consumers and marketers.

The performative perspective employed here also highlights an important shortcoming of ARPV apps that has been downplayed by prior research: AR's inherent lack of materiality. Prior research often implies a near-equivalency between simulated and actual experience by suggesting, for example, that consumers may "feel that they are actually trying on […] a pair of sunglasses" (Hilken et al. 2017, p. 92). This may be due to situated cognition's focus on forming world-mirroring mental representations through bodily movements (Pouw and Looren de Jong 2015). However, oversimplifying differences between simulated and physical experiences is problematic, at least in the online retailing sector. 'Embodiment' is a multi-faceted term, as the above discussion has shown. In order to arrive at a more nuanced understanding of AR's value in marketing, it is necessary to explore how AR facilitates (or does not) consumers' actual and embodied experiences with material artifacts. In the retailing sector, the lack of materiality is an issue for selecting products, but it becomes an asset for executing techniques and (especially) articulating styles.

For practitioners, this study's findings have important implications of how to leverage AR in their marketing strategies. Helping consumers believe in themselves, through increasing their competence in certain activities (i.e., bridging the competence gap) and enabling them to take creative control over their own self-explorations (i.e., bridging the autonomy gap), presents enormous and mostly untapped opportunities. For example, in the automotive sector, AR is typically used to bridge the constellation-imagination gap (e.g., enabling consumers to customize cars via displaying life-sized three-dimensional virtual models in specially designed showrooms, or smaller models via AR print ads). Future applications could close the autonomy gap by displaying life-sized virtual models in consumers' own driveways and by letting consumers peek through a virtual windshield onto the actual, physical world around them. ARPV apps like these would convey the experience of owning the car, rather than mere product information, which can help consumers feel in creative control and more confident in their consumption choices. Other AR apps that are integrated into the actual car's windshield, for example to assist whilst parking, would furthermore bridge the competence gap.

Conclusion

By adopting a performative perspective, this research encourages academics and practitioners to view augmented reality with a new set of eyes: Looking through the lens of practice theory, the biggest potential of this emerging touchpoint might lie less in enabling consumers to *see products on* themselves, but to *believe in* themselves.

REFERENCES

Arnold, Stephen J. and Eileen Fischer (1994). "Hermeneutics and Consumer Research," *Journal of Consumer Research*, *21*, 55-70. doi: 10.1086/209382

Arsel, Zeynep and Jonathan Bean (2013). "Taste regimes and market-mediated practice," *Journal of Consumer Research*, *39*(5), 899-917. doi: 10.1086/666595

Barsalou, L. W. (2008). "Grounded cognition." *Annual Review of Psychology*, 59, 617-45. doi:10.1146/annurev.psych.59.103006.093639

Brown, John Seely, Collins, Allan, and Duguid, Paul (1989). "Situated Cognition and the Culture of Learning," *Educational Researcher*, 18(1), pp. 32-42

Beck, Marie and Dominque Crié (2018). "I virtually try it… I want it! Virtual Fitting Room: A tool to increase on-line and off-line exploratory behavior, patronage and purchase intentions," *Journal of Retailing and Consumer Services*, Vol 40. 279-286. doi: 10.1016/j.jretconser.2016.08.006

Heidegger, M. (1968). *Being and time* (J. Macquarrie & E. Robinson, Trans.). New York, NY: Harper & Row. (Original work published 1962)

Hilken, Tim, Ko de Ruyter, Matthew Chylinski, Dominik Mahr, and Debbie I. Keeling (2017). "Augmenting the Eye of the Beholder: Exploring the Strategic Potential of Augmented Reality to Enhance Online Service Experiences," *Journal of the Academy of Marketing Science*, *45*, 884-905. doi: 10.1007/s11747-017-0541-x

Huang, TL (2019). "Psychological mechanisms of brand love and information technology identity in virtual retail environments," *Journal of Retailing and Consumer Services*, 47, 251- 264.

Huang, Tseng-Lung and Hsu Liu Feng (2014). "Formation of Augmented-reality Interactive Technology's Persuasive Effects From the Perspective of Experiential Value," *Internet Research*, 24(1), 82-109. doi: 10.1108/IntR-07-2012-0133

Javornik, Ana (2016a). "Augmented reality: Research agenda for studying the impact of its media characteristics on consumer behaviour," *Journal of Retailing and Consumer Services*, 30, 252–261. doi: 10.1016/j.jretconser.2016.02.004

Javornik, Ana (2016b). "'It's an illusion, but it looks real!' consumer affective, cognitive and behavioural responses to augmented reality applications," *Journal of Marketing Management*, *32*(9-10), 1–25. doi: 10.1080/0267257X.2016.1174726

Maciel, Andre F. and Melanie Wallendorf (2017). "Taste Engineering: An Extended Consumer Model of Cultural Competence Constitution," *Journal of Consumer Research*, *43*(5), 726– 746. doi: 10.1093/jcr/ucw054

Magaudda, Paolo (2011). "When materiality 'bites back': Digital music consumption practices in the age of dematerialization," *Journal of Consumer Culture*, 11(1), 15-36. doi: 10.1177/1469540510390499

Merleau-Ponty, M. (1962). *Phenomenology of perception* (C. Smith, Trans.). London, UK: Routledge and Kegan Paul.

Petit, O., Velasco, C., and Spence, C. (2019). "Digital sensory marketing: Integrating new technologies into multisensory online experience," *Journal of Interactive Marketing,* 45, 42-61.

Phipps, Marcus and Julie L; Ozanne (2017). "Routines Disrupted: Reestablishing Security through Practice Alignment," *Journal of Consumer Research*, 44(2), 361-380. doi: 10.1093/jcr/ucx040

Porter, Michael E. and James E. Heppelmann (2017). "A Manager's Guide to Augmented Reality," *Harvard Business Review*, *95*(6), 45-57.

Poushneh, Atieh and Arturo Z. Vasquez-Parraga (2017). "Discernible impact of augmented reality on retail customer's experience, satisfaction and willingness to buy," *Journal of Retailing and Consumer Services*, *34*, 229-234. doi: 10.1016/j.jretconser.2016.10.005

Pouw, W. and Looren De Jong, H. (2015). "Rethinking situated and embodied social psychology." *Theory and Psychology*, 25, 411-433.

Reckwitz, Andreas (2002). "Toward a theory of social practices: A development in culturalist theorizing," *European Journal of Social Theory*, 5(2), 243-263. doi: 10.1177/1368431002005002005

Richardson, Adam (2010). "Understanding Customer Experience," retrieved June 21, 2017, from https://hbr.org/2010/10/understanding-customer-experie

Robbins, Philip Ed, and Murat Ed Aydede (2009). *The Cambridge handbook of situated cognition*. Cambridge University Press, New York, NY, pp. 3-10.

Schatzki, Theodore R. (1996). *Social practices: A Wittgensteinian approach to human activity and the social*. Cambridge University Press.

Scholz, Joachim and Katherine Duffy (2018)."We ARe at home: How augmented reality reshapes mobile marketing and consumer-brand relationships." *Journal of Retailing and Consumer Services,* 44: 11-23.doi: doi.org/10.1016/j.jretconser.2018.05.004

Scholz, Joachim and Andrew N. Smith (2016). "Augmented reality: Designing immersive experiences that maximize consumer engagement," *Business Horizons*, 59(2), pp.149-161. doi: 10.1016/j.bushor.2015.10.003

Schürkmann, Christiane (2013). "The fragile and the silent Site – Practice theory and the phenomenology of Merleau-Ponty," accessed at https://www.ihs.ac.at/conferences/practices/files/Schuerkmann_abstract.pdf.

Solomon, Michael (1983). "The Role of Products as Social Stimuli: A symbolic Interactionism Perspective," *Journal of Consumer Research*. *10*(3), 319-329. doi: 10.1086/208971

Thompson, Craig J. (1997). "Interpreting Consumers: A Hermeneutical Framework for Deriving Marketing Insights from the Texts of Consumers' Consumption Stories," *Journal of Marketing Research*, *34*(4), 438-455. doi: 10.2307/3151963

Warde, Alan (2005). "Consumption and theories of practice," *Journal of Consumer Culture*, 5(2), 131-153. doi: 10.1057/978-1-137-55682-0_5

Yakhlef, A. (2015). "Customer experience within retail environments: An embodied, spatial approach," *Marketing Theory*, 15(4), 545-564. doi:10.1177/147059311556901

Yim, Mark Y-C., Shu-Chuan Chu, and Paul L. Sauer (2017). "Is Augmented Reality Technology an Effective Tool for E-commerce? An Interactivity and Vividness Perspective," *Journal of Interactive Marketing*, *39*, 89-103. doi: 10.1016/j.intmar.2017.04.001

How Choosing for Others Impacts Self-Indulgence Within Caregiving Relationships

Anika Schumacher, Grenoble École de Management, France
Caroline Goukens, Maastricht University, The Netherlands
Kelly Geyskens, Maastricht University, The Netherlands

EXTENDED ABSTRACT

Taking care of close others or being taken care of as a child is a central aspect of human life.

As soon as we are born, we depend on the care provided by our primary caregivers. Later in life, it is our turn to take care of children, aging parents, or pets. There are over 63 million families with children under the age of 18 in the United States (US Census 2019) and 34.2 million Americans reported providing unpaid care to an adult aged 50 or older in 2015 (National Alliance for Caregiving and AARP 2015). Furthermore, 68% of American households own at least one pet (APPA 2018).

Despite this omnipresence of caregiving and care-receiving in our lives, relatively little is known about how taking care of others or receiving care provided by others influences our consumption behavior.

In this research, we draw on literature on caregiving, moral licensing and consistency behavior and suggest that within caregiving relationships, the relationship between virtuous other-oriented deeds and subsequent self-indulgence depends on the chooser's care-role within the relationship.

Caregiving implies providing nurturance and protection to a dependent, vulnerable care-receiver. Good caregiving has been considered a moral experience (Kleinman 2012, 2013). Furthermore taking responsibility and acting in the best long-term interest of a care-receiver is often defining the caregiver's identity (Bhattacharjee, Berger, and Menon 2014). Care-receivers are often integrated into the caregiver's self-concept (Brummelman et al. 2013; Thai et al. 2019). Providing care for care-receiving others may thus serve to boost one's moral self-concept. In line with literature on moral licensing, we thus expect that caregivers who make a virtuous (compared to vice) consumption choice for a care-receiving close other are more likely to self-indulge thereafter.

Conversely, we predict that for care-receivers, making virtuous choices for their caregiver will not lend itself to license self-indulgence. Care-receivers are dependent on the caregiver for protection, nurturance, and support (Bornstein 1992). To secure care and maintain a nurturing relationship with the caregiver, the care-receiver usually complies with the caregiver (Bornstein 1992; Overall and Sibley 2008; Vaish, Hepach, and Tomasello 2018). Thus, it is likely that care-receiving others act consistently with their caregiver's inferred health goal and use consumption in service of affiliation (Lee and Shrum 2012; Mead et al. 2011). We thus expect—in line with behavioral consistency—that care-receiving others are less likely to self-indulge after making a virtuous (compared to vice) choice for a caregiver.

In the following, we present four studies in which we asked participants to make a food choice for a care-receiving other (i.e., a child, a pet), or a caregiving other (i.e., a parent) respectively, and study how this initial other-oriented choice impacts the chooser's subsequent personal consumption behavior.

In **study 1**, we consider a common consumption dilemma between indulgent foods (vice choice) and healthy foods (virtuous option; Vohs and Heatherton 2000). We recruited seventy parents in a kindergarten and asked them to choose between gummy worms (unhealthy snack) or grapes (healthy snack, Fedorikhin & Patrick, 2010). After making their choice, parents completed a chocolate tast-

ing. The amount of chocolate consumed served as dependent measure of self-indulgence. Parents who first chose the virtuous product (grapes) for their child subsequently consumed significantly more chocolates ($M = 56.55$, SD = 30.19) than parents who chose the vice product (gummy worms) for their child ($M = 36.80$, SD = 30.12; $t(68) = 2.74$, $p = .01$, $d = 0.66$), in support of our predictions. In an additional **study 1b** we replicated these effects with 56 dog owners. Dog owners who chose the healthy treat for their dog were subsequently more likely to choose the chocolate bar (vice option) for themselves than dog owners who chose the unhealthy treat for their dog ($\chi^2(1) = 5.19$, $p = .02$, table 1).

In **study 2**, we investigated the downstream consequences of making a virtuous other-oriented choice among care-receivers. Specifically, we asked 118 undergraduate students (care-receivers) to make a choice between two restaurant vouchers for their parents: A "chain of restaurants which serves healthy foods"(virtuous option) and a "chain of pure indulgence"(vice option). Undergraduate students are often dependent on their parents – especially financially (Goudreau 2011; Hughes et al. 2018; Kahn, Goldscheider, and García-Manglano 2013; Schneider 2000). Similar to study 1, the amount of chocolate consumed in a subsequent chocolate tasting served as dependent measure. Students who made a virtuous choice for their parent consumed significantly less chocolates than students who chose the vice option ($t(1,113) = 2.23$, $p = .03$, $d = 0.45$).

In **study 3**, a framed field study, we recruited 204 caregiver-care-receiver (parent-child) dyads (n = 408) and randomly assigned the dyads to one of three choice conditions in a 3(no choice, healthy choice, unhealthy choice) x 2(caregiver vs. care-receiver role) between-subjects design with choice manipulated and care role measured (caregiving parent/care-receiving child).

A linear mixed model (LMM) analysis yielded a significant Other-Oriented Choice x Care Role interaction effect ($F(2, 402) = 6.68$, $p = .001$, $\eta_p^2 = .032$). Caregiving parents displayed a higher relative preference for vice products after making a virtuous choice for their child than after making no initial choice ($t(1, 402) = -1.79$, $p = .037$), or after choosing the vice option ($t(1, 402) = -2.178$, $p = .015$). Conversely, care-receivers (prospective students) who had made an initial virtuous healthy choice for their parents displayed a significantly lower relative preference for the vice consumption options than care-receivers who had not made an initial other-oriented choice ($t(1, 402) = -2.10$, $p = .018$) or initially had chosen a vice option for their parents ($t(1, 402) = -1.28$, $p < 0.10$). Controlling for age did not change the results ($F(2, 397) = 7.38$, $p = .001$).

Our findings shed light on how interpersonal dynamics and choices in social relationships—and familial caregiving relationships in particular—impact self-regulation (Fitzsimons and Bargh 2003; Fitzsimons and Finkel 2011; Hofmann, Finkel, and Fitzsimons 2015) by identifying role of the chooser (caregiver vs. care-receiver) as an important moderator of licensing/consistency effects.

REFERENCES

APPA (2018), "US Pet Ownership Statistics," Retrieved from: https://www.dailydogstuff.com/us-pet-ownership-statistics/

Bhattacharjee, Amit, Jonah Berger, and Geeta Menon (2014), "When Identity Marketing Backfires: Consumer Agency in Identity Expression," *Journal of Consumer Research*, 41 (2), 294-309.

Bornstein, Robert F. (1992), "The Dependent Personality: Developmental, Social, and Clinical Perspectives," *Psychological Bulletin*, 112 (1), 3-23.

Brummelman, Eddie, Sander Thomaes, Meike Slagt, Geertjan Overbeek, Bram Orobio de Castro, and Brad J.

Bushman (2013), "My Child Redeems My Broken Dreams: On Parents Transferring Their Unfulfilled Ambitions onto Their Child," *PloS One*, 8 (6), 653-60.

Fedorikhin, Alexander and Vanessa M. Patrick (2010), "Positive Mood and Resistance to Temptation: The Interfering Influence of Elevated Arousal," *Journal of Consumer Research*, 37 (4), 698–711.

Fitzsimons, Gráinne M. and John A. Bargh (2003), "Thinking of You: Nonconscious Pursuit of Interpersonal Goals Associated with Relationship Partners," *Journal of Personality and Social Psychology*, 84 (1), 148-64.

Fitzsimons, Gráinne M. and Eli J. Finkel (2011), "The Effects of Self-Regulation on Social Relationships," in *Handbook of Self-Regulation: Research, Theory, and Applications*, ed. Kathleen D. Vohs and Roy F. Baumeister, New York: Guilford, 390-406.

Hofmann, Wilhelm, Eli J. Finkel, and Gráinne M. Fitzsimons (2015), "Close Relationships and Self-Regulation: How Relationship Satisfaction Facilitates Momentary Goal Pursuit," *Journal of Personality and Social Psychology*, 109 (3), 434-52.

Kahn, Joan R., Frances Goldscheider, and Javier García-Manglano (2013), "Growing Parental Economic Power in Parent–Adult Child Households: Coresidence and Financial Dependency in the United States, 1960–2010," *Demography*, 50 (4), 1449-75.

Kleinman, Arthur (2012), "Caregiving as Moral Experience," *The Lancet*, 380 (9853), 1550–51.

Kleinman, Arthur Michael (2013), "From Illness as Culture to Caregiving as Moral Experience," *New England Journal of Medicine*, 368, 1376-377.

Lee, Jaehoon and L. J. Shrum (2012), "Conspicuous Consumption versus Charitable Behavior in Response to Social Exclusion: A Differential Needs Explanation*," Journal of Consumer Research*, 39 (3), 530–44.

Mead, Nicole L., Roy F. Baumeister, Tyler F. Stillman, Catherine D. Rawn, and Kathleen D. Vohs (2011), "Social Exclusion Causes People to Spend and Consume Strategically in the Service of Affiliation," *Journal of Consumer Research*, 37 (5), 902–19.

Overall, Nickola C. and Chris G. Sibley (2008), "When Accommodation Matters: Situational Dependency within Daily Interactions with Romantic Partners," *Journal of Experimental Social Psychology*, 44 (1), 95-104.

Schneider, Judy (2000), "The Increasing Financial Dependency of Young People on Their Parents," *Journal of Youth Studies*, 3 (1), 5-20.

Thai, Sabrina, Penelope Lockwood, Rebecca Zhu, Yachen Li, and Joyce C. He (2019), "The Family Ties That Protect: Expanded-Self Comparisons in Parent–Child Relationships," *Journal of Social and Personal Relationships*, 36 (3), 1041-66.

US Census Bureau. (2019), "Table A3. Parents With Coresident Children Under 18, by Living Arrangement, Sex, and Selected," Retrieved from: https://www.census.gov/data/tables/2019/demo/families/cps-2019.html

Vaish, Amrisha, Robert Hepach, and Michael Tomasello (2018), "The Specificity of Reciprocity: Young Children Reciprocate More Generously to Those Who Intentionally Benefit Them," *Journal of Experimental Child Psychology*, 167, 336-53.

Vohs, Kathleen D. and Todd F. Heatherton (2000), "Self-Regulatory Failure: A Resource-Depletion Approach," *Psychological Science*, 11 (3), 249-54.

Building "Pyramid of Oneness" - Delineating Differences among Human Brands, Celebrities and Person-Brands

Karthik Selvanayagam, Indian Institute of Technology Madras, India
Varisha Rehman, Indian Institute of Technology Madras, India

EXTENDED ABSTRACT

"In the future, everyone will be world-famous for fifteen minutes"

- Andy Warhol 1968 (Benabou and Ok 2001)

It was perhaps the foresightedness of present reality that had led Andy Warhol, over fifty years ago, to believe in the existence of a dynamic environment of branded humans. Marketing research has embraced the idea of a human brand since its conceptualization by Matthew Thomson (2006) as *"any well-known persona who is the subject of marketing communications efforts"*. However, throughout this field of research, we find that the concepts of celebrity and human brands have been adopted to be applied interchangeably within their context. With emergence of recent theories of person-brands (Fournier and Eckhardt 2019), it becomes essential to understand the uniqueness in the natures of human brands, celebrity, and person-brands. We present our work within this emerging discourse to posit underlying distinctness between these entities.

Understanding specific differences in meaning provision and types of trust that develops within a relationship between a consumer and the popular person would enable drawing clarity upon the distinctness in the three entities of human brands, celebrity, and person-brands. Through Lewicki and Bunker's (1995) cross-discipline meanings and evolution of trust in a relationship, we posit the possible differences in consumer trust in *human brands, celebrity, and person-brands*. Further, by describing the nature of resulting equity in each of these relationships, we develop a conceptual framework that would help towards understanding human brands, celebrity, and person-brands as distinct stages of popularity of a person.

Three Stages of Trust

Lewicki and Bunker (1995) posit a sophisticated, and sequential approach to trust in interpersonal as well as professional relationships. The model presents three stages of trust: calculus, knowledge, and identification-based trust. Calculus-based trust is transactional in nature and derived on the value of the benefits of the relationship, and knowledge-based trust is grounded on the increased predictability the actions of the relationship partners, identification-based trust which emerges out of complete internalization of the other's desires and intentions. We posit the placing of the human brand-consumer relationship at the stage of calculus-based trust.

Human Brand

Calculus-Based Trust and Professional Equity

Examining the antecedents of strong attachments formed by consumers with human brands, Thomson (2006) presents that enabling feelings of autonomy and relatedness in the consumers as more significant than the human brand competence. As Wohlfeil and colleauges (2019) suggest, dominant literature in this area considers the 'dehumanized' celebrity as the human brand, making them archetypes of cultural meanings. Meaning provision for a consumer is culturally constructed through the human brand's performance as a professional, with little insight into the real person. This position makes human brands tenable for endorsements. At this stage the consumers develop an exchange based trust in the relationship with the human brand We posit that at this stage a *professional equity* develops for the human brand (Parmentier and Fischer 2010).

At the human brand stage of a popular person, this equity is developed through consistent expression of ability to achieve high standards in her/his field of practice. As the consumer's meaning provision of the well-known person develops into polysemic appeals through knowledge of the real person through her/his values, personality, in real situations, a knowledge-based trust develops in the relationship. At this stage, we posit that the human brand becomes a celebrity.

Celebrity

Knowledge-Based Trust and Celebrity Equity

Information about a popular person reaches the consumer through public appearances, interviews, social interactions with fans and other well-known individuals, and biographical content like books or documentaries, among other similar sources. When the information contained in these sources are beyond the functionality of the popular person, giving insights about her/his private life, it provides knowledge to the consumer that contributes to predictability in her/his actions. Lewicki and Bunker (1995) describe the trust that emerges in this stage as knowledge-based trust. At this stage the popular person becomes a celebrity, allowing for individual consumers to co-create meanings, allowing for polysemic appeals and heteroglossia of perspectives about the celebrity (Wohlfeil et al. 2019). At this stage, the celebrity would be able to reach consumers who are unfamiliar with the celebrity's field of practice.

We posit here the emergence of *celebrity equity*, built upon the authentic persona of the popular person (Moulard, Garrity, and Rice 2015; Speed, Butler, and Collins 2015; Thomson 2006). It is at this stage celebrities become brands in and as themselves. As celebrities build a convergence of the performer and the real person, celebrities move to the subsequent stage of being person-brands.

Person-Brand

Identification-Based Trust and Personal Equity

Fournier and Eckhardt (2019) adopt Ernst H. Kantorowicz's theory of the King's two bodies to present that the person is "*inextricably united with the person-brand*". With internalization occurring over a long period of time, consumers begin to perceive the convergence of the personal life and professional skills of the popular person as a single self. Consumers would substitute the brand for themselves in the social landscape. Lewicki and Bunker (1995) describe the nature of trust at this stage as the strongest in relationships.

At this stage, the popular person earns a *personal equity* that unifies the private and professional lives of the individual. A holistic and interdependent nature of the person and the brand establish a singular equity for the person-brand, where the private-self and the professional-self converge toward one purpose.

Conclusion

In this work we have intended towards building an understanding of developmental stages of human brands, celebrities, and person-brands. Drawing upon an interdisciplinary approach to trust, meaning provision, and brand equity, we present a conceptual frame-

work delineating the differences between human brands, celebrities and person-brands that would enable research and practice in better understanding and management. Future research on this work, conceptual and empirical, could contribute to the marketing scholarship in bringing forth underlying drivers as well as movement between these stages of a popular person's brand. Comparisons between brands from related and unrelated fields of practice could also provide insights into consumer perceptions in the digital age.

REFERENCES

Benabou, Roland and Efe A. Ok (2001), "Social Mobility and the Demand for Redistribution: The POUM Hypothesis," *Quarterly Journal of Economics*, 116(2), 447–87.

Fournier, Susan and Giana M. Eckhardt (2019), "Putting the Person Back in Person-Brands: Understanding and Managing the Two-Bodied Brand," *Journal of Marketing Research*, 56(4), 602–19.

Lewicki, Roy J and Barbara Benedict Bunker (1995), "Trust in Relationships: A Model of Development and Decline.," ed. Jz & Associates (Eds.) In Bunker, Bb, Rubin, *Conflict, cooperation, and justice: Essays inspired by the work of Morton Deutsch*, (September), 133–73, http://psycnet.apa.org/psycinfo/1995-98007-005.

Moulard, Julie Guidry, Carolyn Popp Garrity, and Dan Hamilton Rice (2015), "What Makes a Human Brand Authentic? Identifying the Antecedents of Celebrity Authenticity," *Psychology and Marketing*, 32(2), 173–86, http://doi.wiley.com/10.1002/mar.20771.

Parmentier, Marie-AgnÈs and Eileen Fischer (2010), "Branded Like Beckham? An Examination of Dynamic Processes in Human Branding," *Advances in Consumer Research*, 37, 37, https://acces.bibl.ulaval.ca/login?url=https://search.proquest.com/docview/1808036355?accountid=12008%0Ahttp://sfx.bibl.ulaval.ca:9003/sfx_local??url_ver=Z39.88-2004&rft_val_fmt=info:ofi/fmt:kev:mtx:journal&genre=article&sid=ProQ:ProQ%3Aabiglobal&atitle=B.

Speed, Richard, Patrick Butler, and Neil Collins (2015), "Human Branding in Political Marketing: Applying Contemporary Branding Thought to Political Parties and Their Leaders," *Journal of Political Marketing*, 14(April 2015), 129–51.

Thomson, Matthew (2006), "Human Brands: Investigating Antecedents to Consumers' Strong Attachments to Celebrities," *Journal of Marketing*, 70(3), 104–19.

Wohlfeil, Markus, Anthony Patterson, and Stephen J. Gould (2019), "The Allure of Celebrities: Unpacking Their Polysemic Consumer Appeal," *European Journal of Marketing*, 53(10), 2025–53, https://www.emerald.com/insight/content/doi/10.1108/EJM-01-2017-0052/full/html.

Risk is Preferred at a Lesser Causal Depth

Rumela Sengupta, University of Illinois at Chicago, USA
Jeffrey Parker, University of Illinois at Chicago, USA

EXTENDED ABSTRACT

Consumers face risk and uncertainty every day, for example, selecting between medical treatments, choosing whether to join an online dating website or not, or allocating funds across available investment options. The current work examines preferences between equally risky sequences of events (or processes) that differ with respect to when the risk arises within the sequence.

A substantial body of research has tried to understand how decision makers incorporate risk in their choices. Majority of extant literature examine the relative preferences for options with greater or lesser relative risk or uncertainty; preference for certain over risky gains (e.g., Duke, Goldsmith, and Amir 2018; Gneezy, List, and Wu 2006; Kahneman and Tversky 1982), preference for uncertainty over certain gain options (e.g., Dhar, Gonzalez-Vallejo, and Soman 1995; Goldsmith and Amir 2010; Mazar, Shampanier, and Ariely 2016), factors moderating the preference for risky over certain options (e.g., Laran and Tsiros, 2013; Larrick, Heath, and Wu 2009; Levav and Argo 2010). In contrast to the previous work, the current research examines preferences between equally risky processes that differ only with respect to when or where the risk arises within the sequence: either in the early stages (hereafter, "deep-risk") or in the later stages (hereafter, "shallow-risk"). We posit that, people tend to *feel* that the deep-risk sequence is riskier overall than is the shallow-risk sequence and, thus, tend to prefer shallow-risk sequences. This is because, given the temporal nature of the sequences, earlier nodes have more direct and indirect effects on the overall sequence than later nodes. Consequently, deeper risk may be viewed as propagating throughout the process more than would be the case with shallower risk.

Four studies tested the basic proposition and the potential accounts for the effect. In Study 1, participants (N=100) were asked to imagine that they could order the same product from two different websites, each of which had experienced delivery issues in the past. One of the websites was described as having a shallow-risk delivery sequence (i.e., the risk arose later, at the delivery stage) and the other was described as having a deep-risk delivery sequence (i.e., the risk arose earlier, at the package-addressing stage). The overall risk associated with the processes were equivalent: either the delivery service lost the package 5% of the time (shallow-risk) or the website mistakenly sent the package to the wrong address 5% of the time (deep-risk). The participants were then asked to indicate which website would they choose to order from. A significant majority (61%) of participants indicated they would choose the shallow-risk website ($\chi2(1)=4.84$, $p<.03$).

Study 2 tested a potential account of the effect – greater perceived importance of events arising earlier. Since earlier events might be perceived as more important for the process, individuals might prefer more certainty in those events. Participants (N=196) were told to imagine that they were playing a 4-player "Telephone Game." The participants had to decide who would fill the 2nd and the 3rd position in the game – Friend-1, who was always accurate or Friend-2, who was accurate only 50% of the time. Additionally, they were asked to indicate which of the two positions was more important for winning the game. A significant majority (77.8%) of participants indicated they would assign Friend-2 (risky friend) to Position 3 (i.e., preferred shallower risk; $\chi2(1)=58.33$, $p<.001$). However, the perceived importance account was not supported. A significant ma-

jority (62.4%) of participants indicated that both the positions were equally important for winning the game ($\chi2(2)=73.37$, $p<.001$) and, of those, a significant majority assigned the risky player to Position 3 (85%, $\chi^2(1)=56.98$, $p<.001$).

Study 3 examined the proposed felt risk account. Participants (N=277) were asked to imagine that they were playing a game wherein they had to pull a lever to release a ball. For them to win the game, the ball had to pass through two doors and enter a hole. They were asked to choose between two versions of the game. In shallow-risk (deep-risk) version, the 1st (2nd) door opened every time but the 2nd (1st) door randomly opened sometimes and remained closed other times. Additionally, the participants were asked to indicate the overall riskiness of the two versions of the game. A significant majority (67.9%) of participants indicated they would choose the shallow-risk version ($\chi2(1)=35.051$, $p<.001$). The perceived risk account was supported as participants considered deep-risk version of the game significantly riskier ($M_{deep-risk}=6.48$, $M_{shallow-risk}=6.27$, $p<.01$).

Study 4 further tested the felt-risk account via formal mediation analyses. Participants (N=200) were asked to imagine that they had caught a rare infection. They were asked to choose between two possible treatments for the infection, both of which involved two medications. In shallow-risk (deep-risk) treatment, the 1st (2nd) medication worked every time but the 2nd (1st) medication randomly worked sometimes and failed other times. The order in which the treatments were presented was counter-balanced among the participants. Results from a binary logistic regression indicated that participants' preferences for Treatment A were significantly driven by whether it offered the shallow-risk (dummy=1) or deep-risk sequence (dummy=0; b=.935, Wald=9.325, $p=.002$). A mediation analysis (Hayes 2013, model 4) revealed a significant indirect effect of risk-depth on choice through the difference in the perceived risk between the two sequence (b=.0824; CI: LL=.0126, UL=.16; $p=.018$). In sum, four studies find that individuals prefer options with risk arising later in the sequence. This is because deep-risk sequences feel riskier.

The present research makes theoretical contributions to the literature on decision making under uncertainty and risk preferences. It reveals that preferences can be influenced by risk even when it is objectively equivalent across options. In addition to making theoretical contributions, this research also has managerial implications. The results from the studies reveal that, when consumers must choose between different risky options, their preference depends on not only on the amount of risk arising in each option, but also when that risk arises. Managers can use this insight as an input during new product development as well as new service offerings that are typically processes where some amount of risk is unavoidable.

REFERENCE

Dhar, Sanjay K., Claudia Gonzalez-Vallejo, and Dilip Soman (1995), "Brand promotions as a lottery," *Marketing Letters,* 6(3): 221-233.

Duke, Kristen E., Kelly Goldsmith, and On Amir. "Is the Preference for Certainty Always So Certain?." *Journal of the Association for Consumer Research* 3, no. 1 (2018): 63-80.

Gneezy, Uri, John A. List, and George Wu. "The uncertainty effect: When a risky prospect is valued less than its worst possible outcome." *The Quarterly Journal of Economics* 121, no. 4 (2006): 1283-1309.

Goldsmith, Kelly, and On Amir. "Can uncertainty improve promotions?." *Journal of Marketing Research* 47, no. 6 (2010): 1070-1077.

Kahneman, Daniel, and Amos Tversky. "The psychology of preferences." *Scientific American*, (1982): 160-173.

Laran, Juliano, and Michael Tsiros. "An investigation of the effectiveness of uncertainty in marketing promotions involving free gifts." *Journal of Marketing* 77, no. 2 (2013): 112-123.

Larrick, Richard P., Chip Heath, and George Wu. "Goal-induced risk taking in negotiation and decision making." *Social Cognition* 27, no. 3 (2009): 342-364.

Levav, Jonathan, and Jennifer J. Argo. "Physical contact and financial risk taking." *Psychological Science* 21, no. 6 (2010): 804-810.

Mazar, Nina, Kristina Shampanier, and Dan Ariely. "When retailing and Las Vegas meet: Probabilistic free price promotions." *Management Science* 63, no. 1 (2016): 250-266.

Insights on New Information Consumption

Amir Sepehri, Western University, Canada
SeyedNasir HaghighiBardineh, Washington State University, USA
Rod Duclos, Western University, Canada

EXTENDED ABSTRACT

As scientific progress matures in many fields, interdisciplinary research is gaining popularity to push further the boundaries of knowledge. Testifying to this trend, funding worldwide is directed to universities and research centers that champion a transversal approach. A natural consequence of interdisciplinary research is interdisciplinary ideas.

Likening new ideas to new intellectual products, we explore their diffusion through the lens of innovation. That is, how are ideas that span different fields (or encompass distant concepts) received, adopted, and promulgated?

Past research has shown that categorization plays a central role in understanding new products (Sujan 1985). Drawing on categorization research, we argue that interdisciplinary ideas may receive less favorable ratings because of their conceptual heterogeneity. Specifically, we posit that interdisciplinary ideas are harder to understand, and categorize, which causes confusion and in turn reduces their rate of adoption. Our reasoning is as follows.

When concepts within an interdisciplinary idea lack internal logic/connection, confusion ensues (Benson and Miller 1982). As a result, consumers of these ideas will try to comprehend them by categorizing them under pre-defined topics. Indeed, information structure plays an important role in information acquisition (Lurie 2004). The more categories employed to form an idea, the more difficult it will be for recipients to categorize said idea, form an information structure, and, in turn, to comprehend it. Ultimately, this complexity decreases the recipients' evaluations of conceptually-heterogeneous ideas. However, we expect Need for Cognition (NFC; Cacioppo & Petty 1982) to play a moderating role on this effect. It has been shown that High NFC individuals process information with more depth and breadth (Levin, Huneke, & Jasper 2000). Therefore, we expect this negative effect to weaken and even reverse at high levels of NFC.

Given the rise of interdisciplinary research and/or the tendency of communicators to borrow from various fields and topics, this project endeavors to understand the effect of information heterogeneity on new information consumption in an online video-sharing context.

Study 1: Evidence from a large dataset of online videos featuring novel ideas

Methods: We tested our predictions on a real-world dataset of ~2500 online talks. Said talks come from a popular platform dedicated to disseminating "novel" ideas (Mean number of views for each talk = 1,754,062). We report below two proxies aimed at testing the relationship between conceptual heterogeneity (i.e., the extent to which talks are conceptually tight vs. broad), liking, and online views.

Regardless of the method and consistent with our theorizing, we find repeatedly that talks encompassing a higher number of different topics receive fewer views or are liked less.

First proxy: Number of Tags

Each talk on our platform of choice is accompanied by a series of "tags" (also known as "categories") aimed at describing its topic and scope[1]. Using the number of tags as a coarse proxy for concep-

tual heterogeneity, we find that talks characterized by more tags are viewed less (B=-34015.13, SE=11854.02, p = .004). The effect holds even after controlling for the duration of each talk.

These findings are noteworthy for their counter-intuitiveness. Indeed, the more descriptive tags a talk has, the more likely it appears in search attempts. Hence, the overall negative effect identified here is large enough to negate the otherwise positive effect one would expect from keyword searches.

Boundary condition: Of note, we also find preliminary evidence for a boundary condition to the aforementioned main effect. The talks were transcribed into text and mined for their use of "analytical language". Analytical language score is the extent to which the author has used words that indicate formal, logical, and hierarchical thinking patterns (Pennebaker et al. 2014). The mining task was carried out by LIWC 2015 (Pennebaker, Boyd, Jordan, & Blackburn, 2015), a dictionary-based approach validated in past research (Humphreys & Wang, 2017; Tausczik & Pennebaker, 2010).

While using analytical words has a negative main-effect on the number of views (B=-36,834.12, SE=5823.69, p<.001), its interaction effect with *number of tags* is positive (B=1739.62, SE=701.39, p=.01). In other words, as more analytical words are used in a talk, the negative effect of *number of tags* on the number of views becomes weaker and eventually non-significant. The floodlight illustration for this interaction can be found in figure 1. And similar to our initial finding, the main effect of the number of tags is itself negative (B=-127327.20, SE=40,999.29, p<.01). The pattern and level of significance of these findings hold even after controlling for the duration of talks.

In short, using analytical words can be a remedy to the otherwise detrimental main-effect that the number of tags has on talk virality. This insight is valuable, particularly for talks that are inevitably heterogeneous in nature (i.e., for talks that cannot be concentrated around one or two topics). In such cases, using analytical language will assuage the adverse effect exerted by the number of tags, hence promote the viewers' evaluations. This is some initial indication of the role Need For Cognition may play as potential individual difference moderator. We will put this idea to test later in the article.

Proxy 2: Topic Modeling

We used latent Dirichlet allocation (LDA; Blei, 2012) to discover the main topics discussed within talks. This method mines the transcript of each talk and measures the co-occurrences of the words both within and across texts. Doing so, the algorithm uncovers (1) the latent topics composing each talk and (2) the words that constitute each topic (see table 1 for examples). LDA has been used in psychology and marketing as a method to identify latent themes or topics (e.g., Berger & Packard 2018; for a full review see Berger et al. 2019).

In order to find the optimal number of topics, we modeled topics within the text starting with 10 topics (all the way to 100 topics) with a step of 2. Using log-likelihood values from each topic number, we identified the optimal number of topics to be 34. Next, we modeled the topics across all transcripts extracting 34 topics. This gave us the proportion or share of each of the 34 topics in each of the talks. Of note, if a talk is uniformly distributed across all 34 topics, each topic

---

[1] These descriptive tags are generated by an algorithm (i.e., by artificial intelligence).

would have a share of 2.9412%. We thus used 3% as a natural cut-off point to determine the number of topics covered in each talk[2].

Results. Replicating the pattern of results unearthed in our previous approach, an ordinary least squares (OLS) regression revealed a significant negative effect by the number of topics on the number of views received by each talk (B=-135944.54, SE=33268.22, p<.001). The effect holds even after controlling for the duration of each talk.

We considered an addition measure: the standard deviation across topic proportions. Our rationale is as follows. Less standard deviation in topic proportions should reflect that a talk covers more topics (i.e., that a talk has more conceptual heterogeneity). Conversely, more standard deviation across topic proportions should reflect that certain topics are more emphasized than other topics (i.e., that a talk has less conceptual heterogeneity).

Putting this idea to the test, we find that lesser standard deviation in topic proportions within a talk (i.e., more conceptual heterogeneity) is again associated with fewer views (B=-15731158.74, SE=4010486.97, p<.001).

Is number of topics the same thing as number of tags?

Further analyses revealed that the negative effect that the number of topics (proxy 2) has on views is *separate* from the negative effect exerted by the number of tags (proxy 1)[3]. Indeed, while both main effects remain negative and significant in presence of each other (B$_{Num-Topic}$=-250785.54, SE= 68455.72, p<.001; B$_{Num-Tag}$=-132223.11, SE= 52086.93, p=.01), the effect of the number of tags moderates the negative effect by the number of latent topics (interaction term: B=16222.52, SE=8264.32, p<.05). Specifically, when talks are described by a large-enough number of tags, the adverse effect exerted by the number of topics discussed in a talk becomes non-significant (see floodlight illustration of this interaction in figure 2). Stated differently, the deleterious effect caused by the number of tags overwhelms/overtakes the negative effect caused by the number topics; giving the latter no room to operate.

Study 2a: Evidence from a within-subjects experiment

The aim of this study is to test the hypothesis in a more controlled setting and to provide some evidence on the underlying mechanism.

Methods: We recruited 99 undergraduate students (M$_{age}$ = 18.74, 57.6% female) at a large university in North-America to take part in our study in exchange for course credit. Eight videos were selected from our dataset. Half of these videos comprised of 9 topics (High group) whereas the other half did only 3 (Low group). We had a within-subjects design whereby each participant watched 2 online talks randomly chosen from each High and Low group. The order of display was counter-balanced.

The participants were then asked to indicate how much they liked each talk (2 items, both alphas > .9). They were also asked to rate the cognitive complexity of each talk (2 items, both alphas > .7).

Results: We used repeated measures ANOVA to test our main effect and the MEMORE macro (Montoya, 2019) to test our indirect effect. The results confirm that talks featuring a high number of topics (M$_{liking}$ = 4.22, SD= 1.69) were liked less than the talks comprising of a low number of topics (M$_{liking}$ = 5.44, SD= 1.46; F(1,98)= 44.06, p< .001). Moreover, the talks covering a high number of topics were seen as being more complicated and more difficult to understand (M$_{complictaed}$ = 3.43, SD= 1.53) than their counterparts featuring

a low number of topics (M$_{complictaed}$ = 2.31, SD= 1.23; F(1,98)= 37.18, p< .001). This preliminary evidence for the underlying mechanism is illustrated in figure 3.

MEMORE macro results indicate that cognitive complexity mediates the effect of number of topics on liking (B$_{indirect}$ = -.41, SE= .14, 95% CI= [- .71, -.17]. The direct effect stays significant after cognitive complexity is accounted for (B$_{direct}$ = -.82, SE= -.2, 95% CI= [-1.22, -.42]. This means that although cognitive complexity partially explains the negative effect of number of topics on liking, there are other underlying mechanisms that can account for it, too. This is conducive to future research in this area.

Study 2b: Evidence from a between-subjects experiment

Study 2b builds on study 1a in three ways: (a) it tests the effect in a between-subjects design, (b) it offers additional evidence on the underlying mechanism, and (c) provides evidence on a crucial individual difference moderator that leads to a full effect-reversal.

Methods: We recruited 70 undergraduate students (M$_{age}$ = 19.14, 52.9% female) at a large university in North-America to take part in our study in exchange for course credit. The design of the study was similar to the previous study with the only difference being randomization on the number of topics factor. Participants randomly watched a video featuring either a high or a low number of topics and indicated how much they liked it (two-items, 1-7, alpha > .8). After that, they indicated how difficult was it for them to categorize the video under a topic. The study concluded with the 18-item Need For Cognition scale (Cacioppo, Petty, & Feng Kao 1984) and demographic questions.

Results: We replicate the main effect of high vs. low number of topics such that participants liked the videos featuring a low number of topics (M$_{low}$ = 5.63, SD= 1.41) more than those covering a high number of topics (M$_{high}$ = 4.41, SD= 1.46; F(1,68)= 12.51, p = .001). We also find that high-number-of-topic videos were deemed as more difficult to categorize (M$_{high}$ = 4, SD= 1.91) than the ones covering a low number of topics (M$_{low}$ = 3.08, SD= 1.65; F(1,68)= 4.65, p = .035). Based on this preliminary evidence, we conducted a mediation analysis using PROCESS model 4. We find that categorization difficulty mediates the effect of topics on viewers' liking of the videos on a 90% CI (B$_{indirect}$ = .19, SE= .13, 90% CI= [.005, .427]). This means that compared to videos covering a low number of topics, videos covering a high number of topics were deemed as more difficult to categorize which in turn led to lower audience liking for them.

In order to test the moderating role of Need for Cognition (NFC), we conducted a moderation analysis using PROCESS model 1. While replicating the main effect of number of topics, we find a main effect of NFC on liking such that higher NFC values lead to lower liking of the videos (B= -2.59, SE= .96, p= .009). More importantly, we find a significant interaction between number of topics and NFC (B= 1.89, SE= .56, p= .001). At low levels of NFC, we find that more topics in a talk lead to lower liking for the video. However, as NFC increases, this effect becomes non-significant, and at high levels of NFC, it becomes significant in the opposite direction such that videos covering numerous topics are liked more. A floodlight illustration for this interaction can be found in figure 4. The pattern of results is consistent with the theorizing we had in front end.

General Discussion

Likening new ideas to new intellectual products, this article sets out to examine the effect of information heterogeneity on how new information in the form of interdisciplinary novel ideas are received. Using a repository of ~2500 talks from a popular e-platform dedicated to the dissemination of novel ideas, we find that videos richer

---

2 Results are robust if 2.9% or 2.9412% (i.e., 100/34) is used as cut-off point instead of 3%.
3 Despite the large number of observations, the correlation between the number of tags describing each talk and the number of topics developed within each talk is insignificant (r=.3, p=.15).

in conceptual heterogeneity (i.e., talks spanning numerous different fields) are viewed less. We do so by using machine-generated tags provided by the platform, machine-learning methods modeling the topics in the text, and controlled lab experiments.

Public speakers and, more generally, communicators (e.g., politicians, professors, scientists, journalists) are another audience who may benefit from our findings. Indeed, while many seek to integrate various topics/ideas into their communications in order to improve the convincingness of their overall argument, doing so comes at a cost (i.e., ideas with conceptual heterogeneity spread less).

We also find that this effect depends on the audience to which the idea is presented. As we found, high-NFC individuals would prefer ideas covering a high number of topics while the opposite is true for low-NFC persons. This speaks to the potential role of expertise: While an expert audience may prefer a boundary-spanning idea, lay people would find it difficult to categorize and like it less.

As alluded above, the number of views received by a talk online is a strong test of virality. Content that goes unseen/unshared is unlikely to get adopted by the market. We hope this work will help spur interest in the psychology of contagion (i.e., when, how, and why new products/ideas propagate).

REFERENCES:

Benson, T. L., & Miller, R. C. (1982). Five arguments against interdisciplinary studies. *Issues in Interdisciplinary Studies*.

Berger, J., Humphreys, A., Ludwig, S., Moe, W. W., Netzer, O., & Schweidel, D. A. (2019). Uniting the tribes: Using text for marketing insight. *Journal of Marketing*, 0022242919873106.

Berger, J., & Packard, G. (2018). Are atypical things more popular?. *Psychological science*, *29*(7), 1178-1184.

Blei, D. M. (2012). Probabilistic topic models. *Communications of the ACM*, 55, 77–84.

Cacioppo, J. T., & Petty, R. E. (1982). The need for cognition. *Journal of personality and social psychology*, *42*(1), 116.

Cacioppo, J. T., Petty, R. E., & Feng Kao, C. (1984). The efficient assessment of need for cognition. *Journal of personality assessment*, *48*(3), 306-307.

Humphreys, A., & Wang, R. J. H. (2017). Automated text analysis for consumer research. Journal of Consumer Research, 44(6), 1274-1306.

Levin, I. P., Huneke, M. E., & Jasper, J. D. (2000). Information processing at successive stages of decision making: Need for cognition and inclusion–exclusion effects. *Organizational behavior and human decision processes*, *82*(2), 171-193.

Lurie, N. H. (2004). Decision making in information-rich environments: The role of information structure. *Journal of Consumer Research*, *30*(4), 473-486.

Mikolov, T., Chen, K., Corrado, G., & Dean, J. (2013). Efficient estimation of word representations in vector space. *arXiv preprint arXiv*:1301.3781.

Montoya, A. K. (2019). Moderation analysis in two-instance repeated measures designs: Probing methods and multiple moderator models. *Behavior research methods*, *51*(1), 61-82.

Pennebaker, J. W., Boyd, R. L., Jordan, K., & Blackburn, K. (2015). The Development and Psychometric Properties of LIWC2015, 26.

Pennebaker, J. W., Chung, C. K., Frazee, J., Lavergne, G. M., & Beaver, D. I. (2014). When small words foretell academic success: The case of college admissions essays. *PloS one*, *9*(12), e115844.

Sujan, M. (1985). Consumer knowledge: Effects on evaluation strategies mediating consumer judgments. *journal of Consumer Research*, 31-46.

Tausczik, Y. R., & Pennebaker, J. W. (2010). The psychological meaning of words: LIWC and computerized text analysis methods. Journal of language and social psychology, 29(1), 24-54.

The Pros and Cons of Multitagging in Online Retailing

Amir Sepehri, Western University, Canada
Rod Duclos, Western University, Canada
SeyedNasir HaghighiBardineh, Washington State University, USA

EXTENDED ABSTRACT

To help search for the products they offer, online retailers attach descriptive tags (a.k.a. *categories* or *genres*) to their inventory. A recipes website, for instance, may do so by way of cuisine (e.g., French, Mexican) or dishes (e.g., tacos, fish). Similarly, Apple's AppStore organizes its lineup of games by interest (e.g., strategy, sports) while Amazon tags its books by genre (e.g., thriller, science fiction, romance). In turn, when consumers type a keyword describing what they are looking for (e.g., romance novel), a search algorithm retrieves matching options from the retailer's database. To summarize, tags chosen by marketers to characterize products constitute strategic decisions that will in turn shape the set of options viewed by consumers during their search.

The practice of tagging being pervasive across industries, this manuscript asks whether tagging is in fact good or bad. Stated differently, to what extent do retailers benefit from a practice they have so uniformly adopted?[1]

At first brush, both intuition and scholarly work support the practice. Indeed, tagging facilitates search (particularly online, where options are sometimes limitless) and increases product visibility/exposure (Hedden 2008; Lamere 2008).

To cumulate the benefits of tagging, retailers have now turned en masse to "multi-tagging" (i.e., describing any given item by not one but multiple tags). The reasoning is simple. The more tags/categories ascribed to product X, the more often will X emerge from consumers' keyword searches.

While the above thinking is appealing, we submit multi-tagging comes with unforeseen costs. In what follows, we argue that more tags ascribed to a given product may hurt (rather than merely help) how said product is ultimately judged/perceived by consumers. We ground our argument in the learning and categorization literatures.

When considering a new product, consumers first attempt to attach said product to a specific class/category of products so the knowledge they have in said category can serve to assess the new product (Waldmann, Holyoak, and Fratianne 1995). By shaping consumers' search-results, then, tagging (in)directly influences the primary knowledge-structures recruited by consumers to make evaluations (both prospectively and retrospectively). The rationale for the latter is best explained by Moreau, Markman, and Lehmann (2001). By giving consumers a category label (e.g., a "romance" novel), marketers encourage categorization-based knowledge-transfer whereby the label emboldens consumers to make more extensive mappings from the category to the target item than when no label is present. From this derive three implications.

First, Moreau, Markman, and Lehmann (2001) find that the product category cued by marketers shapes consumers' categorization of the new product in the direction of the cue and away from other plausible categorizations. Second, expectations of a product's performance are shaped by the performance of fellow products within which the new product was categorized. Third, expectations of a new product's performance will affect consumers' liking for the new product (i.e., higher expectations will lead to higher preferences).

We contribute to this line of work by showing that multi-tagging hurts marketers in unanticipated ways. For illustration, consider the case of a book: an action-packed thriller set 100 years from now in space, with hints of attraction between the two lead characters. The retailer may classify the novel simply as a "thriller." Alternatively, s/he may tag it as "thriller," "action," "science fiction," "love," and "romance." The latter approach (i.e., multi-tagging) would increase product visibility/exposure online since the item would now emerge in not one but five different keyword-searches. By doing so, however, we argue that marketers may inadvertently bias the knowledge structures through which consumers will in turn judge the book. A consumer searching for a romance novel, for instance, would recruit her knowledge of the category and use said knowledge to (i) form expectations about the book and, in turn, (ii) assess the book. If the book is only tangentially related to romance, her evaluation of it will be negatively affected.

Extrapolating from this particular example to the broader context, our prediction is as follows. All else equal, multi-tagging is likely to activate the wrong knowledge structures in consumers. Stated differently, the more tags/categories describe a product, the less liked will be said product ultimately. The underlying cause for this misfortune is that the knowledge structures activated to judge the product are less likely to be pertinent (e.g., using romance schemas to gauge a book that is primarily a thriller).

Five studies using real-world datasets test our theorizing and uncover the hidden costs of multi-tagging. Rather than declaring multi-tagging as good or bad, our investigation reveals the practice to be good *and* bad (i.e., with both benefits and drawbacks). So doing, we corroborate prior findings related to the "positivity bias" (i.e., the more reviews/ratings a product receives, the more favorable becomes the overall average of said reviews/ratings). Importantly, however, we uncover that the benefits of greater visibility/exposure for the overall favorability of reviews/ratings are in fact *outweighed* by the deleterious effects of inadequate knowledge-structures (e.g., when consumers assess an item by the wrong set of schemas/criteria, they end up liking the product less on average).

Study 1: Recipes

Our investigation begins in the food industry. We obtained data scraped from a popular recipe-sharing platform (>209K recipes overall). For each recipe, the author attaches any number of tags to describe her entry (e.g., seafood, beef, vegan, tacos). In turn, when consumers search for a particular dish (e.g., tacos), entries matching their keyword-search are retrieved[2]. Our data also include ~992K ratings ranging from 1 to 5 which served as proxies for the liking/favorability of each recipe.

Analysis and Results. The above data set the stage for testing our theorizing on the costs and benefits of multi-tagging. First, we find that assigning more tags to a given recipe does indeed increase its visibility/exposure (i.e., the product is evaluated more often; B=.14, SE=.005, p<.001). And per the positivity, as visibility/exposure increases, so does the average liking for the item (B=.0014, SE=.0001, p<.0001). The indirect effect of the number of tags on liking through

---

[1]   While tagging can sometimes be done by consumers themselves, our primary interest lies in supply-side tagging-strategies (i.e., the strategic decisions made by marketers).

[2]   Tags were specified at the time recipes themselves were posted. This guarantees that tags (i.e., our IV) chronologically preceded ratings (i.e., our dependent variable).

the number of ratings was significant on a 95% CI ($B_{Indirect}$=.0002, 95% CI=[.0002, .0002]).

The novel finding we contribute, however, is that the *direct* effect by the number of tags on liking (i.e., on 1-5 ratings) is itself *negative* (B_{Direct}=-.0015, SE=.0002, p<.0001) and more powerful overall (B_{Total}=- .0013, SE=.0002, p<.0001; figure 1).

Study 2: Mobile Games

Study 2 examines our effect in a new context: mobile games. We obtained data scraped online from a popular AppStore. The dataset includes the tags describing >7,000 e-games as well as favorability measures for each (i.e., likeability ratings ranging from 1 to 5).

Once again, we find benefits of multi-tagging for visibility/exposure (i.e., more tags lead to more views/ratings) and, in turn, for overall product-likeability. These benefits come at a cost, however. Indeed, the *direct* effect of multi-tagging on product-liking is itself harmful and more powerful overall.

Study 3: Books

We obtained data scraped online from the world's largest book club. The website describes itself as "the" place for readers and book recommendations. The data available to us include the tags (a.k.a. "genres") describing >50,000 books (min: 0; max: 18; median: 5) as well as favorability measures for each book (i.e., likeability ratings ranging from 1 to 5).

Analysis and Results. An OLS regression revealed that a greater number of tags drives visibility/exposure (i.e., novels described by more tags are viewed/rated more often; B=3241.1, SE=309.73, p<.0001). In turn and per the positivity bias, as the number of ratings increases, so does the average liking for each book (B=.00001, SE=.00001, p<.0001). The indirect effect of the number of tags on liking through the rating-count was significant on a 95% CI ($B_{Indirect}$=.0002, 95% CI=[.0002, .0003]).

Per our theorizing, however, the *direct* effect by the number of tags on book-liking itself is negative and stronger overall, (B_{Direct}=-.0111, SE=.0005, p<.0001). This leads to an overall negative total-effect (B_{Total}=-.0108, SE=.0005, p<.0001; figure 3). These results echo those of studies 1 and 2.

Study 4: YouTube Videos

Study 1-3 approximated product visibility/exposure via the *number of ratings* received by each item. In study 4, we expand our realm of proxies for product visibility/exposure by including the *number of views* received by videos on YouTube[3]. Similarly, whereas studies 1-3 operationalized "product liking" as 1-5 ratings, study 4 does so via the *number of likes*[4] received by each video.

Analysis and Results. An OLS regression revealed that a greater number of tags boosts visibility/exposure (i.e., videos described by more tags are viewed more often: B=2598.08, SE=659.11, p<.001). In turn and per the positivity bias, as the number of views surges, so does product liking (B=.04, SE=.0002, p<.0001). The indirect effect of the number of tags on liking through the number of views was significant on a 95% CI ($B_{Indirect}$=108.89, SE=22.58, 95% CI=[63.48, 152.14]).

Per our theorizing, however, the *direct* effect by the number of tags on liking is itself negative and stronger overall (B_{Direct}=-.181.02, SE=22.72, p<.001), which leads to an overall negative total-effect (B_{Total}=-72.13, SE=35.76, p=.04; figure 4).

Study 5: Scientific-Journal Publications

Study 5 buttresses our case on the hidden costs of multi-tagging for overall product-liking by expanding our realm of measures in yet a new product-category: journal publications. Our approximation of product liking (i.e., our DV) is *citation count*. Indeed, the number of published articles being nearly infinite across journals and sub-disciplines, we contend the citation count of any given article is a reasonable proxy for how well said article is liked, respected, and/or valued by consumers[5].

Study 5 also innovates on the IV side. Whereas studies 1-4 used the number of tags describing a product as predictor of overall product-liking, S5 focuses on *full product-descriptions* (i.e., manuscript abstracts). If accurate, our predictions on the deleterious effects of multi-tagging for product liking should extend from tags to product-descriptions themselves.

Data. The data available to us consists of >51,000 abstracts of papers[6]. We also know how many times each abstract was viewed/accessed online. Our DV is the number of citations earned by each manuscript[7].

Analysis and Results. Since we did not have access to the keywords that often describe the topics of a paper, we approximated them ourselves through latent Dirichlet allocation (LDA; Blei 2012). In a nutshell, this text-mining technique measures the co-occurrence of certain words both within and across abstracts. In the end, the algorithm uncovers the latent topics constituting each abstract and the words naturally attached to each topic.

The rest of our analyses is straightforward. The "number of tags" characterizing each product is merely replaced by the "number of topics" characterizing each manuscript.

An OLS regression revealed that a greater number of topics boosts visibility/exposure (i.e., abstracts containing more topics are viewed more often: B=30.68, SE=3.84, p<.0001). In turn, as the number of views surges, so does product liking (i.e., citations increase with abstracts being accessed more often; B=.03, SE=.0002, p<.0001). The indirect effect of the number of topics on citations through the number of views was significant on a 95% CI ($B_{Indirect}$=.80, SE=.10, 95% CI=[.61, 1.00]).

Per our theorizing, however, the *direct* effect by the number of topics on citations is itself negative and stronger overall (B_{Direct}=-2.25, SE=.14, p<.0001), which leads to an overall negative total-effect (B_{Total}=-1.45, SE=.17, p<.0001; see figure 5 and table 1).

General Discussion

Across platforms and product categories, our data reveal that multi-tagging is slightly beneficial but mostly detrimental for product liking overall. The benefits are intuitive and come in the form of a chain reaction. By increasing the likelihood of a given item to match the keyword search of a consumer, multi-tagging increases product visibility/exposure. In turn, greater visibility/exposure boosts product liking thanks to the "positivity bias" (i.e., online reviews tend to be favorable because satisfied customers are more likely to share their opinions than dissatisfied counterparts; Pan & Zhang 2011, Hu, Zhang, & Pavlou 2009, Chevalier & Mayzlin 2006). Our contribution comes in the form of a counterintuitive finding: the *direct* effect of multi-tagging on product liking is itself negative and more powerful than the indirect effect described earlier. We show this to

---

[3]   >30K videos published between 2014 and 2018 in the US and Canada. For context, the median number of views for each video was 230,993 and the median number of tags describing each video was 19.

[4]   To be precise, our measure of liking is a "net" score (# likes - # dislikes) such that positive values signal greater product-liking.

[5]   In the present context, the pool of consumers consists mainly of academic researchers. Through their choices of which article(s) to cite in their own manuscripts, researchers reveal which papers they deem to be of greatest quality and/or of the highest authority.

[6]   Published between 1996 and 2016 (21 years) in a premier academic journal.

[7]   For context, the median number of views was 1363 and the median citation-count was 38.

be true for recipes, mobile games, books, videos, and even journal manuscripts (on average, the direct effect is 15.59 times the size of the indirect effect; table 2).

In addition to the breadth of product categories examined, a strength of this paper lays in the realm of measures used to test our theorizing. Tags were either counted directly (studies 1-4) or inferred by LDA (study 5). Visibility/exposure was approximated by the number of ratings (S1-3), views per video (S4), and views per abstract (S5). Lastly, product liking itself was assessed either directly (i.e., 1-5 ratings in S1-3) or indirectly (i.e., net number of likes minus dislikes in S4; citation count in S5). Regardless of the approach, consistent findings emerged. This speaks to the robustness and ecological value of our results.

Implications. Our findings have prescriptive implications for a variety of audiences. For instance, whereas an online retailer may be tempted to describe its products with multiple tags to maximize their likelihood of emerging from consumers' keyword searches, our results show this practice proves detrimental in the end for product liking. Similarly, individuals who use online platforms to either sell or share intellectual property (e.g., recipes, manuscripts, songs, music, photos, poetry) would do well to resist the maxim "more is better." If the goal is for their material to be liked, respected, and/or valued, less *is* better when it comes to product descriptions. The reason for the latter relates to categorization and learning (Moreau et al. 2001). Indeed, circling back to the illustration at the onset, a consumer looking for romance novels will use "romance" schemas/criteria to judge a book whereas said book was primarily an action-packed thriller set in space (i.e., it merely happened to feature romantic interests between two characters). Multi-tagging (i.e., thriller, action, science fiction, love, and romance) would increase visibility/exposure but it would ultimately hurt product reviews because the schemas/criteria recruited to evaluate the novel are mismatched/misaligned. And given the importance of reviews/ratings for sales[8], maximizing visibility/exposure (rather than favorable reviews/ratings) may be ill-advised.

---

8   For illustration, the Spiegel Research Center (2017) reports that (i) displaying reviews increases conversion rates by up to 270%; and (ii) having five reviews multiplies the purchase likelihood by four. Similarly, Luca (2016) finds that a one-star increase on Yelp increases revenues by 5-9%.

REFERENCES

Arun, R., Suresh, V., Madhavan, C. V., & Murthy, M. N. (2010, June). On finding the natural number of topics with latent dirichlet allocation: Some observations. In *Pacific-Asia conference on knowledge discovery and data mining* (pp. 391-402). Springer, Berlin, Heidelberg.

Berger, J., Sorensen, A. T., & Rasmussen, S. J. (2010). Positive effects of negative publicity: When negative reviews increase sales. *Marketing Science*, *29*(5), 815-827.

Blei, D. M. (2012). Probabilistic topic models. *Communications of the ACM*, 55, 77–84.

Cacioppo, J. T., & Petty, R. E. (1982). The need for cognition. *Journal of personality and social psychology*, *42*(1), 116.

Cao, J., Xia, T., Li, J., Zhang, Y., & Tang, S. (2009). A density-based method for adaptive LDA model selection. *Neurocomputing*, *72*(7-9), 1775-1781.

Chevalier, J. A., & Mayzlin, D. (2006). The effect of word of mouth on sales: Online book reviews. *Journal of marketing research*, *43*(3), 345-354.

Griffiths, T. L., & Steyvers, M. (2004). Finding scientific topics. *Proceedings of the National academy of Sciences*, *101*(suppl 1), 5228-5235.

Griffiths, T. L., Steyvers, M., & Tenenbaum, J. B. (2007). Topics in semantic representation. *Psychological review*, *114*(2), 211.

Hu, N., Zhang, J., & Pavlou, P. A. (2009). Overcoming the J-shaped distribution of product reviews. *Communications of the ACM*, *52*(10), 144-147.

Levin, I. P., Huneke, M. E., & Jasper, J. D. (2000). Information processing at successive stages of decision making: Need for cognition and inclusion–exclusion effects. *Organizational behavior and human decision processes*, *82*(2), 171-193.

Moreau, C. P., Markman, A. B., & Lehmann, D. R. (2001). "What is it?" Categorization flexibility and consumers' responses to really new products. *Journal of Consumer Research*, *27*(4), 489-498.

Pan, Y., & Zhang, J. Q. (2011). Born unequal: a study of the helpfulness of user-generated product reviews. *Journal of Retailing*, *87*(4), 598-612.

Yamauchi, T., & Markman, A. B. (1998). Category learning by inference and classification. *Journal of Memory and language*, *39*(1), 124-148.

The Height Premium: When Shorter Men Pay More

Nuket Serin, Florida International University, USA
Jayati Sinha, Florida International University, USA

EXTENDED ABSTRACT

Across cultures, people who are above average height are more prosperous, successful, and considered more attractive (Jackson and Ervin 1992; Judge and Cable 2004). However, men who are below average height function more poorly in social spheres (Stulp and Barrett 2016), such as dating and marriage (Lynn and Shurgot 1984; Pawlowski and Koziel 2002), workplace interactions (Judge and Cable 2004), and political elections (McCann 2001). Additionally, male height is positively associated with higher social status (Blaker et al. 2013). Given that status is essential for humans as it is related to personal and social advantages (Anderson et al. 2012; Anderson, Hildreth, and Howland 2015), having a lower status can create an aversive state for shorter men. Indeed, research has shown that shorter men tend to reduce feelings of inadequacy through indirect aggression (Knapen, Blaker, and Vugt 2018). Moreover, when consumers perceive being low in appearance or power, they tend to engage in compensatory behavior by purchasing products that convey status (Braun and Wicklund 1989; Hoegg et al. 2014; Rucker and Galinsky 2008, 2009). However, we know little about how being shorter than average height influences the status consumption of men.

Thus, this research is positioned at the intersection of two important research streams—one dealing with status consumption and the other with the effects of height for men. We posit that shorter men are more willing to purchase and more willing to pay (WTP) higher prices for status-signaling products to improve their low social standing induced by being short. This happens because shorter men have a higher desire for status, leading them to flaunt the status-signaling products they own. However, we argue that sense of purpose moderates the effect: shorter men who are more driven by a sense of purpose will be less likely to resort to status consumption.

To assess our hypotheses, we conducted three studies. Study 1 examines the impacts of height on product size preference. In Study 1, we show that men who are below average height are more willing to pay higher prices for a status product (larger TV). Study 1 also confirms that women differ from men in that shortness does not evoke status consumption among women. Therefore, the subsequent two studies (Studies 2 and 3) featured men only.

In Study 2, we test the underlying mechanism of our proposed effect in a different status consumption context. Study 2 replicates the results of Study 1 and shows that shorter men (vs. taller men) reported relatively higher preferences for the more expensive/less luxurious green (vs. less expensive/more luxurious non-green) backpack. Moreover, Study 2 provides process support via mediation by demonstrating that shorter men have a higher desire for products that can effectively signal status.

Our final Study 3 shows that sense of purpose moderates the effect of height and status consumption. Specifically, we demonstrate that sense of purpose moderates the effect of male height on status consumption. Indeed, only participants who had a lower sense of purpose showed alignment with the previous results. We find consistent effects across various height, namely measured in Studies 1 and 3, and manipulated in Study 2, across status consumption contexts, suggesting robust findings.

Our research has theoretical implications and makes several managerial contributions. To the best of our knowledge, we are the first to explore the relationship between height, status consumption, and a sense of purpose. Thus, our research contributes to the compensatory status consumption literature. Additionally, our findings provide useful and practical implications. For example, marketers can appeal to consumers who face the adverse effects of shortness by highlighting the status-signaling potential of their products and services.

REFERENCES

Anderson, Cameron, John Angus D. Hildreth, and Laura Howland (2015), "Is the Desire for Status a Fundamental Human Motive? A Review of the Empirical Literature," *Psychological Bulletin*, 141 (3), 574-601.

Anderson, Cameron, Sebastien Brion, Don A. Moore, and Jessica A. Kennedy (2012), "A Status Enhancement Account of Overconfidence," *Journal of Personality and Social Psychology,* 103 (4), 718-35.

Blaker, Nancy M., Irene Rompa, Inge H. Dessing, Anne F. Vriend, Channah Herschberg, and Mark Van Vugt (2013), "The Height Leadership Advantage in Men and Women: Testing Evolutionary Psychology Predictions about the Perceptions of Tall Leaders," *Group Processes & Intergroup Relations,* 16 (1), 17-27.

Braun, Ottmar L., and Robert A. Wicklund (1989), "Psychological Antecedents of ConspicuousConsumption," *Journal of Economic Psychology*, 10 (2), 161-87.

Hoegg, JoAndrea, Maura L. Scott, Andrea C. Morales, and Darren W. Dahl (2014), "The Flip Side of Vanity Sizing: How Consumers Respond to and Compensate for Larger than Expected Clothing Sizes," *Journal of Consumer Psychology*, 24 (1), 70-8.

Jackson, Linda A., and Kelly S. Ervin (1992), "Height Stereotypes of Women and Men: The Liabilities of Shortness for Both Sexes," *The Journal of Social Psychology*, 132 (4), 433-45.

Judge, Timothy A., and Daniel M. Cable (2004), "The Effect of Physical Height on Workplace Success and Income: Preliminary Test of a Theoretical Model," *Journal of Applied Psychology*, 89 (3), 428-41.

Knapen, Jill EP, Nancy M. Blaker, and Mark Van Vugt (2018), "The Napoleon Complex: When Shorter Men Take More," *Psychological Science*, 29 (7), 1134-44.

Lynn, Michael, and Barbara A. Shurgot (1984), "Responses to Lonely Hearts Advertisements: Effects of Reported Physical Attractiveness, Physique, and Coloration," *Personality and Social Psychology Bulletin*, 10 (3), 349-57.

McCann, Stewart J. H. (2001), "Height, Societal Threat, and the Victory Margin in Presidential Elections (1824–1992)," *Psychological Reports*, 88 (3), 741-42.

Pawlowski, Boguslaw, and Slawomir Koziel (2002), "The Impact of Traits Offered in Personal Advertisements on Response Rates," *Evolution and Human Behavior*, 23 (2), 139-49.

Rucker, Derek D., and Adam D. Galinsky (2008), "Desire to Acquire: Powerlessness and Compensatory Consumption," *Journal of Consumer Research*, 35 (2), 257-67.

Rucker, Derek D., and Adam D. Galinsky (2009), "Conspicuous Consumption Versus Utilitarian Ideals: How Different Levels of Power Shape Consumer Behavior," *Journal of Experimental Social Psychology*, 45 (3), 549-55.

Stulp, Gert, and Louise Barrett (2016), "Evolutionary Perspectives on Human Height Variation," *Biological Reviews*, 91 (1), 206-34.

'Operation Vin': Uncorking the Swedish Wine Market

Luigi Servadio, Jönköping International Business School, Sweden
Jacob Ostberg, Stockholm University, Sweden

EXTENDED ABSTRACT

Swedish consumers have access to one of the world's broadest assortments of wine through the state monopoly Systembolaget. What market dynamics led up to this focus on wine on a market where consumers' preferences had traditionally been for hard liquor and beer? Answering this question will give us important insight about the potential role of governance units as agents of market change, which is a perspective that has hitherto been overlooked.

During market change, governance units play an important role in setting the degrees of freedom that various market actors – from producers to retailers, distributors, service providers and consumers – have. In the market formation literature drawing boundaries between legitimate and illegitimate marketplace behaviors is typically the role that the state plays (e.g., Humphreys 2010). This fairly passive and reactive role of the state is a reflection of a particular ideological political system. There are, however, ideological political systems wherein the state plays a more active role in shaping market dynamics (Askegaard & Östberg 2019).

By drawing on strategic action field (SAF) theory (Fligstein and McAdams 2011; 2012) our case foreshadows the state as an active agent in creating market change. Wine consumption in Sweden took off in 1957 when the Swedish state, via its retailer Systembolaget, set in motion an initiative that worked as an endogenous shock to the market. In order to reconstruct the history of the strategic operation we relied on historical data sources. We collected online and physical archival data such as magazine and newspaper articles and books as well as historical cultural artefacts, such as original pamphlets, ration books, and objects. We also collected market-oriented ethnographical data.

The Swedish state first disrupted the Swedish market for alcohol. Traditionally, consumption of alcohol in Sweden has been focused on hard liquor. To change this the state decided to strategically promote a new alcoholic drinking culture through the massive campaign "*Operation Vin*". This can be seen as the origin of the mainstream consumption of wine in Sweden. The basic idea of *Operation Vin* was to promote a shock in the market to replace the current established market logic with a new one.

Second, the Swedish state attempted to frame wine as a viable alternative. In order to successfully facilitate such radical change, especially in a culturally laden area such as alcohol, "discursive framing that resonate with underlying cultural currents must take place" (Kjeldgaard et al., 2016, 53). Our empirical findings show how utilizing the culturally embedded connection between money and alcohol served as a tool to gain acceptance for this new practice.

Third, this gradually led the settlement of a new alcohol culture. Today, lots of different wines from around the world crowd the shelves of Systembolaget. For consumers lacking cultural immersion in the world of wine, choosing amongst the many different wines can be a daunting task. Many labels look similar, names are tricky and hard to pronounce and the taste can be difficult to understand and remember. In order to translate the seemingly complicated world of wine for the Swedish consumers Systembolaget took a number of initiatives.

The present study takes a SAF theory perspective (Fligstein & McAdams 2011) to discuss how markets may change as the result of strategic actions by governance. We thus contribute to a literature which conceptualize market change as the outcome of consumer collective action (e.g. Kjeldgaard et al. 2016; Laamanen & Skålén 2014). Extending these studies, we illustrate the paradoxical nature of governance units. Fligstein and McAdams contend that "ordinarily, then, governance units can be expected to serve as *defenders of the status quo* and are a generally *conservative force* during periods of conflict within the SAF" (emphasis added) (2011, 6). Previous studies echo this conservative nature of governance units in acting as opposing force to the challenger actors (Kjeldgaard et al. 2016) or even as a non-existent force in the field dynamics between incumbents and challengers (Pedeliento et al. 2020). Our case instead shows how Systembolaget before *Operation Vin* played the role of defender of the status quo. During and after *Operation Vin* the state played the role of promoter of change. Finally, studies building on strategic action field theory (Fligstein & McAdam 2012) typically show that exogenous shocks is the most frequent source of field-level changes (Pedeliento et al. 2020; Laamanen & Skålén 2014). In contrast, our case illustrates a situation where the field is changed by an endogenous shock operated by the governance unit, that typically defends the status quo.

REFERENCES

Askegaard, S., & Östberg, J. (eds.) (2019). *Nordic Consumer Culture: State, Market and Consumers*. London, UK: Palgrave Macmillan.

Fligstein, N., & McAdam, D. (2011). "Toward a General Theory of Strategic Action Fields," *Sociological Theory*, *29*(1), 1–26.

Fligstein, N. and McAdam, D. (2012), *A Theory of Fields*. Oxford: Oxford University Press.

Humphreys, A. (2010). "Megamarketing: The creation of markets as a social process," *Journal of Marketing*, *74*(2), 1–19.

Kjeldgaard, D., Askegaard, S., Rasmussen, J. Ø., & Østergaard, P. (2016). "Consumers' collective action in market system dynamics," *Marketing Theory*, *17*(1), 51–70.

Laamanen, M., & Skålén, P. (2015). "Collective–conflictual value co-creation," *Marketing Theory*, *15*(3), 381–400.

Pedeliento, G., Andreini, D., & Dalli, D. (2020). "From Mother's Ruin to Ginaissance: Emergence, settlement and resettlement of the gin category," *Organization Studies*, *41*(7), 969–992.

Delaying Reward Choice: Anticipating Choice Is More Motivating Than Choice Itself

Marissa A. Sharif, The Wharton School of the University of Pennsylvania, USA
Raghuram Iyengar, The Wharton School of the University of Pennsylvania, USA

EXTENDED ABSTRACT

Imagine that you want consumers to complete some marketing research surveys about your company. As a result, you decide to offer them their choice from a set of rewards, depending on the number of surveys they complete. However, you are debating *when* it is best to have them make the choice between the rewards. In five real-behavior studies (N = 3,511), we demonstrate that consumers are more motivated with a delayed (vs. immediate) reward choice.

In Study 1, 600 participants from Amazon Mechanical Turk were informed that the study had two parts. In the first part of the task, they would be asked to answer 40 matrix task questions. In the second part of the task, they would be asked to type a series of CAPTCHAs, which they were informed was considered to be dull and frustrating. Depending on the number of matrix tasks they solved, they could substitute the CAPTCHA task with another more enjoyable task. There were 5 enjoyable tasks they could replace the CAPTCHA task with: watch a funny video about cats (requires 40 matrix tasks), watch funny ads (requires 30 matrix tasks), do a word search (requires 20 matrix tasks), read funny cartoons (requires 15 matrix tasks), and watch a clip of a national geographic video (requires 10 matrix tasks).

After learning about the task, in the Immediate condition, participants were asked to temporarily indicate which activity they would like to complete instead of the CAPTCHA task. Participants were **not** constrained to this choice and were aware they were not constrained. In the Delayed condition, participants were not asked to make this temporary choice.

Participants in both conditions then began the matrix task. After every matrix question, participants had the option to skip completing them to move on to the CAPTCHA task. Participants completed more matrix questions in the Delayed condition than in the Immediate condition ($p = .004$).

Study 2 followed the same design as Study 1; however, we measured motivation in a different manner: we asked participants how many matrix tasks they wanted to complete. We replicated our main effect: participants chose and thus completed more matrix tasks in the Delayed condition than in the Immediate condition ($p = .001$).

In Study 3, we aimed to examine the underlying process behind the effect. We propose that consumers with a delayed reward choice anticipate greater enjoyment from choosing than those who make an immediate non-binding choice, and this greater anticipatory enjoyment of choosing drives motivation. This study followed a similar design as Study 2. Participants in the Immediate condition made a non-binding reward choice. Afterwards, participants in both conditions were asked about their anticipated enjoyment of choosing, "After completing the first part of the study, depending on the number of matrix tasks you complete, you will choose among a set of activities to replace the CAPTCHA task with. How much do you think you will enjoy choosing among the more enjoyable activities to replace the CAPTCHA task with?" on a 100-point scale.

Afterwards, participants were asked to indicate the number of matrix tasks they wanted to complete prior to goal pursuit. As predicted, participants chose to complete more matrix tasks in the Delayed condition than in the Immediate Condition ($p = .031$). Participants anticipated that it would be more enjoyable to make a choice between the rewards in the Delayed (vs. Immediate) condition ($p <$ .001). Further, the greater anticipatory enjoyment of choosing significantly mediated the effect, (95% CI = [-.93, -.24])

In Study 4, we examined whether (1) our effect replicates with monetary rewards and with a different task (2) and if immediately *ranking* rewards will similarly lead consumers to be less motivated. Thus, in this study, we assessed whether merely deliberating on a future choice, via non-consequential ranking rather than a non-binding choice, can similarly lead consumers to be demotivated, relative to delaying when consumers deliberate on their choice. Lastly, we examined how immediately ranking rewards compares to being constrained to one reward.

604 participants had the opportunity to type 100 word sets. They received 20 points for each word set they typed, with each 10 points worth $0.01 towards a gift card. They could only redeem their points for one gift card at the end of the survey. Participants were randomly assigned to one of three conditions (Immediate-Not Constrained, Delayed, and Immediate-Constrained). At the start of the task, participants in both the Immediate-Not Constrained and Immediate-Constrained condition were asked to rank the gift cards in terms of how much they would like to have a $2 gift card to each of the stores listed above. After ranking the gift cards, participants in the Immediate-Constrained condition were informed that the gift card that they had ranked as most preferred would be the gift card they could redeem their points on at the end of the survey. They were restricted to this choice, and thus had no future choice among reward options. However, in the Immediate-Not Constrained condition, after the ranking task, participants were informed they could redeem their points for any one of the gift cards at the end of the survey. Thus, they were not restricted to any choice and were aware of this. In the Delayed condition, participants did not rank the gift cards until after typing the words and were informed they could redeem their points for any one of the gift cards at the end of the survey. We measured the number of word sets participants typed as our measure of persistence.

Participants typed more word sets in the Delayed condition than in the Immediate-Not Constrained condition ($p = .010$) and the Immediate-Constrained condition ($p = .016$). There was no difference between the Immediate-Constrained conditions and the Immediate-Not Constrained conditions ($p = .866$).

Across five studies, we document the motivating effect of delayed reward choice. In order for rewards programs to be the most motivating, our findings suggest they should be designed such that consumers make a delayed reward choice.

REFERENCES

Bettman, J. R., Luce, M. F., & Payne, J. W. (1998). Constructive consumer choice processes. *Journal of Consumer Research*, *25*(3), 187–217.

Botti, S., & Hsee, C. K. (2010). Dazed and confused by choice: How the temporal costs of choice freedom lead to undesirable outcomes. *Organizational Behavior and Human Decision Processes*, *112*(2), 161–171.

Botti, S., & McGill, A. L. (2006). When choosing is not deciding: The effect of perceived responsibility on satisfaction. *Journal of Consumer Research*, *33*(2), 211–219.

Brehm, J. (1966). *A Theory of Psychology Reactance*. England: Oxford.

Brenner, L., Rottenstreich, Y., & Sood, S. (1999). Comparison, grouping, and preference. *Psychological Science*, *10*(3), 225–229.

Chernev, A. (2006). Decision Focus and Consumer Choice among Assortments. In *Journal of Consumer Research, Inc.* • (Vol. 33).

Locke, E. A., & Latham, G. P. (1990). *A theory of goal setting & task performance.* Prentice- Hall, Inc.

Luce, M. F. (1998). Choosing to Avoid: Coping with Negatively Emotion-Laden Consumer

Decisions. *Journal of Consumer Research*, *24*(4), 409–433. https://doi.org/10.1086/209518

Luce, M. F., Bettman, J. R., & Payne, J. W. (1997). Choice processing in emotionally difficult decisions. *Journal of Experimental Psychology: Learning, Memory, and Cognition*, *23*(2), 384.

Luce, M. F., Bettman, J. R., & Payne, J. W. (2001). Emotional decisions: Tradeoff difficulty and coping in consumer choice. *Monographs of the Journal of Consumer Research*, (1), 1–209.

Malhotra, N. K. (1982). Information load and consumer decision making. *Journal of Consumer Research*, *8*(4), 419–430.

Payne, J. W., Payne, J. W., Bettman, J. R., & Johnson, E. J. (1993). *The adaptive decision maker*. Cambridge university press.

Shugan, S. M. (1980). The cost of thinking. *Journal of Consumer Research*, *7*(2), 99–111.

Wood, S. L. (2001). Remote purchase environments: The influence of return policy leniency on two-stage decision processes. *Journal of Marketing Research*, *38*(2), 157–169.

Wright, P. M., & Kacmar, K. M. (1994). Goal specificity as a determinant of goal commitment and goal change. *Organizational Behavior and Human Decision Processes*, *59*(2), 242–260.

Clothing Consumption: Developing a Theory of Mindful Consumption

Deirdre Shaw, University of Glasgow, UK
Katherine Duffy, University of Glasgow, UK

EXTENDED ABSTRACT

Increasing levels of consumption represent a formidable challenge to society. This raises important questions concerning how best to establish a more sustainable consumption culture. Research has suggested that mindfulness may provide an antidote to consumerism via encouraging conscious reflection of the impact of behavior (Bahl *et al*., 2016; Sheth *et al*., 2011). While mindfulness and sustainability would appear to complement one another, current insights are limited by weak results and lack definitional and measurement clarity (e.g., Fischer *et al.,* 2017). Mindfulness may offer the potential to be transformative and challenge consumerist understandings of prosperity, however, current research falls short of offering an empirically grounded theory of mindful consumption.

Sustainability and mindfulness

Mindfulness has received attention in research in sustainable consumption as a means to disrupt automatic thinking, enhance awareness and foster prosocial values and behaviors (e.g., Stanszus *et al*., 2017). While important in exploring the potential of mindfulness to encourage sustainable consumption, key concerns remain:

Definition - The precise meaning of mindfulness remains elusive, much of the research in sustainability, following scholarship more generally, focuses on attention enhancement and present moment awareness (Kabat-Zinn, 2003). Sheth *et al.* (2011) take a wider definition of mindfulness but do not provide guidance as to how to achieve a mindful mindset. Current definitions of mindfulness in research limits its scope in encouraging sustainable behaviors.

Ethics – We argue that approaches to mindfulness in sustainability are limited as they do not move beyond the self to compassion for others and the planet, and a questioning of current values and ideologies. Current conceptions of mindfulness, fail to recognize a role for ethics (e.g., Stanley *et al.,* 2015).

Research Design –Research to-date examining sustainability and mindfulness has been quantitative, using measurement scales (Fischer *et al.,* 2017). There are many different scales that claim to define and measure mindfulness, however, a rationale for scale selection is rarely provided and an evaluation of these is lacking.

Decontextualization - Within Mindfulness Based Stress Reduction and Mindfulness Based Cognitive Therapy (e.g., Stanley and Longden, 2016), there is an absence of critical enquiry to the conditions, ideologies and values that lead to, for example, unsustainable consumption behaviors (Walsh, 2016), abstracting mindfulness from our everyday lives.

Methodology

In approaching our empirically grounded theorization of mindful consumption, we focus on the context of clothing as presenting a pertinent challenge to sustainability. Employing a multi-method qualitative study: interviews (McCracken, 1988), wardrobe audits (Pilcher, 2011), diaries (Day and Thatcher, 2009) and videography (Hietanen *et al.,* 2014), we engaged with 18 'mainstream' consumers over a period of 1 year. The focus was on the subjectivity of the participants in seeking to better understand and identify the logics of action. The analysis integrated into an interactive, iterative process to build the critical insights pertinent to shifting consumers towards more sustainable clothing behaviors, offering mindfulness as a tool to facilitate the process.

Findings

We orientate our findings around five stages of mindfulness whilst considering the role of ethics and links with sustainability (Table 1).

The first mindfulness phase of *recognition* led to consumer awareness and increased ability to notice and attend to potentially problematic issues associated with clothing (such as, lack of space, hoarding, repetitive buying, anxiety) and their own existing behaviors (e.g. impulse buying, wearing and discarding, excessive consumption). We found an *ethical sensitivity* whereby empathy regarding the negative impacts of clothing behaviors developed. Challenges emerged including, feelings of powerlessness, and a reluctance to problematize further.

In the second phase we identify *compassion*, whereby consumers transcended entrenched behaviors and questioned their clothing consumption (such as, the origins of the clothing, impact of production, volume owned and disposal channels). Consumers sought out and developed new knowledge, which enhanced the development of their *ethical knowledge.* Challenges remained, including, a lack of self-belief in their new found intentionality, also questioning led to consumers feeling paralysis around knowing how best to action knowledge into marketplace behaviors.

In the third phase of *responsibility*, consumers found a language to problematize and adapt their own clothing behaviors (e.g., detoxing, culling, not buying). We see *ethical competence* develop here as a key quality. Challenges prevailed, such as, how best to adopt more radical and transformative behaviors to align with this accepted responsibility.

The fourth mindfulness phase identified is *reflexivity*. Within this phase we found consumers centralizing their intentionality and finding liberation which conflated with their intentionality (e.g., replacing clothing buying with other activities, removing clothing apps from phones, checking garment labels). We see *ethical purpose* being invoked which guided reasoning and judgement. Challenges remained as to how to manage a potential misalignment between consumer values and behaviors, within the dominant market ideology.

In the final phase, we refer to the *courage* that the approach to mindfulness facilitated for consumers. Participants challenged and fully committed to a congruence between their value regime and behaviors. Challenges still prevailed for those who reached this phase in framing their value regime within an opposing dominant market ideology.

Conclusion

In offering an empirically grounded theory of mindful consumption we challenge linear and dyadic understandings (Sheth *et al.,* 2011; Bahl *et al.,* 2016); as to how mindfulness can be linked to sustainability at a given point in time. The experience and meaning of mindful consumption is different for different consumers at different points in time and, perhaps unsurprisingly, multiple challenges inhibit progress as mindful consumption evolves. We offer a richer picture of the potential of mindfulness to disrupt patterns of overconsumption and facilitate more sustainable approaches, the points of opportunity and barriers to change.

REFERENCES

Amel, E. L., Manning, C. M., & Scott, B. A. (2009). Mindfulness and sustainable behavior: Pondering attention and awareness as means for increasing green behavior. *Ecopsychology,* 1(1), 14-25.

Bahl, S., Milne, G. R., Ross, S. M., Mick, D. G., Grier, S. A., Chugani, S. K., & Schindler, R. M. (2016). Mindfulness: its transformative potential for consumer, societal, and environmental well-being. *Journal of Public Policy & Marketing,* 35(2), 198-210.

Condon, P. (2019). Meditation in context: Factors that facilitate prosocial behavior. *Current opinion in Psychology*, 28, 15-19.

Day, M., & Thatcher, J. (2009). "I'm really embarrassed that you're going to read this…": Reflections on using diaries in qualitative research. *Qualitative Research in Psychology*, 6(4), 249-259.

Fischer, D., Stanszus, L., Geiger, S., Grossman, P., & Schrader, U. (2017). Mindfulness and sustainable consumption: a systematic literature review of research approaches and findings. *Journal of Cleaner Production,* 162, 544-558.

Geiger, S. M., Grossman, P., & Schrader, U. (2019). Mindfulness and sustainability: correlation or causation?. *Current Opinion in Psychology*, 28, 23-27.

Hietanen, J., Rokka, J., & Schouten, J. W. (2014). Commentary on Schembri and Boyle (2013): From representation towards expression in videographic consumer research. *Journal of Business Research*, 67(9), 2019-2022.

Kabat-Zinn, J. (2003). Mindfulness-based interventions in context: past, present, and future. *Clinical Psychology: Science and Practice,* 10(2), 144-156.

McCracken, G. (1988). *The Long Interview* (Vol. 13). Sage.

Pilcher, J. (2011). No logo? Children's consumption of fashion. *Childhood*, 18(1), 128-141.

Rooney, D., Küpers, W., Pauleen, D., & Zhuravleva, E. (2019). A Developmental Model for Educating Wise Leaders: The Role of Mindfulness and Habitus in Creating Time for Embodying Wisdom. *Journal of Business Ethics*, 1-14.

Sheth, J. N., Sethia, N. K., & Srinivas, S. (2011). Mindful consumption: a customer-centric approach to sustainability. *Journal of the Academy of Marketing Science*, 39(1), 21-39.

Stanley, S., Barker, M., Edwards, V., & McEwen, E. (2015). Swimming against the Stream?: Mindfulness as a Psychosocial Research Methodology. *Qualitative Research in Psychology*, 12(1), 61-76.

Stanley, S., & Longden, C. (2016). Constructing the Mindful Subject: Reformulating Experience Through Affective–Discursive Practice in Mindfulness-Based Stress Reduction. In *Handbook of Mindfulness* (pp. 305-322). Springer, Cham.

Stanszus, L., Fischer, D., Böhme, T., Frank, P., Fritzsche, J., Geiger, S., & Schrader, U. (2017). Education for sustainable consumption through mindfulness training: Development of a consumption-specific intervention. *Journal of Teacher Education for Sustainability*, 19(1), 5-21.

Walsh, Z. (2016). "A meta-critique of mindfulness critiques: from McMindfulness to critical mindfulness." *In Handbook of Mindfulness,* pp. 153-166. Springer, Cham.

Bargaining with Algorithm: How Consumers Respond to the Offer Proposed by Algorithms Versus Human

Zhengyu Shen, Fudan University, China
Liyin Jin, Fudan University, China

EXTENDED ABSTRACT

Algorithms are involved in an increasing number of managerial decisions; given this trend, scholars have explored whether, when, and why people trust and are willing to use algorithms (Castelo, Bos, and Lehmann 2019; Logg 2018; Longoni, Bonezzi, and Morewedge 2019). Although these studies have advanced our knowledge on how to increase human decision-makers' reliance on algorithms when the algorithms outperform humans, the default role of algorithms assumed in the literature is that of an "assistant" for human decision-makers to improve their outcomes, overlooking other roles (e.g., opponents, counterparties) that algorithms might play in human-algorithm interactions.

The present research aims to examine this overlooked question in the context of human-algorithm negotiations. As a social interaction between two or more parties who aim to influence each other to accept their proposal regarding the value of a specific object (Maaravi, Ganzach, and Pazy 2011), negotiation occurs throughout consumers' everyday lives and has historically been viewed as an activity that takes place between humans (Purdy, Nye, and Balakrishnan 2000). Due to the increasing usage of algorithms with the ability to negotiate, it is possible that consumers can choose to bargain the price/ bid with robots in platforms such as eBay.

Past research suggests that laypeople believe that algorithms will be more effective at objective tasks that require logical, rule-based and quantitative analysis (Castelo et al. 2019; Haslam et al. 2008; Logg, Minson, and Moore 2019). As a result, algorithm appreciation seems lower among less numerate people (Logg et al. 2019). Similarly, consumers also believe that, on average, algorithms are more accurate than humans in calculating and forecasting tasks, and therefore, they show less tolerance for algorithms after seeing them err (Dietvorst et al. 2015; Logg et al. 2019). The reason algorithms provide more accurate forecasts and are more effective in quantitative analysis than humans is that they are assumed to be able to integrate huge amounts of information as inputs when making decisions and to process information without constraints related to computational capability (Hedén et al. 1997). On the other side, in the context of negotiation, Mason et al. (2013) found that negotiators who use precise first offers (i.e., $5115) made more conciliatory counteroffers because they seem more informed of the good's true value than negotiators who used round first offers (i.e., $5000).

Based on these findings, the current research hypothesized that consumers would assume that the initial offer is more reasoned when it is perceived as being accurate, which can be influenced by whether it comes from algorithms or humans. This perception of accuracy will lead consumers to believe that the room for negotiation is limited; thus, they will adjust the counteroffer less. If this mechanism exists, we can expect that once this belief is challenged, the proposed effect will disappear or even reverse. For example, people judged slow algorithmic predictions as being less accurate while they regarded slow human-generated predictions as being more accurate (Efendić, Van de Calseyde, and Evans 2020). Also, if the initial offer proposed by an algorithm is not reasonable (e.g., a very round price), consumers may no longer assume that the decisions made by this algorithm are accurate because they will suspect that the algorithm made the err. We thus consider two important boundary conditions

(respond speed and precision of initial offer) that might lead to break individual's lay belief between algorithm and accuracy.

Study 1 ($N = 204$) adopted a two-cell between-subject design. Participants were asked to negotiate the purchasing price of coffee beans as a hotel manager. They received the initial offer ($246) either from an algorithm or a person (sales manager), then they chose to accept or reject this price. If they accepted the initial offer, the negotiation ended as is; if they rejected this initial offer, they were prompted to make a counteroffer, i.e., a price that was lower than the initial offer. Regardless of what counteroffer (i.e., what price the participants proposed to counter the initial offer) the participants made, their counterparty (human or algorithm) always rejected the counteroffers and asked the participants to make another counteroffer (e.g., a higher affordable price). The negotiating process continued up to three rounds. We found a significant effect of the counterparty type manipulation on counteroffer adjustment[1], such that the participants in the algorithm condition adjusted their counteroffer less compared to those in the human condition ($t(202) = 2.24$, $p = .027$). Also, we found that the effect of counterparty type (algorithm vs. human) on counteroffer adjustment was sequentially mediated by the perception of accuracy and room for negotiation (indirect effect = .41, 95% *CI* [0.01 to 1.09]).

Study 2 ($N = 209$) adopted a 2 (counterparty type: algorithm vs. human) x 2 (response speed: fast vs. low) between-subjects design. Participants were asked to sell a used decorative carpet on an online recycling platform and bargain the selling price with either an algorithm or a staff. We manipulated the response speed by differentiating the response time either the algorithm or the staff had to make the quote in each round. We found that in the fast respond condition, when the initial offer came from an algorithm, the participants who believed that they were bargaining with an algorithm (vs. human) adjusted their counteroffer less ($F(1, 205) = 4.46$, $p = .036$). However, this pattern reversed when the counterparty's response speed was slow ($F(1, 205) = 28.26$, $p < .001$).

Study 3 ($N = 289$) tested another potential moderator—the precision of the initial offer (precise vs. round). In the precise initial offer condition, the initial offer proposed either by algorithm or human staff was $317, whereas in the round initial offer condition, the initial offer proposed either by algorithm or human staff was $300. The results suggested that when the initial offer itself was precise, the participants who received the offer from an algorithm adjusted the counteroffer less, compared to the participants who received the offer from a staff ($F(1, 285) = 18.38$, $p < .001$). However, this pattern disappeared when the initial offer itself was round ($F(1, 285) = 1.67$, $p = .197$).

REFERENCES

Castelo, Noah, Maarten W. Bos and Donald R. Lehmann (2019), "Task-Dependent Algorithm Aversion," *Journal of Marketing Research*, 56(5), 809-825.

---

1 We calculated the difference between the initial offer (i.e., $246) proposed by the counterparty and the counteroffer made by the participants in the last round of bargaining and used this index as the indictor of counteroffer adjustment.

Dietvorst, Berkeley J., Joseph P. Simmons and Cade Massey (2015), "Algorithm Aversion: People Erroneously Avoid Algorithms After Seeing Them Err.," *Journal of Experimental Psychology: General*, 144(1), 114.

Efendić, Emir, Philippe PFM Van de Calseyde, and Anthony M. Evans (2020), "Slow Response Times Undermine Trust in Algorithmic (but Not Human) Predictions," *Organizational Behavior and Human Decision Process*, 157(3): 103-114.

Haslam, Nick, Yoshihisa Kashima, Stephen Loughnan, Junqi Shi, and Caterina Suitner (2008), "Subhuman, Inhuman, and Superhuman: Contrasting Humans with Nonhumans in Three Cultures." *Social Cognition,* 26(2): 248-258.

Hedén, Bo, Hans Ohlin, Ralf Rittner and Lars Edenbrandt (1997), "Acute Myocardial Infarction Detected in the 12-lead ECG by Artificial Neural Networks," *Circulation*, 96(6), 1798-1802.

Logg, Jennifer M. (2018), "Theory of Machine: When Do People Rely on Algorithms?" working paper, Harvard Business School, Harvard University, Cambridge, MA.

Logg, Jennifer M., Julia A. Minson, and Don A. Moore (2019), "Algorithm Appreciation: People Prefer Algorithmic to Human Judgment." *Organizational Behavior and Human Decision Processes*, 151: 90-103.

Longoni, Chiara, Andrea Bonezzi, and Carey K. Morewedge (2019), "Resistance to Medical Artificial Intelligence," *Journal of Consumer Research*, 46(4), 629-650.

Maaravi, Yossi, Yoav Ganzach and Asya Pazy (2011), "Negotiation as a Form of Persuasion: Arguments in First Offers," *Journal of Personality and Social Psychology*, 101(2), 245.

Mason, Malia F., Alice J. Lee, Elizabeth A. Wiley and Daniel R. Ames (2013), "Precise Offers are Potent Anchors: Conciliatory Counteroffers and Attributions of Knowledge in Negotiations," *Journal of Experimental Social Psychology*, 49(4), 759-763.

Purdy, Jill M., Pete Nye and P. V. Balakrishnan (2000), "The Impact of Communication Media on Negotiation Outcomes," *International Journal of Conflict Management,* 11(2), 162-187.

Publicity as Justification

Kao Si, University of Macau, China
Xianchi Dai, Chinese University of Hong Kong, China

EXTENDED ABSTRACT

In many cases, social perceivers can infer opposite motives that can both plausibly underlie a given behavior. For example, a student may read fiction in the night before an important exam because he is addicted to the book and lacks self-discipline, or because he is trying to relieve himself of stress and getting better prepared for the exam. In this research, we focus on such behaviors which are only *apparently negative*. By apparently negative behaviors we mean behaviors that seem to be inconsistent with relevant norms or goals in appearance but are not necessarily so in nature. While negative construal might be the predominant response for such behaviors, in the current research, we investigate an important question: when would social perceivers be more likely to construe them positively? Put differently, what affects social perceivers' choice of construal of such apparently negative behaviors?

Theory and Hypothesis

Publicity, or the state of being observed by others, can influence people's behaviors via several mechanisms (e.g., Ratner and Khan 2002; Zajonc 1965). One major way through which publicity can exert its effects is that being observed by others activates people's image or reputational concerns which shape their behaviors more in line with social norms and others' positive expectations (Leary and Kowalski 1990; Schlenker 2003). For example, cues of being observed increase people's prosocial and ethical behaviors (Fehr and Fischbacher 2003; Kurzban et al. 2007) whereas anonymity prompts people to engage in socially deviant behaviors (Diener, Fraser, Beaman, and Kelem 1976).

Research in attribution theory revealed that people are much more likely to engage in more extensive forms of causal analyses about the possible causes of an outcome when the outcome disconfirms rather than confirms their expectations (Pyszczynki and Greenberg 1981; Weiner 2012; Wong and Weiner 1981). This is because for outcomes which conform to their expectations, people are disposed to construe or explain them using pre-existing and predominant causal theories or heuristics which are low in cognitive costs (Pyszczynki and Greenberg 1981; Wong and Weiner 1981). To the extent that publicity of an apparently negative behavior disconfirms social observers' expectations regarding the actor's image concerns, it should instigate the observers to search for alternative causes or motives that could explain or rationalize the behavior with regard to their expectations (Jones and Davis 1965; Kelley 1973).

Therefore, social observers, in an effort to make their construal of an apparently negative behavior more in line with their expectations about the actor, might strive to explain or rationalize the behavior in a positive light. In other words, we propose that social observers should evaluate the behavior to be *relatively* more positive when they are done in public than when they are done in private. Further, we propose that social perceivers could reach relatively more positive construal of the behavior via both weaker inferences about the negative motives or impacts of the behavior and stronger inferences about the positive motives or impacts of the behavior.

Moreover, we propose two boundary conditions of the current hypothesis. First, there must be certain degrees of ambiguity in interpreting the nature of the behavior. If the behavior unambiguously violates pertinent norms or goals, it becomes a negative behavior in nature, leaving no alternative choice for people's construal. Second,

the effect may only occur when social observers perceive the actor to have adequate agency in the situation. Here we refer to *agency* as the extent to which the actor has control or discretion in how the behavior is carried out. If publicity of the behavior is the result of some external factors that are uncontrollable to the actor, then it does not necessarily disconfirm social observers' expectations regarding the actor's image concerns.

In the following parts of this paper, we describe three experiments that provide support to our propositions. Experiment 1 demonstrated the effect in moral judgment and showed that it only occurred when there was room in interpreting the nature of the behavior. Experiment 2 demonstrated the effect in the context of goal pursuit and showed that it emerged when the actor had high agency but not when the actor had low agency. Finally, Experiment 3 provided evidence that it disconfirmed social observers' expectations when an apparently negative behavior was done in public than when it was done in private, and that disconfirmation of expectations prompted social observers to construe the behavior more positively.

Experiment 1

Method. Three hundred one participants (M_{age} = 36.55, SD_{age} = 11.32; 54% male) took part in an online experiment. They were randomly assigned to conditions of a 2 (public versus private) × 2 (rule: absent versus present) between-participants design. Participants were told that this was a short study about workplace behavior. Participants in the rule-absent condition read the following scenario:

> *Alex works in a grocery store. The store throws away all unsold perishable items of the day. Alex often takes some of these leftover foods home. Alex does it publicly (privately), where everybody (nobody) could see.*

Participants in the rule-present condition read the same scenario but also read that there is explicit rule prohibiting employees from taking the leftover foods. After reading the scenario, participants were asked to evaluate Alex's behavior by indicating the extent to which they thought that it was appropriate/acceptable (1: not at all appropriate/acceptable, 7: very appropriate/acceptable). Their answers to the two items were averaged to form a single measure (r = .83). Finally, as in other experiments, participants reported their demographic information.

Results. Analysis of participants' behavior evaluation as a function of publicity and rule-presence showed that rule-presence had a main effect, $F(1, 297) = 55.51$, $p < .001$. Not surprisingly, participants' evaluation of the behavior was much more positive when there was no explicit rule that inhibited the behavior ($M = 5.26$, $SD = 1.51$) than when there was ($M = 3.85$, $SD = 1.79$), $d = .85$. The main effect of publicity was not significant, $F < 1$.

Importantly, the analysis revealed a significant interaction effect, $F(1, 297) = 8.81$, $p = .003$, partial $\eta^2 = .029$. Consistent with our hypothesis, planned contrasts showed that when there was no explicit rule that inhibited the behavior, participants evaluated the behavior to be significantly more positive when it was done in public ($M = 5.53$, $SD = 1.33$) than when it was done in private ($M = 4.99$, $SD = 1.64$), $F(1, 297) = 4.08$, $p = .044$, $d = .36$. In contrast, when the behavior violated an existing rule, participants evaluated it significantly less favorably when it was done in public ($M = 3.57$, $SD = 1.79$) than

when it was done in private ($M = 4.14$, $SD = 1.75$), $F(1, 297) = 4.58$, $p = .033$, $d = .32$.

Experiment 2

Method. Two hundred five participants ($M_{age} = 35.10$, $SD_{age} = 11.67$; 52% male) took part in an online experiment. They were randomly assigned to conditions of a 2 (public versus private) × 2 (agency: high versus low) between-participants design. In the high-agency conditions, participants read the following scenario:

> *Aaron is going to take the SAT soon and has been preparing for the exam. The exam is important and Aaron knows that he should concentrate on his study. However, Aaron also wants to finish a fiction book he has started. As a result, Aaron reads the book for about one hour every night before he studies for the exam. He reads the book at home publicly (privately), where his family could (could not) see.*

Participants in the low-agency conditions read the same scenario, except that the last sentence of the above scenario was replaced by the following paragraph:

> *Aaron used to read books either in his own bedroom or in the living room. However, the lighting in Aaron's bedroom (the living room) has been malfunctioning recently and Aaron has to read the book in the living room (his own bedroom), where his family could (could not) see.*

All participants then evaluated Aaron's behavior by indicating the extent to which they thought that it was appropriate/suitable for his study goal (1: not at all appropriate/suitable, 7: very appropriate/suitable). Their answers to these two items were again combined to form a single measure ($r = .73$). On the next pages, participants reported the strength of their inferences about both the negative impacts (e.g., "reading the book hurts exam preparation") and the positive impacts (e.g., "reading the book helps reduce stress") of the behavior by answering some relevant questions.

Results. Analysis of participants' behavior evaluation as a function of publicity and agency revealed only a significant interaction effect, $F(1, 201) = 9.48$, $p = .002$, partial $\eta^2 = .045$. Consistent with our hypothesis, planned contrasts showed that in the high-agency conditions, participants evaluated the behavior to be significantly more positive when it was done in public ($M = 4.91$, $SD = 1.57$) than when it was done in private ($M = 4.03$, $SD = 1.33$), $F(1, 201) = 8.99$, $p = .003$, $d = .60$. In the low-agency conditions, however, the difference in behavior evaluation between the public ($M = 4.57$, $SD = 1.62$) and the private condition ($M = 4.98$, $SD = 1.44$) was non-significant, $F(1, 201) = 1.89$, $p = .170$.

Furthermore, results about participants' inferences about the negative and positive impacts of the behavior were largely parallel to their behavior evaluation. That is, in the high-agency conditions, participants agreed to a significantly less (greater) extent that reading fiction would negatively (positively) impact the student's exam preparation when the student read in public than when he read in private, ps < .05. The differences became nonsignificant in the low-agency conditions, Fs < 1.

In the high-agency conditions, we further tested the indirect effects of publicity on behavior evaluation via both weaker inferences about the negative impacts of the behavior and stronger inferences about the positive impacts of the behavior. The two constructs were examined as simultaneous mediators. With 5000 bootstrap samples, the indirect effect of inferences about the negative impacts of the behavior was estimated to be .21 (boot $SE = .13$), with a 95% bias-

corrected confidence interval (.03, .56) excluding zero. The indirect effect of inferences about the positive impacts of the behavior was estimated to be .38 (boot $SE = .17$), with a 95% bias-corrected confidence interval (.09, .77) excluding zero. The results therefore suggested that the effect of publicity on behavior evaluation was driven by these two routes.

Experiment 3

Method. One hundred one participants ($M_{age} = 34.85$, $SD_{age} = 11.23$; 49% male) took part in an online experiment. They were randomly assigned to two between-participants conditions (public versus private). Experiment 3 used a similar goal pursuit context as that in Experiment 2. Participants first read that Aaron read fiction every night before the exam and were asked whether they would expect Aaron to read it at home publicly or privately (1: Aaron is likely to read the fiction privately, 7: Aaron is likely to read the fiction publicly). On the next page, participants continued to read that Aaron read the book publicly or privately and indicated the extent to which Aaron's behavior confirmed their expectation (1: very much disconfirm my expectation, 7: very much confirm my expectation). Finally, participants were asked to write down their thoughts about why Aaron would read fiction at home publicly (privately) during exam preparation. They were told that their task was to explain Aaron's behavior and to see its implications for Aaron's goal attainment.

Results. Participants expected that Aaron was more likely to read the fiction at home privately rather than publicly, $M = 2.92$ ($SD = 1.60$), which was significantly lower than the midpoint (4) of the scale, $t = 6.76$, $p < .001$. Accordingly, Aaron's behavior (i.e., reading fiction at home publicly [privately]) was more likely to disconfirm participants' expectation in the public condition ($M = 3.60$, $SD = 1.99$) than in the private condition ($M = 5.41$, $SD = 1.70$), $F(1, 99) = 24.25$, $p < .001$, $d = .98$.

Next, we analyzed participants' explanations about the possible causes or motives that underlay Aaron's behavior. Two research assistants who were blind to the current hypothesis independently grouped the explanations into three categories. The first category included all explanations that implied a conflict between reading fiction and the attainment of the study goal while the second category included all explanations that endorsed positive impacts of reading fiction on the attainment of the study goal. Explanations that did not clearly suggest a negative or a positive impact of Aaron's behavior on his goal attainment were categorized as "others". Initial agreement between the two research assistants was 90%, and disagreements were solved through discussion.

Categorization of participants' explanations differed significantly across the two conditions, $\chi^2(2) = 39.63$, $p < .001$. The majority of participants in the private condition (71%; 36/51) construed Aaron's behavior negatively whereas only a small proportion of participants in the public condition (10%; 5/50) did so, $\chi^2(1) = 38.43$, $p < .001$. Further supporting the current theorizing, significantly more participants in the public condition (34%; 17/50) construed the behavior positively than in the private condition (6%; 3/51), $\chi^2(1) = 12.57$, $p < .001$. In addition, significantly more explanations in the public condition (56%; 28/50) fell in the "others" category than in the private condition (24%; 12/51), $\chi^2(1) = 11.13$, $p = .001$.

General Discussion

Past research has revealed circumstances in which negative publicity turns positive. For example, overt self-derogation and negative acknowledgement can elicit social support and help enhance others' evaluation towards a person (Powers and Zuroff 1988; Ward and Brenner 2006). Publicity of negative information about a prod-

uct can sometimes increase rather than decrease consumer evaluations (Berger, Sorensen, and Rasmussen 2010; Ein-Gar, Shiv, and Tormala 2012; Shoham, Moldovan, and Steinhart 2017). We contribute to this stream of research by proposing and testing a new mechanism through which negative publicity is able to positively influence people's judgment about others.

Future research should further test the validity of the current mechanism by examining some additional moderators. First, the positive effect of publicity should be contingent on ease of justification. If justifications for the behavior are difficult to find, then people are less likely to arrive at positive conclusions in their causal analyses and thus the effect is less likely to emerge. Second, the effect should be less likely to occur for actors towards whom social perceivers hold certain negative impressions. This is because for these actors, the fact that they perform negative behaviors in public is unlikely to disconfirm the expectations of the social perceivers.

Another interesting question is that whether people would strategically use publicity as a justification for their own behaviors. Our observation is that people are often sophisticated enough to use such strategies to garner social approval (Powers and Zuroff 1988; Smith, Snyder, and Handelsman 1982; Ward and Brenner 2006). We believe that empirical work that investigates people's strategical use of publicity as justification would be meaningful and would greatly enrich our insight into many of the phenomena in an age of social media.

REFERENCES

Berger, Jonah, Alan T. Sorensen, and Scott J. Rasmussen (2010), "Positive Effects of Negative Publicity: When Negative Reviews Increase Sales," *Marketing Science*, 29 (5), 815-27.

Diener, Edward, Scott C. Fraser, Arthur L. Beaman, and Roger T. Kelem (1976), "Effects of Deindividuation Variables on Stealing among Halloween Trick-or-Treaters," *Journal of Personality and Social Psychology*, 33 (2), 178-83.

Ein-Gar, Danit, Baba Shiv, and Zakary L. Tormala (2012), "When Blemishing Leads to Blossoming: The Positive Effect of Negative Information," *Journal of Consumer Research*, 38 (5), 846-59.

Fehr, Ernst, and Urs Fischbacher (2003), "The Nature of Human Altruism," *Nature*, 425 (6960), 785-91.

Jones, Edward E., and Keith E. Davis (1965), "From Acts to Dispositions: The Attribution Process in Person Perception," in *Advances in Experimental Social Psychology*, Vol. 2, ed. Leonard Berkowitz, New York: Academic Press, 219-66.

Kelley, Harold H. (1973), "The Processes of Causal Attribution," *American Psychologist*, 28 (2), 107-28.

Kurzban, Robert, Peter DeScioli, and Erin O'Brien (2007), "Audience Effects on Moralistic Punishment," *Evolution and Human Behavior*, 28 (2), 75-84.

Leary, Mark R., and Robin M. Kowalski (1990), "Impression Management: A Literature Review and Two-Component Model," *Psychological Bulletin*, 107 (1), 34-47.

Powers, Theodore A., and David C. Zuroff (1988), "Interpersonal Consequences of Overt Self-Criticism: A Comparison with Neutral and Self-Enhancing Presentations of Self," *Journal of Personality and Social Psychology*, 54 (6), 1054-62.

Pyszczynski, Thomas A., and Jeff Greenberg (1981), "Role of Disconfirmed Expectancies in the Instigation of Attributional Processing," *Journal of Personality and Social Psychology*, 40 (1), 31-8.

Ratner, Rebecca K., and Barbara E. Kahn (2002), "The Impact of Private versus Public Consumption on Variety-Seeking Behavior," *Journal of Consumer Research*, 29 (2), 246-57.

Schlenker, Barry R. (2003), "Self-Presentation," in *Handbook of Self and Identity*, ed. Mark R. Leary and June P. Tangney, New York: Guilford Press, 492-518.

Shoham, Meyrav, Sarit Moldovan, and Yael Steinhart (2017), "Positively Useless: Irrelevant Negative Information Enhances Positive Impressions," *Journal of Consumer Psychology*, 27 (2), 147-59.

Smith, Timothy W., C. R. Snyder, and Mitchell M. Handelsman (1982), "On the Self-Serving Function of an Academic Wooden Leg: Test Anxiety as a Self-Handicapping Strategy," *Journal of Personality and Social Psychology*, 42 (2), 314-21.

Ward, Andrew, and Lyle Brenner (2006), "Accentuate the Negative: The Positive Effects of Negative Acknowledgment," *Psychological Science*, 17 (1), 959-62.

Weiner, Bernard (2012), "An Attribution Theory of Motivation," in *Handbook of Theories of Social Psychology*, Vol. 1, ed. Paul A. M. Van Lange, Arie W. Kruglanski, and Tory Higgins, Newbury Park: Sage, 135-55.

Wong, Paul T., and Bernard Weiner (1981), "When People Ask "Why" Questions, and the Heuristics of Attributional Search," *Journal of Personality and Social Psychology*, 40 (4), 650-63.

Zajonc, Robert B. (1965), "Social Facilitation," *Science*, 149 (3681), 269-74.

Rethinking Perceptions of Disability: The Unintended Harm of Simplified Positive Inferences

Helen van der Sluis, Arizona State University, USA
Adriana Samper, Arizona State University, USA
Kirk Kristofferson, Ivey Business School, Canada

EXTENDED ABSTRACT

Understanding how disabilities shape marketplace interactions is crucial, particularly as businesses prioritize inclusion and accessibility (Laluc 2018). While policies like the Americans with Disabilities Act and Affirmative Action seek to protect and empower people with disabilities, recent work continues to document that individuals with disabilities face common misperceptions in day-to-day interactions (e.g., Lindsay and Cancelliere 2018), and suggests that the marketplace can improve its accessibility especially in terms of person-to-person interactions. Most marketing-relevant work on perceptions of disabilities generalizes to create one group, despite a wide range in the nature and manifestation of disability. For example, disabilities vary greatly in how visible they are and encompass a range of issues of varying severity. We seek to document how inferences of disability shape person-perception, how these inferences vary depending on the visibility of a disability, and how they can result in unidimensional impressions of individuals with disabilities.

We show that consumers view individuals with disabilities as more moral than those without disabilities due to the perception that they have overcome adversity (study 1). Importantly, we show that when the disability is less visible, these moral character perceptions weaken significantly (studies 1, 3), and when people with less (versus more) visible disabilities utilize accessibility resources afforded them, other consumers may be more apt to punish them (study 3). We also show that our stereotyped inferences of individuals with disabilities are limiting in that we expect their preferences to be less indulgent and highly utilitarian (study 3).

This work contributes to the limited research shedding light onto how disabled consumers are perceived and, ultimately, stereotyped. We extend work on person perception to reveal the powerful impact of physical cues of disability while highlighting how harsh fellow consumers can be in response to individuals with less visible disabilities.

Most prior research reflecting societal stereotypes of disability (Fiske et al. 2002; Cuddy et al. 2007; Lucas 2007) generalizes across various disabilities, yet physical disabilities vary broadly. For example, Furnham and Pendred (1983) found that attitudes toward individuals with physical disabilities are significantly more positive than attitudes toward individuals with mental disabilities, and Gouvier et al. (1994) showed that people talk more during interactions with individuals who display an observable physical disability than with those who do not display one. These findings suggest that perceptions of these groups differ despite both falling under the same umbrella of "disability." In the present research, we suggest that different instantiations of more and less visible physical disabilities can also differentially affect person perception.

Visual characteristics powerfully influence person perception (e.g., Dion et al. 1972; Otterbring et al. 2018) and associated evaluations of one's core character (Van Overwalle et al. 1999). Visible cues of disability are no exception. We propose that certain cues of physical disability positively affect perceptions of having overcome adversity, which influence perceptions of moral character. Moral inferences are readily assessed because moral character is diagnostic of whether a person may be harmful or helpful to others (Wojciszke, Bazinska and Jaworski 1998), thus making it a vital dimension of person perception (Goodwin, Piazza, and Rozin 2014; Goodwin 2015). Because many settings favor those who do not have a disability (Hehir 2007), distinct needs may emerge for those with a disability. Individuals with physical disabilities may have difficulty moving through their environments or performing daily activities (Goldenson, Dunham, and Dunham 1978), suggesting that they regularly overcome adversity simply by making their way through life. Relatedly, people often perceive those with disabilities as inspirational for having overcome adversity (Ellis 2008), an emphasis upon which may result in perceiving people with disabilities as having superhuman character (Clogston 1994).

We propose that these perceptions of having overcome adversity drive moral character inferences. Recent work from Schaumberg and Mullen (2017) suggests that seeing someone experiencing unavoidable misfortunes may positively affect our inferences of that person's moral character. People also tend to believe that adversity is beneficial for character (Affleck and Tennen 1996), and like to root for individuals who are struggling (Kim et al. 2008). Extant research shows that moral character inferences emerge even in situations where morality does not seem clearly relevant (Tannenbaum, Uhlmann, and Diermeier 2011; Samper et al. 2018). Because observable characteristics are salient and readily accessible, consumers make these inferences quickly and without much, if any, additional information. Importantly, based on our theorizing, among people whose disabilities are less visible, implicit assessments of adversity and hence, inferred moral character, are not as likely to be as strong, weakening the disability-morality link. Further, these perceptions are likely to be very dependent on disclosure of disability, which may or may not occur.

Notably, we also suggest that inferences made about adversity and morality among individuals with disabilities may have downstream consequences. First, perceived adversity itself should make the need to assuage hardship more salient, eliciting a greater focus on utilitarian solutions and choices for disabled individuals. Second, some work suggests that highly moral people should be more virtuous, and even may be nudged away from hedonic pursuits. Aristotle claimed that any pleasure-seeking in life was antithetical to being a moral human (*The Nichomachean Ethics*). As a result, we predict that because individuals with disabilities are already prone to being perceived as not fully human (Clogston 1994; Luborsky 1994; Murphy et al. 1988), increased perceptions of hardship and high moral character inferences may contribute to expectations that someone with a disability prefers more utilitarian items instead of more hedonic ones.

In study 1, we establish our basic effect in a context where spontaneous inferences are often made of others: while waiting in line. In a three-cell (no disability vs. low visibility disability vs. high visibility disability) between-subjects design, 385 TurkPrime participants imagined chatting with a person named Alex next to them in line. In both disability conditions, participants learn that Alex lives with cerebral palsy. However, in the low visibility condition, participants notice he doesn't have any visible indication of the disability, whereas in the high visibility condition, they note a wheelchair. In the no disability condition, participants simply notice Alex is wearing a blue shirt. Participants then rated Alex's morality (e.g., moral;

Samper et al. 2018; α=.91) and adversity overcome (e.g., "He has overcome adversity;" α=.85).

We found main effects of disability on both moral character ($F(2, 382) = 4.14$, $p = .016$; $\eta_p^2 = .02$) and adversity ($F(2, 382) = 26.83$, $p < .0001$; $\eta_p^2 = .12$). Participants thought Alex was significantly more moral when his disability was highly visible ($M = 5.72$) than when he had no disability ($M = 5.35$; $F(1, 382) = 8.07$, $p = .005$; $\eta_p^2 = .02$), and marginally more moral compared to when the disability was less visible ($M = 5.49$; $F(1, 382) = 3.21$, $p = .074$; $\eta_p^2 = .0083$). There was no significant difference between the no disability and low visibility disability conditions ($p = .29$). Shifting to adversity, participants felt Alex had overcome more adversity in the high visibility disability ($M = 5.88$) relative to either the low visibility ($M = 5.36$; $F(1, 382) = 18.67$, $p < .0001$; $\eta_p^2 = .047$) and no disability conditions ($M = 4.17$; $F(1, 382) = 194.49$, $p < .0001$; $\eta_p^2 = .34$). Further, perceived adversity overcome was higher in the low visibility versus no disability condition ($F(1, 382) = 92.27$, $p < .0001$; $\eta_p^2 = .19$).

To test our prediction that perceptions of having overcome adversity underlied Alex's morality inferences, we conducted a mediation analysis using disability as the independent variable, perceptions of adversity as the mediator, and morality as the dependent variable (Model 4, Hayes 2013; MacKinnon et al. 2007). A multicategorical mediation analysis (Hayes 2013) with the high visibility disability condition as our reference group revealed a significant indirect effect of perceived adversity when comparing the high versus low visibility disability condition (D1: B = -.18, CI_{95}: -.29, -.09), and also when comparing the high visibility disability to the no disability condition (D2: B = -.57, CI_{95}: -.84, -.34).

While study 1 examines inferences consumers make of those with disabilities, study 2 seeks to examine behaviors associated with these inferences in a gift-giving context. People typically expect more hedonic items as gifts (Lu et al. 2016). However, given the study 1 result that individuals with any disability face higher adversity than individuals without a disability, we expected that having explicit information about a disability will lead consumers to choose a more utilitarian (vs. hedonic) gift for that person, whether or not it is visible. In a three-cell (no disability vs. low visibility disability vs. high visibility disability) between-subjects design, 453 Prolific users imagined leading an office birthday present pool for a colleague they don't know well. In the two disability conditions, participants recall that when they first met, the colleague (Michelle) told them that she has lived with a physical disability since she was born. They either notice she gets around in a wheelchair (high visibility disability condition) or do not notice any visible indication of the disability (low visibility disability condition). Participants in the no disability condition recall that Michelle told them that she has actually lived in this city since she was born. After hearing that she sometimes gets massages, they choose between two massage options as the group gift: one, more utilitarian; the other, more hedonic. The description of the former was tested to be more utilitarian and less hedonic than that of the latter. Participants rated which massage the office should give Michelle (1 = Definitely Therapeutic Massage (Utilitarian), 7 = Definitely Luxury Massage (Hedonic)).

Results revealed a main effect of disability on choice rating ($F(2, 449) = 13.09$, $p < .0001$; $\eta_p^2 = .055$). Planned contrasts showed that participants tended to opt toward the utilitarian massage in the high ($M = 3.54$; $F(1, 449) = 15.49$, $p < .0001$; $\eta_p^2 = .033$) and low visibility disability ($M = 3.32$; $F(1, 449) = 22.94$, $p < .0001$; $\eta_p^2 = .048$) conditions relative to the no disability condition ($M = 4.54$), providing evidence for consumers expecting people with disabilities to prefer utilitarian (vs. hedonic) items, even as a gift, and whether the disability is more or less visible.

While study 1 showed that consumers assign individuals with disabilities elevated moral character and study 2 showed that consumers may be more likely to give these individuals utilitarian (vs. hedonic) gifts, both of these studies used inherently friendly contexts that are relatively information-rich. In study 3, we sought to examine the limits of the morality perceptions when information about the target is limited: when observing someone in a parking lot. Given less context, we expected that consumers would be harsher here than in study 1. We used a subtle signal of disability: parking in an accessible parking spot. In a three-cell (no disability vs. low visibility disability vs. high visibility disability) between-subjects design, 281 undergraduates imagined needing to go to the mall and having trouble finding parking. When they finally parked and walked toward the mall, participants in the two disability conditions see someone pull into the handicapped space in the first row, and participants in the no disability condition see someone pull into one last space in the first row. They then imagined seeing the person get out of the car: in the high visibility disability condition, participants saw the person take a wheelchair out of the car and wheel toward a physical rehabilitation building, and in the low visibility and no disability conditions participants saw the person get out of the car and walk to the building. Participants then evaluated the person's moral character ($\alpha = .95$) and adversity overcome ($\alpha = .83$).

Results again revealed main effects of disability on moral character perceptions ($F(2, 278) = 17.25$, $p < .0001$; $\eta_p^2 = .11$) and perceptions of adversity overcome ($F(2, 278) = 30.50$, $p < .0001$; $\eta_p^2 = .18$). Participants thought the person was marginally more moral in the high visibility disability ($M = 4.64$) versus no disability condition ($M = 4.32$; $F(1, 278) = 2.71$, $p = .1007$; $\eta_p^2 = .01$), and significantly more moral compared to when the disability was less visible ($M = 3.54$; $F(1, 278) = 32.43$, $p < .0001$; $\eta_p^2 = .10$). There was also a significant difference between no disability and low visibility disability conditions ($F(1, 278) = 16.53$, $p < .0001$; $\eta_p^2 = .056$). Planned contrasts of adversity revealed that adversity overcome in the high visibility disability condition was rated higher ($M = 5.34$) than either that in the low visibility ($M = 4.24$; $F(1, 278) = 59.76$, $p < .0001$; $\eta_p^2 = .18$) and no disability conditions ($M = 4.64$; $F(1, 278) = 23.81$, $p < .0001$; $\eta_p^2 = .079$). The perceived adversity overcome was lower in the low visibility disability condition than in the no disability condition ($F(1, 278) = 8.14$, $p = .005$; $\eta_p^2 = .029$).

We predicted that perceptions of having overcome adversity would mediate the elevated morality inferences of the person participants imagined seeing in the parking lot. We again utilized multicategorical mediation (Model 4, Hayes 2013; MacKinnon et al. 2007) using the same variables as in study 1. As predicted, the indirect path of disability on morality through perceptions of adversity overcome was significant in both pathways (D1: B = -.58, CI_{95}: -.80, -.38; D2: B = -.37, CI_{95}: -.55, -.21). Thus, we replicate the high visibility vs. no disability pattern from study 1, and newly demonstrate that with little information, consumers may actually be exceptionally harsh in their perceptions of adversity overcome and moral character toward individuals with less visible disabilities.

We find that consumers assign higher moral character to those with disabilities due to the perception that they have overcome adversity. However, these higher moral perceptions seem only to be linked to disability when people can easily observe the disability, and thus infer greater adversity. Further, these moral character elevations may not be all good, and in fact may lead people to only give gifts of utility instead of hedonic gifts (despite people typically preferring to give hedonic gifts (Lu et al. 2016)), thus depriving people with disabilities of normal life enjoyments. We contribute to existing theory by showing how the magnitude of a physical cue affects moral char-

acter. We also square psychology work on disability with the range in actual disabilities in the marketplace. Our work reveals that consumers with disabilities may still face stereotyping generalizations and those with less visible disabilities may face particularly harsh scrutiny in using necessary resources. We also highlight a potential difficulty in encouraging more hedonic gift-giving for individuals with disabilities. In recognizing this pattern, we highlight inherent contradictions in how we perceive and judge individuals with disabilities that can limit the intended goals of policies that attempt to protect and empower these individuals, ultimately suggesting that we still have a long way to go to alleviate person misperceptions.

REFERENCES

Affleck, Glenn, and Howard Tennen (1996), "Construing Benefits from Adversity: Adaptational Significance and Dispositional Underpinnings," *Journal of Personality*, 64 (4), 899-922.

Aristotle, The Nicomachean Ethics, translated with commentaries and glossary by Hippocrates G. Apostle (Dordrecht: D. Reidel Publishing Company, 1975), 1094a23– 25.

Clogston, John S. (1994), "Disability Coverage in American Newspapers," *The Disabled, the Media, and the Information Age*, 45-57.

Dion, Karen, Ellen Berscheid, and Elaine Walster (1972), "What is Beautiful is Good," *Journal of Personality and Social Psychology*, 24 (3), 285-290.

Ellis, Katie (2008), "Beyond the Aww Factor: Human interest Profiles of Paralympians and the Media Navigation of Physical Difference and Social Stigma," *Asia Pacific Media Educator*, 19, 23-35.

Fiske, S. T., Cuddy, A. J., Glick, P., & Xu, J. (2018). A model of (often mixed) stereotype content: Competence and warmth respectively follow from perceived status and competition (2002). In *Social cognition* (pp. 171-222). Routledge.

Furnham, Adrian, and Joanna Pendred (1983), "Attitudes Towards the Mentally and Physically Disabled," *British Journal of Medical Psychology*, 56 (2), 179-187.

Goldenson, Robert M., Jerome R. Dunham, and Charlis S. Dunham (1978), *Disability and Rehabilitation Handbook*, McGraw-Hill Companies.

Goodwin, Geoffrey P. (2015), "Moral Character in Person Perception," *Current Directions in Psychological Science*, 24 (1), 38-44.

Goodwin, Geoffrey P., Jared Piazza, and Paul Rozin (2014), "Moral Character Predominates in Person Perception and Evaluation," *Journal of Personality and Social Psychology*, 106 (1), 148-168.

Gouvier, William Drew, Robert C. Coon, Mark E. Todd, and Kristi Hulse Fuller (1994), "Verbal Interactions with Individuals Presenting with and without Physical Disability," *Rehabilitation Psychology*, 39 (4), 263-268.

Hayes, Andrew F. (2013), *Introduction to Mediation, Moderation, and Conditional Process Analysis: A Regression-Based Approach*, Guilford Press.

Hehir, Thomas (2007), "Confronting Ableism," *Educational Leadership*, 64 (5), 8-14.

Kim, JongHan, Scott T. Allison, Dafna Eylon, George R. Goethals, Michael J. Markus, Sheila M. Hindle, and Heather A. McGuire (2008), "Rooting for (and Then Abandoning) the Underdog." *Journal of Applied Social Psychology*, 38 (10), 2550-2573.

Laluc, Chloé (2018), "World Economic Forum Annual Meeting 2019 to Highlight Disability Inclusion [Press release]," World Economic Forum, Office of Public Engagement.

Lindsay, S., & Cancelliere, S. (2018). A model for developing disability confidence. *Disability and rehabilitation*, 40(18), 2122-2130.

Lu, J., Liu, Z., & Fang, Z. (2016). Hedonic products for you, utilitarian products for me. *Judgment & Decision Making*, 11(4).

Luborsky, M. R. (1994). The cultural adversity of physical disability: Erosion of full adult personhood. *Journal of Aging Studies*, 8(3), 239-253.

Lucas, Richard E. (2007), "Long-Term Disability is Associated with Lasting Changes in Subjective Well-Being: Evidence from Two Nationally Representative Longitudinal Studies," *Journal of Personality and Social Psychology*, 92 (4), 717-730.

MacKinnon, David P., Amanda J. Fairchild, and Matthew S. Fritz (2007), "Mediation Analysis," *Annual Review of Psychology*, 58, 593-614.

Murphy, R. F., Scheer, J., Murphy, Y., & Mack, R. (1988). Physical disability and social liminality: A study in the rituals of adversity. *Social Science & Medicine*, 26(2), 235-242.

Otterbring, Tobias, Christine Ringler, Nancy J. Sirianni, and Anders Gustafsson (2018), "The Abercrombie & Fitch Effect: The Impact of Physical Dominance on Male Customers' Status-Signaling Consumption," *Journal of Marketing Research*, 55 (1), 69-79.

Samper, Adriana, Linyun W. Yang, and Michelle E. Daniels (2017), "Beauty, Effort, and Misrepresentation: How Beauty Work Affects Judgments of Moral Character and Consumer Preferences," *Journal of Consumer Research*, 45 (1), 126-147.

Schaumberg, Rebecca, and Elizabeth Mullen, E. (2017), "From Incidental Harms to Moral Elevation: The Positive Effect of Experiencing Unintentional, Uncontrollable, and Unavoidable Harms on Perceived Moral Character," *Journal of Experimental Social Psychology*, 73, 86-96.

Tannenbaum, David, Eric Luis Uhlmann, and Daniel Diermeier (2011), "Moral Signals, Public Outrage, and Immaterial Harms," *Journal of Experimental Social Psychology*, 47 (6), 1249-1254.

Van Overwalle, F., Drenth, T., & Marsman, G. (1999). Spontaneous trait inferences: Are they linked to the actor or to the action?. *Personality and Social Psychology Bulletin*, 25(4), 450-462.

Wojciszke, Bogdan, Roza Bazinska, and Marcin Jaworski (1998), "On the Dominance of Moral Categories in Impression Formation," *Personality and Social Psychology Bulletin*, 24 (12), 1251-1263.

Predicting and Choosing for Others: How and Why We Fail

Stephanie M. Smith, UCLA, USA
Ian Krajbich, The Ohio State University, USA

EXTENDED ABSTRACT

Being able to learn another person's preferences and choose on their behalf are important skills for functioning successfully in society. Sometimes, we have to predict what others will choose. Other times, we need to make decisions on their behalf. Surrogate decision making happens throughout society, but past research in the area has established a robust and consistent finding: people are not very good at choosing what another person would choose for themselves (Fagerlin et al. 2001; Faro and Rottenstreich 2006; Fernandez-Duque and Wifall 2007; Garcia-Retamero and Galesic 2012).

Important, unresolved questions are exactly *how and why* people are bad at choosing for others. The research into *how* people fail is somewhat contradictory: while some research (e.g., Beisswanger et. al 2003; Hsee and Weber 1997) finds that people choose too riskily for other people, other research (e.g., Faro and Rottenstreich 2013; Stone et al. 2013) provides evidence that people choose too safely for others. Another discrepancy in the literature is whether people choose too similarly to their own preferences (as in Fagerlin et al. 2001) or not similarly enough (as in Givi and Galak 2017). Thus, in our study of *how* participants' predictions/choices for others differ from what the recipient would choose for themselves, we use methods designed to address/eliminate the potential reasons for these discrepancies.

Why people are bad at choosing for others is also an understudied issue. Does the failure arise from an innate inability to predict what others would choose for themselves? Or does it come from a misuse of available information? As humans, we use various sources of information to make our decisions, but sometimes we don't use it appropriately. There are a number of different types of information that surrogate choosers might rely on: (1) the preferences of the recipient, (2) their own preferences, and (3) societal norms/expectations. Across two studies, we investigate how these sources of information contribute to the decision process, using process-related analyses (i.e., mouse-tracking) to better understand why people choose what they do.

In Study 1, Participants (N = 44) first observed choices made by each of six deterministic algorithms (with a variety of risk preferences) and then predicted what the algorithms "chose" in a new set of decisions. Each trial comprised two options: a sure thing and a gamble. Participants earned money for each correct prediction. Participants also made incentivized choices for themselves. Participants were able to learn the "preferences" of the deterministic algorithms (average accuracy = 82%; table 1). There is a significant, positive relationship between the actual risk parameters of the algorithms and the risk parameters fitted on participants' predictions (regression of fitted risk parameter on actual risk parameter with random slope and intercept at the participant level, $\beta = 0.82$, $p < .0001$).

The design of Study 2 was very similar to Study 1, with the following differences. All participants (N = 165) observed choices made by 6 participants (with a variety of risk preferences) from Study 1. Then, participants either predicted what the recipients chose *or* chose for them in a new set of choices. In Condition P_S, participants earned money per correct prediction, similar to Study 1. In Condition P_O, a randomly selected *recipient* earned money for each correct prediction. In Condition C, a randomly selected *recipient* received the outcome from a participant's choice in a randomly selected trial. Throughout all observations and decisions, participants' mouse movements were tracked.

On average, the predictions from Condition P_S and P_O participants were more accurate than the choices from Condition C participants (Condition P_S: $t(108.5) = 3.40$, $p = .0009$; Condition P_O: $t(95.73) = 3.91$, $p = .0002$; table 1). There is a significant, positive relationship between the actual risk parameters of the recipients and the fitted risk parameters, based on participants' predictions/choices (Condition P_S: $\beta = 0.81$, $p < .0001$; Condition P_O: $\beta = 0.78$, $p < .0001$; Condition C: $\beta = 0.27$, $p < .0001$; Fig. 1). The slope in Condition C is significantly shallower than that of conditions P_S and P_O (ps < .001), implying that participants were significantly less sensitive to changes in recipient risk preference when choosing for them (vs. predicting what they would do).

The behavioral analyses above provide some answers about the process involved in predicting and choosing for others, but we are also interested in the time course of participants' mouse movements. As in Sullivan et al. (2014), we estimated the timing of three competing influences: (1) the participant's own preferences, (2) the recipient's preferences, and (3) expected value maximization. This analysis provides us with a temporal understanding of how three competing influences predict participants' mouse movements.

Recipient preferences (expected value and participant preferences) became predictive later (earlier) in condition C than in the prediction conditions. We also find a positive correlation between time advantage for the recipient variable and accuracy in predicting/choosing for the recipient (participant-preferences: $r(158) = 0.27$, $p = .0005$; expected value: $r(158) = 0.24$, $p = .002$). This implies that people for whom recipient preferences became predictive of mouse position earlier (relative to participant-preferences and expected value) were better at predicting/choosing in line with the recipient's preferences.

Overall, these two studies provide new insight into the choice process invoked when deciding for others. In general, when participants (or their recipients) were incentivized for predicting accurately, they were highly accurate. Mouse movements provide evidence for different temporal processes, not only across conditions, but also across individual people. We provide evidence for a connection in processing speed (of the recipient's preferences) and accuracy in choosing for them.

This project provides us with robust evidence that people (1) can learn the preferences of others, (2) can implement this learned information when incentivized to do so, (3) but do not implement this info (as accurately as they could) when they are simply asked to choose for others. Instead, they rely too heavily on other sources of info (i.e. expected value and their own preferences). These findings advance our understanding of prediction and choice in the surrogate decision domain.

REFERENCES

Beisswanger, Amy H., Eric R. Stone, Julie M. Hupp, and Liz Allgaier (2003). "Risk Taking in Relationships: Differences in Deciding for Oneself Versus for a Friend." *Basic and Applied Social Psychology*, 25(2), 121–135.

Fagerlin, Angela, Peter H. Ditto, Joseph H. Danks, and Renate M. Houts (2001). "Projection in Surrogate Decisions about Life-Sustaining Medical Treatments." *Health Psychology*, *20*(3), 166–175.

Faro, David, and Yuval Rottenstreich (2006). "Affect, Empathy, and Regressive Mispredictions of Others' Preferences under Risk." *Management Science*, *52*(4), 529–541.

Fernandez-Duque, Diego, and Timothy Wifall (2007). "Actor/Observer Asymmetry in Risky Decision Making." *Judgment and Decision Making*, *2*(1), 1.

Garcia-Retamero, Rocio, and Mirta Galesic (2012). "Doc, What Would You Do if You Were Me? On Self–Other Discrepancies in Medical Decision Making." *Journal of Experimental Psychology: Applied*, *18*(1), 38–51.

Givi, Julian, and Jeff Galak. (2017). "Sentimental Value and Gift Giving: Givers' Fears of Getting it Wrong Prevents Them from Getting it Right." *Journal of Consumer Psychology*, *27*(4), 473–479.

Hsee, Christopher K., and Elke U. Weber (1997). "A Fundamental Prediction Error: Self–Others Discrepancies in Risk Preference." *Journal of Experimental Psychology: General*, *126*(1), 45.

Stone, Eric R., YoonSun Choi, Wandi Bruine de Bruin, and David R. Mandel (2013). "I can take the risk, but you should be safe: Self-other differences in situations involving physical safety." *Judgment and Decision Making*, *8*(3), 250–267.

Sullivan, Nicolette, Cendri Hutcherson, Alison Harris, and Antonio Rangel (2014). "Dietary Self-Control Is Related to the Speed With Which Attributes of Healthfulness and Tastiness Are Processed." *Psychological Science*, 0956797614559543.

Robotic Relationships: Impact of Automation on Psychological Ownership

Leah Smith, University of Arkansas, USA
Randy Rose, University of Tennessee, USA
Heath McCullough, Auburn University, USA

EXTENDED ABSTRACT

"Alexa, begin vacuuming the living room." This simple verbal command accomplishes a previously routine task by delegating it to an automated product. Increasingly, such tasks are being accomplished by a verbal command to a smart home device or by a tap on a smartphone application without ever coming in contact with the end product.

Consumers achieve greater efficiency by not having to invest their own time and effort into routine tasks such as cleaning the floors or mowing the lawn. However, as this separation from products becomes more commonly integrated into consumers' lives, it also disturbs the normal consumer-product relationship development process. Just as digitally mediated communication changes how human relationships develop (Walther 1992), it will also impact how consumers perceive and relate to products. I propose that automation of products will lower consumers' psychological ownership of the target product and disrupt both the natural attitudinal and behavioral consequences that develop as a result.

Psychological ownership a cognitive and affective state of 'felt' ownership that develops towards a target, separate from any claims of legal ownership (Pierce et al. 2003). These feelings of ownership lead to positive attitudinal, motivational, and behavioral consequences related to the target (Pierce et al. 2003).

In marketing, psychological ownership has been used to explain how the ability to touch an object (or expected touch of an object) increases perceptions of ownership, and subsequent valuation (e.g. Atasoy and Morewedge; Peck and Shu 2009). However, other routes to psychological ownership, along with other potential consequences have largely been unexplored. Additionally, research has shown both contextual and individual differences play a role in how psychological ownership develops (Folse, Moulard, and Raggio 2012). Such differences are highlighted in previous research on psychological ownership of places (Asatryan and Oh 2008) and are proposed in the context of robotic service encounters (Van Doorn et al. 2017). I seek to demonstrate how mediated product interactions disrupt the process of psychological ownership development and produce predictable downstream consequences of relevance to marketers.

Smart technology has been extended to a variety of product categories including lighting, appliances, and many others. In many cases, such as thermostats and security systems, connected products offer greater capabilities and interactions than were possible before which actually increases the frequency of interaction. Under these conditions, psychological ownership may actually increase vs. traditional products because smart products are offering more information and enabling consumers to come to know the product more intimately. However, automated products are those that reduce or replace human interaction. Automated versions of traditional consumer products are already available for vacuum cleaners and lawn mowers, with self-driving cars on the immediate horizon. My research investigates how the automation of products impacts human interactions and relationship development with the product.

Developing predictions regarding how automation can disrupt psychological ownership requires an understanding of how ownership perceptions develop. As Pierce et al. (2003) explain, psychological ownership can develop in three ways: (1) through perceptions of control, (2) through acquisition of intimate knowledge of the target, or (3) as a consequence of investment of the self into the target. Some combination of the three mechanisms is also possible. Automated products operate independently, meaning without direct interaction. Although this may imply greater flexibility and convenience for the consumer, automated operation may undermine these routes to psychological ownership.

For example, a robotic vacuum cleaner can be conveniently operated while the legal owner is away from home. A traditional vacuum can be guided to directly address a problem area or go back over areas to pick up debris missed on the first pass. Robotic vacuums, by contrast, spend a predetermined amount of time covering all areas of the room equally rather than addressing a specific mess or high traffic area that may need extra attention. Debris left behind on the first pass will likely not be addressed in a second attempt. This may lead to feelings of a loss of control over how the product operates, especially if it means extra effort to repeat the cycle or picking up left behind pieces manually. Further, the same task done with a traditional vacuum provides direct feedback during operation. The operator can feel the weight of the vacuum in their hand, the noise provides confirmation of particles being picked up, the pull of resistance indicates the level of suction power. All of these help the operator to know the product more intimately and are absent when the product is automated. As the consumer interacts directly and repeatedly with the product, investment of the self into the product becomes more likely. All three routes to psychological ownership can be disrupted when products are automated, thereby leading to overall weaker psychological ownership perceptions. Formally stated:

Hypothesis 1: *Automated (traditional) products will undermine (enhance) feelings of psychological ownership toward a target.*

As a product becomes psychologically owned it develops a closer association with the self. This self-extension leads to more positive evaluations of the product (Belk 1988) because evaluating it closer to evaluating oneself, resulting in higher satisfaction. Over time, these higher evaluations of the product may also develop into attachment or an emotional bond between the consumer and the product (Kleine and Baker 2004).

Hypothesis 2: *Automated (traditional) products will have a negative (positive) impact on a) product satisfaction and b) emotional attachment, mediated by psychological ownership.*

Concurrently, behavioral outcomes of psychological ownership may also be disrupted by automation. Perceiving a product as part of the extended self also motivates consumers to preserve the object as a way of preserving the self (Belk 1988). This desire to preserve the product relationship may lead consumers to extend the life of that product through proactive maintenance behaviors. Additionally, preservation motives lead consumers to extend the relationship at time of replacement, leading to higher brand loyalty upon repurchase. These behavioral outcomes allow consumers to prolong and sustain the product relationship.

Hypothesis 3:   *Automated (traditional) products will have a negative (positive) impact on a) proactive maintenance behaviors and b) brand loyalty, mediated by psychological ownership.*

Evidence presented thus far has shown how automation may interfere with the way consumers interact with products and how that ultimately impacts the consumer-product relationship. However, understanding the process and routes to ownership allows marketers and designers to open new routes to psychological ownership. We believe anthropomorphizing automated products will mitigate the negative effect of automation.

Anthropomorphism occurs when people perceive humanlike characteristics in nonhuman creatures or objects (Epley, Waytz, Akalis, and Cacioppo 2008). When products are anthropomorphized, norms and expectations of the social world are more readily applied to the relationship with the product (Aggarwal and McGill 2012) leading to greater feelings of intimacy and subsequent psychological ownership. Additionally, anthropomorphized products allow owners to feel that the product is being operated by someone else, and not just moving randomly which may also restore feelings of control. Automated products have the capability to respond and adapt which will make them more readily anthropomorphized than traditional products. Therefore, we believe the effects of anthropomorphism on psychological ownership will be to ameliorate the negative impact of automation on psychological ownership.

Hypothesis 4:   *Anthropomorphism of products will attenuate the negative effect of automation on psychological ownership.*

Unlike previous studies of psychological ownership in marketing which focus on willingness to pay for an object prior to acquisition, I focus on the relationship dynamics that develop after usage. The differences in the way consumers experience traditional and automated products during ownership will change how psychological ownership develops and its downstream consequences.

Study 1

As an initial test of the hypotheses, I collected Amazon reviews of traditional and automated products to test for differences in the affective dimension of psychological ownership. Vacuum cleaners were chosen because they are currently the most widely adopted robotic product. Traditional and robotic vacuum cleaners vary in terms performance (suction power, dust bin capacity etc.). Therefore, the sample was restricted to 5-star reviews to control for those functional differences. The text of the combined reviews was analyzed using Linguistic Inquiry and Word Count software (LIWC; Pennebaker, Booth, and Francis 2015).

As expected, the emotional tone of the reviews for traditional vacuums was significantly more positive (98.95%) than those for robotic vacuums (85.59%, p<.01). This result suggests a weaker emotional connection to the automated product, even when initial satisfaction is high, and provides initial support for H_1. The more positive attitudinal response to the traditional product is indicative of the emotional characteristics of psychological ownership.

Study 2

Study 2 simulated the experience of product usage to understand the process of psychological ownership (H_1) development and its implications on attitudinal consequences of satisfaction (H_{2a}). In this study, a virtual driving experience was used to simulate product usage of either a traditional or self-driving car resulting in a 2 factor (product type: traditional vs. automated) experiment.

Participants were instructed to take a virtual test-drive of the car by driving two laps around the virtual track. Those in the self-driving condition were also told that it was a self-driving car and operated the car through voice commands. In the traditional car condition, participants controlled the car with the steering wheel and pedal controllers. Participants rated their psychological ownership of the car by indicating their agreement on a nine-point scale with five-items from Fuchs, Prandelli, and Schreier (2010) including: "Although I do not legally own this car yet, I feel like this is *my* car," "This car incorporates part of myself," "I feel that this car belongs to me," "I feel connected to this car," and "I feel a strong sense of closeness with this car," ($a = 91$).

As expected, psychological ownership was significantly higher for those in the traditional car condition ($M = 4.37$) than in the self-driving car condition ($M = 3.69$, $p = .03$), providing support for H_1. Similarly, satisfaction was higher for those who drove the traditional car ($M_{traditional} = 6.57$ vs. $M_{self-driving} = 5.76$, $p = .03$). Further, the effect on satisfaction was fully mediated by psychological ownership (= -.4808, 95% CI: -.9616 to - .0484). Providing support for H_{2a}.

Study 3

Study 3 collected field data from actual owners of traditional (n=301) and robotic (n=299) vacuum cleaners. As a full test of the model, I measured the psychological ownership, degree of anthropomorphism, and all of the downstream consequences of interest.

Results showed that traditional vacuum owners ($M_{traditional} = 4.57$) had significantly higher psychological ownership than robotic vacuum owners ($M_{automated} = 4.37$; $F(1,595) = 4.68$, $p = .03$) supporting H_1. This lowered psychological ownership fully mediated the effect on satisfaction (= -.0970, 95% CI: -.1888 to -.0095), emotional attachment (= -.1452, 95% CI: -.2771 to -.0178), providing support for H_2. Brand loyalty was also fully mediated by psychological ownership (= -.0562, 95% CI: -.1099 to -.0074) supporting H_{3b}. Psychological ownership partially mediated the effect on proactive maintenance behaviors (= -.0239, 95% CI: -.0498 to -.0025). However, indirect effect was still positive and significant indicating that other product attributes may contribute to greater need of ongoing maintenance.

Finally, adding anthropomorphism to the model as a moderator of the effect showed a positive interaction (p<.001) such that robotic owners who highly anthropomorphized the product, felt less loss of control which repaired some of the negative effect of automation on psychological ownership (index of moderated mediation: .0467, 95% CI: .0220 to 0769).

Currently about 32% of US households have begun to adopt some form of smart technology and that is forecasted to reach 53.1% of households by 2022 (Statista 2018). For consumers, automation allows for managing routine tasks more efficiently. However, this may lead consumers to feel more connected more to the interface device (smartphone or smart home device) rather than the end product itself. Previous research has explored types of consumer-product relationships and the downstream consequences of those relationships (e.g. Lastovicka and Sirianni 2011). Recent research in marketing has examined the effects of psychological ownership on product valuation pre-purchase (e.g. Atasoy and Morewedge 2017). I extend this line of research to show how differences in psychological ownership develop as a result of the product interface and demonstrate subsequent negative effects on post-purchase consumer-product relationships. Importantly, my work will also examine ways for marketers to overcome these limitations of automation.

Marketers need to understand how consumers interact and relate to products in order to avoid the consumer disconnect that may develop as a result of lowered psychological ownership. Unmanaged, this disconnect may lead to lower proactive maintenance behaviors, meaning lower aftermarket sales, and lower repurchase intent, meaning lower future sales. My research offers clear implications for managing customer lifetime value in the face of a highly automated future. If marketers incorporate affordance principles such as customization, they can not only potentially mitigate the negative effects of automation but also provide greater perceived differentiation and value to consumers.

REFERENCES

Aggarwal, Pankaj, and Ann L. McGill (2012), "When brands seem human, do humans act like brands? Automatic behavioral priming effects of brand anthropomorphism," *Journal of Consumer Research*, 39(August), 307-323.

Asatryan, Vahan S., and Haemoon Oh (2008), "Psychological Ownership Theory: An exploratory Application in the Restaurant Industry," *Journal of Hospitality & Tourism Research*, 32(August), 363-386.

Atasoy, Ozgun, and Carey K. Morewedge (2017), "Digital goods are valued less than physical goods," *Journal of Consumer Research*, 44(April), 1343-1357.

Belk, Russell W. (1988), "Possessions and the extended self," *Journal of Consumer Research*, 15(2), 139-168.

Epley, Nicholas, Adam Waytz, Scott Akalis, and John T. Cacioppo (2008), "When we need a human: Motivational determinants of anthropomorphism," *Social Cognition*, 26(2), 143-155.

Folse, Judith A. G., Julie G. Moulard and Randle D. Raggio (2012), "Psychological ownership: A Social Marketing Advertising Message Appeal?" *International Journal of Advertising*, 31(2), 291-315.

Fuchs, Christoph, Emanuela Prandelli, and Martin Schreier (2010), "The Psychological Effects of Empowerment Strategies on Consumers' Product Demand," *Journal of Marketing*, 74(1), 65–79.

Kleine, Susan S., and Stacey M. Baker (2004), "An integrative review of material possession attachment," *Academy of Marketing Science Review*, 1(January), 1-39.

Lastovicka, John L., and Nancy J. Sirianni (2011), "Truly, Madly, Deeply: Consumers in the Throes of Material Possession Love," *Journal of Consumer Research*, 38(August), 323-342.

Peck, Joann, and Suzanne B. Shu (2009), "The Effect of Mere Touch on Perceived Ownership," *Journal of Consumer Research*, 36(October), 434-447.

Pennebaker, James W., Roger J. Booth, Ryan L. Boyd, and Martha E. Francis (2015), Linguistic Inquiry and Word Count: LIWC2015. Austin, TX: Pennebaker Conglomerates (www.LIWC.net).

Pierce, Jon L., Tatiana Kostova, and Kurt T. Dirks (2003), "The State of Psychological Ownership: Integrating and Extending a Century of Research," *Review of General Psychology*, 7(March), 84-107.

Statista (2018), Smart Home Market Report. https://www.statista.com/outlook/279/109/smart-home/united-states

Van Doorn, Jenny, Martin Mende, Stephanie M. Noble, John Hulland, Amy L. Ostrom, Dhruv Grewal, and J. Andrew Petersen (2017), "Domo arigato Mr. Roboto: Emergence of Automated Social Presence in Organizational Frontlines and Customers' Service Experiences," *Journal of Service Research*, 20(February), 43-58

Walther, Joseph B. (1992), "Interpersonal Effects in Computer-Mediated Interaction: A Relational Perspective," *Communication Research*, 19(February), 52-90.

The Effect of Resource Scarcity on Advice-taking

Jane So, City University of Hong Kong, Hong Kong, China
Nidhi Agrawal, University of Washington, USA

EXTENDED ABSTRACT

Consumers often feel resource scarcity when they feel they do not have enough necessary resources to meet their needs (Mani et al. 2013). Feelings of resource scarcity systematically affect how consumers think, perceive, feel, and behave (Hamilton et al. 2018; Haushofer and Fehr 2014; Mani et al. 2013; Shah et al. 2012; Sharma and Alter 2012; Tully et al. 2015; Roux et al. 2015). Adding to this line of research, we suggest a new scarcity effect on consumers' advice-taking tendency. We argue that when people are feeling resource scarcity such as time scarcity or money scarcity, people are less likely to take advice from others because they view that others are different from themselves.

Resource scarcity signals that the environment is harsh (Laran and Salerno 2013; S. E. Hill et al., 2012; Griskevicius et al. 2013), such that people need to compete with others for the scarce resource (Kristofferson et al. 2017; Roux et al. 2015). Insufficient resources make people protect what they have and become aggressive to others for the sake of their own benefit (Kristofferson et al. 2017; Roux et al. 2015). Thus, when feeling scarcity, people are more focused on the self than thinking from other's perspective. Furthermore, other empirical research on resource scarcity suggests that resource scarcity leads to more polarized view. For example, when people are primed with a scarce environment, they are more likely to narrow the definition of their in-groups and thus categorize others who have ambiguous group identity as outgroups (Rodeheffer, Hill, and Lord 2012). Moreover, a general sense of scarcity makes people show a greater preference towards an option that was already their favorite, and express greater dislike for an option that was already disliked (Zhu and Ratner 2015). Thus, we argue that consumers who are feeling resource scarcity may have a polarized view of the self and others, such that others are different from the self.

We suggest that such polarized view that the others are different from the self, will manifest in people's advice-taking tendency, especially when they have preexisting opinions. Ample research on advice-taking has documented that whether people view advisors to be similar to the self or not affects consumers' advice-taking tendency (Brock 1965; Churchill 1975; Faraji-rad, Samuelson, and Warlop 2015; Gino, Shang, and Croson 2009; Jiang et al. 2010). Consumers are more likely to take the advice from the advisor who are similar to the self. Thus, we expect that when people are feeling resource scarcity, they will see others as dissimilar and therefore will be less willing to accept their advice.

We test our hypothesis with money scarcity in three studies. We show that money scarcity lead to lower advice-taking tendencies, using measured scarcity (study 1) and manipulated scarcity (study 2). In study 3, we test the underlying process of perceived similarity by manipulating the similarity of advisor.

Study 1

A total of 150 Amazon Mechanical Turk participants completed the study for a small compensation. Participants were told to choose the more important option for a healthy life, from exercising and diet. Next, we presented a short paragraph about an opinion that supported the different option from the opinion of the participant. In other words, participants who indicated that exercising is more important than diet read an article about why diet is more important than exercising, and those who indicated that diet is more important than exercising read an article about why exercising is more important than diet. Then we measured participants' advice-taking tendency by asking 1) how much they agreed with the opinion of the article, 2) how likely they were to accept the advice from the article writer, and 3) how likely they were to change their opinion about diet and exercising (9-point scale; α = .89). By averaging these three items, we created an index of advice-taking tendency (α = .89). Next, we measured participants' perceived similarity of the advisor using the three items; 1) the reviewer is like me, 2) the reviewer behaves like me, and 3) the reviewer is similar to me (Faraji-rad et al. 2015; 7-point scale, α = .96). Finally, we measured money scarcity using the four items from Tully et al. 2015 (α = .82).

We conducted a mediation analysis (Model 4; Hayes 2013) to test the effect of money scarcity on advice-taking tendency and whether this effect is mediated by the perceived similarity. The analysis revealed a significant mediation (β = -.27, SE = .09, 95% CI from -.46 to -.09). The money scarcity had a significant negative effect on the perceived similarity (β = -.28, SE = .09, t = -3.02, p = .003) and the perceived similarity had a significant effect on advice-taking tendency (β = .96, SE = .08, t = 11.79, p < .001).

Study 2

A total of 202 people participated in the study via Amazon MTurk. We randomly assigned participants to either the control condition or the money scarcity condition. All participants were first asked to recall specific life experiences. Participants in the control condition were asked to recall "five things you did today" (adapted from Tully et al. 2015) and participants in the money scarcity condition were asked to recall a recent experience of feeling money scarcity (adapted from Roux et al. 2015).

After the recall task, participants were asked to evaluate a monitor as a part of consumer research. Participants saw a picture of a computer monitor with a description of features. Next, we showed participants a review of the monitor to help them evaluate the monitor. The review was very favorable and the reviewer highly recommended the monitor. After reading the review, participants rated the monitor using three items ("Very [bad/good] choice"; "I [dislike/like] the monitor very much"; and "I have a very [unfavorable/favorable] attitude"; from Faraji-rad et al. 2015) on a 9-point scale (α = .89). These items were averaged to create the persuasion score. Also, participants indicated their advice-taking tendency by answering 1) how likely they are going to accept the recommendation from the reviewer and 2) how likely they are going to change their opinion about the monitor based on the reviewer (9-point scale; r = .47). Participants also indicated perceived similarity of the reviewer using the same three items from the previous study (Faraji-rad et al. 2015; 7-point scale, α = .97).

As a manipulation check, we measured participants' feelings of money scarcity by asking them to indicate to what extent they were feeling money-constrained while answering the survey on a 7-point scale. Finally, participants answered demographic questions and were thanked for their participation.

Perceived Similarity. An ANOVA on the index of perceived similarity of the reviewer revealed a significant effect of condition (F(2, 201) = 12.25, p = .001). Compared to those in the control condition ($M_{control}$ = 6.33), participants in the money scarcity condition (M_{money} = 5.58) reported lower perceived similarity.

Persuasion, Advice-Taking, and Mediation. Next, we examined the effect of scarcity on our dependent variables, which were persuasion and advice-taking tendency. Both dependent variables yielded similar patterns. An ANOVA on persuasion revealed a significant scarcity effect ($F(2, 201) = 22.04$, $p < .001$). Compared to the control condition ($M_{control} = 7.59$), participants in the money scarcity condition ($M_{money} = 6.62$) were less likely to be persuaded by the review. An ANOVA on advice-taking tendency revealed a similar effect ($F(2, 201) = 14.63$, $p < .001$). Compared to the control condition ($M_{control} = 6.51$), participants in the money scarcity condition ($M_{money} = 5.58$) were less likely to accept the advice.

Furthermore, perceived similarity of the reviewer significantly mediated the effect of scarcity on both persuasion and advice-taking tendency. We ran mediation analyses using Process (Hayes 2013). Our independent variable was treated as dummy variable (control: 0, money scarcity: 1). We found that on the persuasion index, the indirect effect of scarcity through perceived similarity was negative and significant ($\beta = -.38$, $SE = .14$, 95% CI from -.68 to -.14). Similarly, the indirect effect of scarcity through perceived similarity on advice-taking tendency was negative and significant ($\beta = -.47$, $SE = .16$, 95% CI from -.82 to -.19). These results suggest that when people are feeling scarcity, they perceive others as dissimilar to themselves, which further leads to lower levels of persuasion and advice-taking tendencies.

Study 3

Our goal was to test the underlying process of perceived similarity. We expect that when the advice is from a similar advisor, the low advice-taking tendency of money scarce people will be increased. In this study, we used 2(scarcity: money scarcity vs. control) x 2(advisor: similar vs. control) between subjects design.

A total of 406 people participated via Amazon mechanical turk. Participants first conducted a recall task. Before starting the survey, we asked the demographic questions to participants including their age range, gender, highest level of education, region that they are living in, and their political orientation. This information was used later to manipulate the similarity of advisor. Next, participants in the money scarcity condition were asked to recall a time they felt money constraints. Participants in the control condition were asked to recall what they did on that day. 21 people were excluded from the analyses after reviewing the content they wrote. After manipulating scarcity, we asked participants to move on to the second part of the study. The procedure of the second part was similar to that of study 1. We told participants that the purpose of the second study is to understand people's thoughts on various issues. We first asked participants to choose the more important option for a healthy life, from exercising and diet. Then, we presented a short article about an opinion that supported the different option from the opinion of the participant. Before showing the article, we provided additional information about the article writer to the similar advisor group. We manipulated the similarity of advisor by matching the profile of the participant and the advisor (adapted from Gino, Shang, and Croson 2009). Participants in the similar advisor group were told that the article writer is similar to them in terms of gender, age, education, region and political orientation. Participants in the control advisor group did not received any information about the article writer. After reading the short article about health, we measured participants' perceived similarity of the advisor (article writer) using the three items from previous studies (Faraji-rad et al. 2015; 7-point scale, $\alpha = .94$). To measure more behavior related advice-taking tendency, we asked 1) how likely are you to hire this article writer as your health advi-

sor and 2) how likely are you to attend a health seminar held by this article writer ($r = .77$).

Perceived Similarity. An ANOVA on the index of perceived similarity of the reviewer revealed a significant effect of scarcity ($F(1, 381) = 9.19$, $p = .003$) and advisor type ($F(1, 381) = 48.67$, $p < .001$). We did not find a significant interaction, which is expected. Replicating our previous results, when there was no additional information about the advisor, the money scarcity condition showed lower perceived similarity than the control condition ($M_{control} = 4.00$ vs. $M_{money} = 3.56$; $F(1, 381) = 5.14$, $p = .024$). The control condition also showed increased perceived similarity when the advisor was similar ($M_{similaradvisor} = 4.87$ vs. $M_{controladvisor} = 4.00$; $F(1, 381) = 22.97$, $p < .001$), suggesting that our similarity manipulation was successful. More importantly, the money scarce participants who were in the similar advisor condition showed increased perceived similarity than those who were in the control advisor condition ($M_{similaradvisor} = 4.52$ vs. $M_{controladvisor} = 3.56$; $F(1, 381) = 25.73$, $p < .001$).

Advice-taking and Mediation. An ANOVA on advice-taking revealed a significant interaction ($F(1, 381) = 4.32$, $p = .038$). Replicating our previous findings, when there was no additional information about the advisor, the money scarcity condition showed lower advice-taking tendency than the control condition ($M_{control} = 5.00$ vs. $M_{money} = 4.21$; $F(1, 381) = 5.49$, $p = .02$). More importantly, the money scarce participants who were in the similar advisor condition showed increased perceived similarity than those who were in the control advisor condition ($M_{similaradvisor} = 4.90$ vs. $M_{controladvisor} = 4.21$; $F(1, 381) = 4.52$, $p < .034$). However, within the control condition, we did not find any significant difference between the similar advisor condition and the control advisor condition ($M_{similaradvisor} = 4.76$ vs. $M_{controladvisor} = 5.00$; $F(1, 381) < 1$). This suggest that there is a possibility of ceiling effect on advice-taking tendency of the control condition. We also conducted a mediation analysis using scarcity condition as independent variable (Control: 0, Money scarcity: 1), perceived similarity as a mediator and advice-taking tendency as a dependent variable. We found that the indirect effect of scarcity through perceived similarity was negative and significant ($\beta = -.34$, 95% CI from -.60 to -.10).

Taken together, we found that money scarcity leads to lower levels of advice-taking tendency because feelings of scarcity make people perceive that others are different from themselves. Our study 1 results showed that the more people feel money scarcity, the less likely they were to be persuaded by others' opinions. Study 2 showed that feeling time scarcity or money scarcity led to lower levels of perceived similarity between the self and the other, which further led to lower advice-taking tendencies. Finally, study 3 showed that when the advice is from a similar advisor, money scarce people shows increased perceived similarity and increased advice-taking tendency.

REFERENCES

Brock, Timothy C. (1965), "Communicator-Recipient Similarity and Decision Change," *Journal of Personality and Social Psychology*, 1 (6), 650–54.

Churchill, Gilbert A., Robert H. Collins, and William A. Strang (1975), "Should Retail Salespersons Be Similar to Their Customers?" *Journal of Retailing*, 51 (3), 29–42.

Faraji-Rad, Ali, Bendik M. Samuelsen, and Luk Warlop (2015), "On the Persuasiveness of Similar Others: The Role of Mentalizing and the Feeling of Certainty," *Journal of Consumer Research,* 42 (3), 458-71.

Fernbach, Philip, Christina Kan, and John Lynch (2015), "Squeezed: Coping with Constraint through Efficiency and Prioritization," *Journal of Consumer Research*, 41 (5), 1204–27.

Gino, Francesca, Jen Shang, and Rachel Croson (2009), "The Impact of Information from Similar or Different Advisors on Judgment," *Organizational Behavior and Human Decision Processes*, 108, 287–302.

Griskevicius, Vladas, Joshua M. Ackerman, Stephanie M. Cantú, Andrew W. Delton, Theresa E. Robertson, Jeffry A. Simpson, Melissa Emery Thompson, and Joshua M. Tybur (2013), "When the Economy Falters, Do People Spend or Save? Responses to Resource Scarcity Depend on Childhood Environments," *Psychological Science,* 24 (2), 197-205.

Hamilton, R. W., Mittal, C., Shah, A., Thompson, D. V., & Griskevicius, V. (2019). How financial constraints influence consumer behavior: An integrative framework. *Journal of Consumer Psychology*, *29*(2), 285-305.

Haushofer, Johannes, and Ernst Fehr (2014), "On the Psychology of Poverty," *Science*, 344 (6186), 862–67.

Jiang, Lan, Joandrea Hoegg, Darren W. Dahl, and Amitava Chattopadhyay (2010), "The Persuasive Role of Incidental Similarity on Attitudes and Purchase Intentions in a Sales Context," Journal of Consumer Research, 36 (February), 778–91.

Kristofferson, Kirk, Brent McFerran, Andrea C. Morales, and Darren W. Dahl (2016), "The Dark Side of Scarcity Promotions: How Exposure to Limited-quantity Promotions can Induce Aggression," *Journal of Consumer Research,* 43 (5), 683-706.

Laran, Juliano, and Anthony Salerno (2013), "Life-history Strategy, Food Choice, and Caloric Consumption," *Psychological Science,* 24 (2), 167-73.

Mani, Anandi, Sendhil Mullainathan, Eldar Shafir, and Jiaying Zhao (2013), "Poverty Impedes Cognitive Function," *Science*, 341 (6149), 976–80.

Rodeheffer, Christopher D., Sarah E. Hill, and Charles G. Lord (2012), "Does this Recession make Me Look Black? The Effect of Resource Scarcity on the Categorization of Biracial Faces," *Psychological Science,* 23 (12), 1476-78.

Roux, Caroline, Kelly Goldsmith, and Andrea Bonezzi (2015), "On the Psychology of Scarcity: When Reminders of Resource Scarcity Promote Selfish (and Generous) Behavior," *Journal of Consumer Research*, 42 (4), 615-31.

Shah, Anuj K., Eldar Shafir, and Sendhil Mullainathan (2015), "Scarcity Frames Value," *Psychological Science,* 26 (4), 402-12.

Shah, Anuj K., Sendhil Mullainathan, and Eldar Shafir (2012), "Some Consequences of Having Too Little," *Science*, 338 (6107), 682–85.

Sharma, Eesha, and Adam L. Alter (2012), "Financial Deprivation Prompts Consumers to Seek Scarce Goods," *Journal of Consumer Research*, 39 (3), 545-60.

Tully, Stephanie M., Hal E. Hershfield, and Tom Meyvis (2015), "Seeking Lasting Enjoyment with Limited Money: Financial Constraints Increase Preference for Material Goods over Experiences," *Journal of Consumer Research* 42 (1), 59-75.

Wilcox, Keith, Juliano Laran, Andrew T. Stephen, and Peter P. Zubcsek (2016) "How Being Busy can Increase Motivation and Reduce Task Completion Time" *Journal of Personality and Social Psychology,* 110 (3), 371-84.

Zhu, Meng, and Rebecca K. Ratner (2015), "Scarcity Polarizes Preferences: The Impact on Choice among Multiple Items in a Product Class," *Journal of Marketing Research,* 52 (1), 13-26.

The Trouble With Trust: When Certification is Not Enough to Turn Trust Into Willingness to Share Data

Cynthia Sokoll, University of St. Gallen, Switzerland

EXTENDED ABSTRACT

Smart products generate massive amounts of data—data which are often transferred to numerous parties (Schudy and Utikal 2017). This means that consumers do not have full control over their data privacy anymore (Pinchot, Chawdhry, and Paullet 2018).

The approach proposed in this work to solve this problem is to install a data certification authority between the consumer's smart product and the manufacturer, which gives consumers control over their data. This entity certifies, stores and anonymizes the smart product data before they are forwarded to the manufacturer based on customized settings. As the empirical evidence in this regard is scarce, this work examines the influence of such a certification authority on consumer behavior.

The literature on the effect of certification on consumer behavior is vast, for example, with regard to its influence on trust (Lee and See 2004) or on the willingness to provide data (Aiken and Boush 2006). However, with increasing technological changes, current certification approaches need to be adapted (Windhorst and Sunyaev 2013). Researchers, for example, propose an "approach for certifying security properties (…) that combines monitoring and testing data" (Katopodis, Spanoudakis, and Mahbub 2014, 394). However, which party should take over the role of the certification authority is unclear. Yet, in general, certification is superior to no certification (Rifon, LaRose, and Choi 2005).

Trust—which can be influenced by certification—is often subdivided in research, for example, into soft and hard trust (Head, Yuan, and Archer 2001). While hard trust focusses on technologically safe interactions, soft trust is concerned with trust in data privacy (Head and Hassanein 2002). Based on this, trust in the smart product (hard trust) and trust in data privacy (soft trust) are differentiated in this work. While trust in data privacy and certification are supposed to positively influence the willingness to share information, this is only true for trust in the smart product in certain cases.

The following hypotheses are proposed:

Hypothesis 1a: *The certification of smart product data by any certification authority (irrespectively of whether an independent third-party, a government, or a commercial entity assumes this role) is superior to no certification in terms of higher trust in data privacy and greater willingness to share data.*

Hypothesis 1b: *An independent third-party is a superior data certification authority compared to a government and a commercial entity in terms of higher trust in data privacy and greater willingness to share data.*

Hypothesis 2: *The effect of certification of smart product data by an independent third-party on the willingness to share data is mediated by trust in data privacy.*

Hypothesis 3: *While third-party certification increases the willingness to share data for low levels of smart product trust, it decreases the willingness to share data for high levels of smart product trust.*

Study 1 (N = 651) employed a four-condition between-subjects design: no certification authority (control condition) or an independent third-party, a government, or a commercial entity as certification authority. Participants read different scenario descriptions. In the control condition, the information was transferred directly from the smart speaker to the manufacturer. In the experimental conditions, there was a data certification authority in-between the data transfer from the smart speaker to the manufacturer. Participants differed marginally in their trust in data privacy in the four study conditions (F(3, 647) = 2.23, p = .08). Certification led to a significantly higher trust in data privacy compared to no certification (t(647) = 2.29, p = .02). There were no further significant differences across the study conditions. Regarding the willingness to share data, there was no significant difference across the experimental groups (F(3, 647) = .70, p = .55). A regression analysis (PROCESS Model 4, Hayes 2018) showed that trust in data privacy mediated the effect of certification on the willingness to share data in the independent third-party certification condition ($b_{indirectthirdparty}$ = .33; 95% CI = [.09, .59]), but not in the other experimental conditions. Both H1a and H1b have to be rejected. H2 is accepted. Consequently, the independent third-party was used as the certification authority in the following two experiments.

Study 2 (N = 558) employed a two-condition between-subjects design: no certification versus independent third-party certification. Participants in the third-party certification condition had higher trust in data privacy compared to those in the control condition (t(556) = 2.74, p = .01). However, there was no significant difference in the willingness to share data (t(556) = .22, p = .83). The results of the regression analysis confirm the mediating effect of trust in data privacy found in Study 1 ($b_{indirect}$ = .21, 95% CI = [.06, .36]). H2 is accepted.

Study 3 used a computer-based laboratory experiment (N = 75). As in Study 2, there was a significant difference in trust in data privacy between the two experimental conditions (t(73) = 4.10, p < .001), but not with regard to the willingness to share data (t(73) = 1.35, p = .18). PROCESS Model 5 was used for the regression analysis. Trust in data privacy did not mediate the effect of certification on the willingness to share data ($b_{indirect}$ = .15, 95% CI [-.11, .46]). However, trust in the smart product moderated the effect of certification on the willingness to share data ($b_{interaction}$ = -.44, 95% CI = [-.88, .00]). The Johnson-Neyman technique (Hayes and Matthes 2009) revealed that the presence of a certification authority significantly decreases participants' willingness to share data if the value for trust in the smart product is higher than or equal to 4.84 (p < .05). H2 was rejected. H3 was accepted. Overall, the results of Study 3 indicate that consumers strongly trusting their smart product do not need an additional control entity.

This work contributes to the literature on certification, trust in the digital age and data privacy. The research shows how and under which conditions data certification can influence consumer behavior and the willingness to share information. Managers should make the topic of data privacy one of their priorities and evaluate installing a third-party certification authority for smart product data certification thoroughly to avoid possible detrimental effects.

REFERENCES

Aiken, K. Damon and David M. Boush (2006), "Trustmarks, Objective-Source Ratings, and Implied Investments in Advertising: Investigating Online Trust and the Context-Specific Nature of Internet Signals," *Journal of the Academy of Marketing Science*, 34(3), 308–23.

Hayes, Andrew F. (2018), *Introduction to Mediation, Moderation, and Conditional Process Analysis: A Regression-Based Approach*, 2nd ed., New York, NY, USA: Guilford.

Hayes, Andrew F. and Jörg Matthes (2009), "Computational Procedures for Probing Interactions in OLS and Logistic Regression: SPSS and SAS Implementations," *Behavior Research Methods*, 41(3), 924–36.

Head, Milena M. and Khaled Hassanein (2002), "Trust in E-Commerce: Evaluating the Impact of Third-Party Seals," *Quarterly Journal of Electronic Commerce*, 3(3), 307–25.

Head, Milena M., Yufei Yuan, and Norm Archer (2001), "Building Trust in E-Commerce: A Theoretical Framework," in *Proceedings of the Second World Congress on the Management of Electronic Commerce*, Hamilton, ON, Canada: MCB Press, 17–19.

Katopodis, Spyros, George Spanoudakis, and Khaled Mahbub (2014), "Towards Hybrid Cloud Service Certification Models," in *Proceedings of the 2014 IEEE International Conference on Services Computing*, ed. Elena Ferrari, Ravindran Kaliappa, and Patrick Hung, Anchorage, AK, USA: IEEE, 394–99.

Lee, John D. and Katrina A. See (2004), "Trust in Automation: Designing for Appropriate Reliance," *Human Factors: The Journal of the Human Factors and Ergonomics Society*, 46(1), 50–80.

Pinchot, Jamie, Adnan A. Chawdhry, and Karen Paullet (2018), "Data Privacy Issues in the Age of Data Brokerage: An Exploratory Literature Review," *Issues in Information Systems*, 19(3), 92–100.

Rifon, Nora J., Robert LaRose, and Sejung M. Choi (2005), "Your Privacy Is Sealed: Effects of Web Privacy Seals on Trust and Personal Disclosures," *The Journal of Consumer Affairs*, 39(2), 339–62.

Schudy, Simeon and Verena Utikal (2017), "'You Must Not Know about Me' – On the Willingness to Share Personal Data," *Journal of Economic Behavior & Organization*, 141(September), 1–13.

Windhorst, Iryna and Ali Sunyaev (2013), "Dynamic Certification of Cloud Services," in *Proceedings of the 2013 International Conference on Availability, Reliability and Security*, ed. Juan E. Guerrero, Regensburg, Germany: IEEE, 412–17.

Not All Technoference Is Equal: Why Smartphone Snubbing Hurts the Most

Camilla Eunyoung Song, University of Florida, USA
Yang Yang, University of Florida, USA

EXTENDED ABSTRACT

Technology devices, such as smartphones and PCs, have unequivocally become an indispensable part of consumers' life. Consumers are now surrounded by multiple devices most of the time on a typical day. In a recent survey, we found that US respondents, on average, own 2.6 of the 4 major technology devices (i.e., smartphone, desktop computer, laptop, and tablet) and that 65% of them keep two or more devices at their fingertips over 8 hours during the day.

The proliferation of technology devices has revolutionized how people interact with each other. While technology devices allow people across the world to stay connected, they ironically take a toll on real, in-person relationships. The use of technology devices often interferes with in-person interactions and negatively influences the social relationships between users and people around them, a phenomenon termed "technoference." (McDaniel and Coyne 2016; Kushlev et al. 2019).

In the past few years, a burgeoning stream of literature on technoference has greatly advanced our understanding on this phenomenon (Chotpitayasunondh and Douglas 2018; David and Roberts 2017; Dwyer, Kushlev, and Dunn 2018; Kushlev et al. 2017; Kushlev and Dunn 2019; Misra et al. 2016; Przybylski and Weinstein 2012; Sprecher et al., 2016; Vanden Abeele et al. 2016; Vanden Abeele and Postma-Nilsenova 2018; Vanden Abeele et al. 2019). All of this work, however, has focused on the influence of device use versus no device use, and has yet to explore whether the use of different devices (e.g., smartphones vs. PCs) may have differential impacts on social relationships.

The current research suggests, instead, that not all technoference is equal. We hypothesize that during an in-person interaction, smartphone use has a more detrimental effect on social relationships than PC use (H1). Specifically, we predict that when an interruption is attributable to smartphone use (vs. PC use), the user is perceived to be ruder and less attentive, and their interaction partner experiences more negative emotions and more social exclusion. We further theorize that this effect is driven by differential inferences about the device use. Interaction partners perceive activities done on the PC to be work-related, important, and urgent, hence a priority deserving of users' attention. By contrast, the same activities done on a smartphone are perceived to be fun-related, less important, and less urgent, and anything but a priority (H2). As a result, interaction partners are less tolerant of smartphone use (vs. PC use).

The current research also aims to gain insights into the users' perspectives and decision processes. To the extent that consumers are surrounded by multiple technology devices most of the time every day (as shown in our survey), and most online activities can be done on different devices (Campaign Monitor 2019; The Manifest 2018), consumers are often faced with choices between different devices. During in-person interactions, which device will consumers use? We propose that users are more likely to use their smartphones during an in-person interaction, in part, because they erroneously believe that smartphone use has a *less* detrimental effect on social relationships than PC use (H3).

We have conducted seven studies that tested our hypotheses across a wide range of social interaction contexts, from getting acquainted with a fellow student in a lab, hanging out with a friend in a coffee shop, to catching up with a co-work in office. These studies examined the effect of different devices (i.e., smartphone, desktop,

laptop, work phone, and tablet) on the observer's reactions, as well as the user's device choice and predictions of the observer's reactions (see Table 1). Below, we will report four studies (Studies 1, 2A, 2B, and 3) due to the limited space.

STUDY 1

Study 1 aimed to test whether interruptions due to smartphone use (vs. PC use) have a more detrimental effect on social relationships (H1). In doing so, we recruited unacquainted dyads to interact in-person in a lab, introduced a brief interruption during which a member of the dyad was instructed to use their smartphone (vs. laptop), and then measured how their partner reacted to this interference.

Method

448 undergraduate students (M_{age}=19.7, 282 females) from a large university in the US participated in this study in exchange for course credit. They were randomly paired with each other to form 224 dyads. Each dyad engaged in a face-to-face get-acquainted interaction in a lab. Specifically, each member of a dyad was given 12 interview questions, and their job was to interview their partner and type their answers to each question. Critically, we asked half of the dyads to use their laptops for the interview and the other half to use their smartphones. Partner A interviewed Partner B first, and then they switched roles. Unbeknownst to Partner A, right before interviewing Partner A, Partner B learned that she was assigned to play the role of a confederate. Specifically, before Partner A was about to answer the 4th question, Partner B received a notification asking them to say "Oh, hang on a second, I just got something on my phone (laptop) and need to check it" and pretend to check something on their device for about 30 seconds.

Upon the completing of the interviews, participants rated the inappropriateness of partner's behavior ("I felt my partner behaved inappropriate," "I felt my partner behaved impolite," "My partner seemed involved with the conversation (reversed)," "My partner seemed to listen carefully (reversed)," "My partner seemed interested in my emotions and needs (reversed)", a=.83), and reported to what extent they felt socially excluded ("I felt ignored," "I felt rejected," and "I felt left out", a=.93) on 7-point scales. We also measured self-disclosure behavior ("How much did you tell your partner about yourself?) as a proxy of social bonds between participants (c.f., Sbarra, Briskin, and Slatcher 2019).

Results and Discussion

Consistent with H1, smartphone interference is more detrimental than laptop interference. Smartphone interference was perceived to be more inappropriate (M_{phone}=2.80vs.M_{laptop}=2.19,p<.01), and participants who were snubbed by smartphones (vs. laptops) felt more socially excluded (M_{phone}=1.97vs.M_{laptop}=1.40,p<.01), and disclosed less information about themselves to the device user (M_{phone}=4.06vs. M_{laptop}=4.61,p=.01).

STUDY 2A

Study 2A seeks to achieve the following goals. First, it aims to replicate H1 in a different context and gather evidence for the priority inference account (H2). Second, it examines important downstream consequences of deteriorated social relationships, such as people's willingness to interact with or help the person who snubbed them.

Third, it tests the robustness of H1 by disclosing what the user is doing on her device (e.g., checking or sending an email, checking others' posts on social media). We expect to replicate H1 regardless of the activity. That is, we predict that H1 will persist even when the activity is unambiguous and held the same across conditions. Finally, it tests an alternative explanation of H1. Namely, laptop use during an in-person conversation may strike participants as odd and unusual, and this unusualness may help justify the use.

Method

338 Mturkers (M_{age}=37.6, 160 females, 2 non-binary) completed this study in exchange for a nominal payment.

This study employed a 2x2 between-subjects design, manipulating the type of device used (smartphone vs. laptop) and the activity performed on the device (checking emails vs. social media). Specifically, participants imagined that they ran into a friend, Alex, at a local coffee shop and sat at a table to catch up. Participants read a dialogue between them and Alex and imagined that in the middle of their conversation, Alex received a notification on either her smartphone or laptop, said "Oh, hang on a second, I need to check something," and then checked her emails or social media for a minute.

Next, participants rated the inappropriateness of Alex's behavior (a=.91), to what extent they felt socially excluded (a=.94), as in Study 1, and their mood (1 = very bad, 7 = very good). To explore the underlying process, we also measured the priority inference ("To what extent did you think it was work-related?" "To what extent did you think it was urgent?", a = .93) and perceived unusualness ("To what extent did you think it was unusual that Alex was using her smartphone (laptop) while having the conversation?"). Finally, participants reported their willingness to interact with Alex ("If you were to host a party at your place, to what extent would you like to invite Alex?" "If you were to play an online game, would you want to play with Alex or alone?") and their willingness to help Alex ("If Alex is hunting for a job and asks you to write a recommendation letter for her, would you write her a strong letter?").

Results and Discussion

Unusualness. A 2(device: smartphone vs. laptop) x 2(activity: email vs. social media) ANOVA on unusualness did not reveal any significant effects, therefore we did not control for unusualness in the subsequent analyses. Including unusualness as a covariate does not change any of the conclusions.

Inappropriateness. A 2(device: smartphone vs. laptop) x 2(activity: email vs. social media) ANOVA on inappropriateness revealed a significant main effect of device, confirming that smartphone interference was perceived to be more inappropriate than laptop interference (M_{phone}=4.86vs.M_{laptop}=4.43,p<.01). The ANOVA also revealed a significant main effect of activity, such that checking posts on social media was more inappropriate than checking emails (M_{email}=4.29vs.$M_{socialmedia}$=5.02,p<.01). The interaction effect was not significant (p=.51).

Negative feelings. Participants who were snubbed by smartphones (vs. laptops) felt more socially excluded (M_{phone}=4.77vs.M_{laptop}=4.26,p<.01) and experienced more negative mood (M_{phone}=2.86vs.M_{laptop}=3.14,p=.02).

Priority Inference. Consistent with H2, participants perceived that activities done on smartphones to be less of a priority than those performed on laptops (M_{phone}=3.31vs.M_{laptop}=3.97,p<.01).

Behavioral Intentions. Participants snubbed by smartphones (vs. laptops) were directionally less willing to invite the user to their party (M_{phone}=4.49vs.M_{laptop}=4.73,p=.12), less willing to play games with the user (29.8%vs.39.5%, p=.07), and less willing to

write a strong recommendation letter for the user (M_{phone}=4.45vs.M_{laptop}=4.72,p=.06).

Mediation Analyses. We predict that the priority inference influences perceived inappropriateness and negative feelings, which in turn reduces intention to interact and intention to help. A series of two-stage mediations (Model 6; Hayes 2013) confirmed our prediction (see Figure 1).

Later, we successfully replicated these findings in two studies similar to Study 2A. In one study, we additionally manipulated whether Alex received notifications before using her device, and found support for H1 and H2 regardless of the presence of notifications. In another study, we used a different scenario (i.e., chatting with a co-worker during lunch break), replaced the laptop condition with a desktop condition, and found that people in the desktop condition responded just like those in the laptop condition in Study 2A.

STUDY 2B

Having demonstrated the detrimental effect of smartphone use (vs. PC use) from the observers' perspective, we turn to the users to gain insights into the users' perspectives and decision processes. Suppose consumers need to use their device in the middle of in-person interactions, and both the smartphone and laptop are equally accessible, which device will they use? And why? Study 2B aims to shed light on these questions.

Method

100 Mturkers (M_{age}=34.9, 33 females) were presented with the same scenario used in Study 2A except that, in this study, they were users instead of observers. Specifically, they imagined that they received notifications on their smartphone and laptop (both were equally accessible) and indicated which device they would use to check emails or check posts on social media. Next, they predicted which device use would be perceived as more inappropriate by their conversation partner, which device use would hurt their conversation partner's feelings more (1 = definitely the smartphone, 4 = indifferent, 7 = definitely the laptop).

Results and Discussion

Consistent with H3, the choice share of smartphone was marginally higher than if participants had picked randomly (63.2%,p=.06). This effect is robust across different activities—the choice share did not differ between checking emails and checking social media posts (p=.16).

Moreover, users erroneously believed that, compared with smartphone usage, laptop use was more inappropriate (M=4.74;one-sample t-test against the midpoint 4,p<.01)*,* making their conversation partner feel more socially excluded (M=4.71,p<.01) and experience more negative mood (M=4.62,p<.01).

These results were replicated in another study (47 Mturkers, M_{age}=37.0, 19 females) in which participants reported these measures before choosing which device to use.

STUDY 3

This study provides further process evidence (H2) by including two more conditions—a work phone condition and a tablet condition. If the detrimental impact of smartphone use (vs. PC use) is driven by their difference in priority inference, rather than differences in other aspects (e.g., appearance, functionality, unusualness), then we would expect the work phone condition to yield similar patterns to the laptop condition due to its high priority inference, and the tablet condition to look more like the smartphone condition due to its low priority inference.

Method

295 Mturkers (M_{age}=36.4, 139 females,1 non-binary) completed this study in exchange for a nominal payment.

The procedure was identical to that in Study 2A except that this study manipulated the type of device used by using four devices (smartphone vs. laptop vs. work phone vs. tablet) and did not manipulate activity. Participants answered the same questions as in Study 2A except one behavioral intention question.

Results and Discussion

Unusualness. A one-way ANOVA on unusualness did not reveal any significant effects ($p = .68$), therefore we did not control for unusualness in the subsequent analyses. Including unusualness as a covariate does not change any of the conclusions.

Inappropriateness. Consistent with our predictions, planned contrasts showed that smartphone and tablet interference were perceived to be more inappropriate than laptop and work phone interference ($M_{phone-and-tablet}$=4.05vs.$M_{laptop-and-workphone}$=3.56,p<.01).

Negative feelings. Participants who were snubbed by smartphones and tablets (vs. laptops and work phones) felt more socially excluded ($M_{phone-and-tablet}$=3.73vs.$M_{laptop-and-workphone}$=3.30,p=.04) and experienced more negative mood ($M_{phone-and-tablet}$=2.86vs.$M_{laptop-and-workphone}$=3.14,p=.02).

Behavioral Intentions. Participants snubbed by smartphones were less willing to write a strong recommendation letter for the user ($M_{phone-and-tablet}$=4.94vs.$M_{laptop-and-workphone}$=5.26,p=.06).

Priority Inference. Participants perceived that activities done on smartphones and tablets as less of a priority than those performed on laptops and work phones ($M_{phone-and-tablet}$=4.36vs.$M_{laptop-and-workphone}$=5.21,p<.01).

Mediation Analyses. A series of two-stage mediations (Model 6; Hayes 2013) suggested that priority inference influenced perceived inappropriateness and negative feelings, which in turn changed behavioral intention.

General Discussion

To conclude, we demonstrate that smartphone interference is more detrimental to social relationships than other interference. This effect is attributable to the low priority inference about smartphone use. Notably, while consumers can correctly predict this effect when imagining being snubbed, they make the opposite prediction when imagining snubbing others and consequently choose "the wrong device." Theoretically, this research extends the existing literature on technoference by exploring whether and why different devices may have differential impacts on social relationships. Practically, our findings suggest an easy-to-implement strategy to reduce tensions in social relationships—when you have a choice between different devices, stay away from your tablet and smartphone unless they have your employer's logo on them.

REFERENCES

Campaign Monitor (2019), "24 Email Marketing Stats You Need to Know" (accessed March 4, 2020), https://www.campaignmonitor.com/resources/infographics/24-email-marketing-stats-need-know/.

Chotpitayasunondh, Varoth and Karen M. Douglas (2018), "The Effects of 'Phubbing' on Social Interaction," *Journal of Applied Social Psychology*, 48(6), 304–16.

David, Meredith E. and James A. Roberts (2017), "Phubbed and Alone: Phone Snubbing, Social Exclusion, and Attachment to Social Media," *Journal of the Association for Consumer Research*, 2(2), 155–63.

Dwyer, Ryan J., Kostadin Kushlev, and Elizabeth W. Dunn (2018), "Smartphone Use Undermines Enjoyment of Face-to-Face Social Interactions," *Journal of Experimental Social Psychology*, 78, 233–39.

Gilman, Rich, Adrienne Carter-Sowell, C. Nathan DeWall, Ryan E. Adams, and Inga Carboni (2013), "Validation of the Ostracism Experience Scale for Adolescents," *Psychological Assessment*, 25(2), 319–30.

Hayes, Andrew F (2013), *Introduction to Mediation, Moderation, and Conditional Process Analysis: A Regression-Based Approach* ., 110 Journal of Personality and Social Psychology, American Psychological Association.

Kushlev, Kostadin and Elizabeth W. Dunn (2019), "Smartphones Distract Parents from Cultivating Feelings of Connection When Spending Time with Their Children," *Journal of Social and Personal Relationships*, 36(6), 1619–39.

Kushlev, Kostadin, Jason D.E. Proulx, and Elizabeth W Dunn (2017), "Digitally Connected, Socially Disconnected: The Effects of Relying on Technology Rather than Other People," *Computers in Human Behavior*, 76, 68–74.

Kushlev, Kostadin, Ryan Dwyer, and Elizabeth W. Dunn (2019), "The Social Price of Constant Connectivity: Smartphones Impose Subtle Costs on Well-Being," *Current Directions in Psychological Science*, 28(4), 347–52.

McDaniel, Brandon T. and Sarah M. Coyne (2016), "'Technoference': The Interference of Technology in Couple Relationships and Implications for Women's Personal and Relational Well-Being.," *Psychology of Popular Media Culture*, 5(1), 85–98.

Misra, Shalini, Lulu Cheng, Jamie Genevie, and Miao Yuan (2016), "The IPhone Effect: The Quality of In-Person Social Interactions in the Presence of Mobile Devices," *Environment and Behavior*, 48(2), 275–98.

Oppenheimer, Daniel M., Tom Meyvis, and Nicolas Davidenko (2009), "Instructional Manipulation Checks: Detecting Satisficing to Increase Statistical Power," *Journal of Experimental Social Psychology*, 45(4), 867–72.

Przybylski, Andrew K and Netta Weinstein (2013), "Can You Connect with Me Now? How the Presence of Mobile Communication Technology Influences Face-to-Face Conversation Quality," *Journal of Social and Personal Relationships*, 30(3), 237–46.

Ren, Dongning, Eric Wesselmann, and Kipling D. Williams (2016), "Evidence for Another Response to Ostracism: Solitude Seeking," *Social Psychological and Personality Science*, 7(3), 204–12.

Sbarra, David A, Julia L Briskin, and Richard B Slatcher (2019), "Smartphones and Close Relationships: The Case for an Evolutionary Mismatch.," *Perspectives on psychological science : a journal of the Association for Psychological Science*, 14(4), 596–618.

Sprecher, Susan, Adam J. Hampton, Hannah Jones Heinzel, and Diane Felmlee (2016), "Can i Connect with Both You and My Social Network? Access to Network-Salient Communication Technology and Get-Acquainted Interactions," *Computers in Human Behavior*, 62, 423–32.

The Manifest (2018), "How People Use Social Media in 2018" (accessed March 4, 2020), https://themanifest.com/social-media/how-people-use-social-media-2018.

Vanden Abeele, Mariek M. P. and Marie Postma-Nilsenova (2018), "More Than Just Gaze: An Experimental Vignette Study Examining How Phone-Gazing and Newspaper-Gazing and Phubbing-While-Speaking and Phubbing-While-Listening Compare in Their Effect on Affiliation," *Communication Research Reports*, 35(4), 303–13.

Vanden Abeele, Mariek M.P., Andrew T. Hendrickson, Monique M.H. Pollmann, and Rich Ling (2019), "Phubbing Behavior in Conversations and Its Relation to Perceived Conversation Intimacy and Distraction: An Exploratory Observation Study," *Computers in Human Behavior*, 100(June), 35–47.

Vanden Abeele, Mariek M.P., Marjolijn L. Antheunis, and Alexander P. Schouten (2016), "The Effect of Mobile Messaging during a Conversation on Impression Formation and Interaction Quality," *Computers in Human Behavior*, 62, 562–69.

On Phone and Self: How Smartphones Influence Self-Expression in Choice

Camilla Eunyoung Song, University of Florida, USA
Aner Sela, University of Florida, USA

EXTENDED ABSTRACT

More and more consumers are using smartphones for online shopping. In 2019, smartphones accounted for the majority of global website traffic (Statcounter 2019) and a corresponding share of online transactions (Criteo 2019). Along with this trend, emerging evidence in the marketplace suggests that consumers behave differently on their smartphones. For example, compared with PC users, smartphone users tend to complete their shopping journeys faster and visit fewer websites before making a final decision (McKinsey & Company 2015), and use more conversational search terms (Google 2018). Further, due to their small physical dimensions and real-time usage, smartphones may lead consumers to generate more emotional and concise content on social media and in product reviews (Melumad, Inman, and Pham 2019; Ransbotham, Lurie, and Liu 2019). But might smartphones also change how consumers think of their choices and what they choose? If so, how?

We propose that choices made on a smartphone are more self-expressive, compared with identical choices made on a PC. Specifically, when people make a choice on their smartphone, they are more likely to see their choice as reflective of their unique individuality. Further, people prefer more self-expressive and unique options when using a smartphone, compared with a PC.

We reason that this shift occurs because smartphone use activates self-focus (or self-focused attention; Gibbons 1990; Ingram 1990). Comparing to other devices such as PC and tablet, smartphones are the most private and personal devices (Melumad and Pham 2020), and even at the extreme, they are often perceived as an extension of the self (Clayton, Leshner, and Almond 2015; Park and Kaye 2019). Therefore, when people use smartphones, their attention is shifted to the self, rather than to external environments and surroundings, almost feeling like they are in a "private bubble" (Hatuka and Toch 2016). Heightened self-focus emphasizes a sense of agency and a feeling of being distinct from the environment (Kircher and David 2003), and it often leads people to reflect on their individuality and uniqueness (Buss 1980; Chang and Hung 2018). Therefore, people perceive their choice reflects their unique individuality, expressing who they are, and they prefer unique options that can distinguish themselves from others.

We examine the effect of smartphone use on self-expressive choice in five studies, across different product categories, and test the underlying role of self-focus. We also test whether the effects can be accounted for by the physical characteristics of smartphones, such as modality (i.e., a touch interface) or its small display size. We also considered other factors known to vary across devices, such as emotionality and brevity of the content (Melumad, Inman, and Pham 2019), task difficulty, and annoyance with the task (Kim et al. 2015).

To test the causal effect of device use, we developed a procedure for randomly and reliably assigning participants to use either a smartphone or a PC (or a tablet computer, when applicable). The device was then verified for each response using an embedded UserAgent HTTP string, thereby ensuring compliance. We used this methodology in all our online studies (additional technical details are available from the authors).

Study 1 examines the effect of smartphone use on self-focus. We randomly assigned participants (Mturkers, N = 185, 44.9% females, M_{age} = 35) to use their smartphone vs. PC to write a short essay about a previous day activity. As a measure of self-focus, we calculated the proportion of first-person singular pronouns (i.e., I, me, my, mine) in participants' essays using the Linguistic Inquiry and Word Count tool (Duval and Wicklund 1972; Silvia and Phillips 2013; Wu, Moore, and Fitzsimons 2018). Confirming our predictions, smartphone use increased self-focus (M = 12.06), compared with PC use, (M = 9.89; $F(1, 183)$ = 8.02, p = .005, η_p^2 = .042). Of note, we did not find a difference for the proportion of first-person plural pronouns (i.e., we, us, our, ours) between devices (p = .40).

Study 2A tests the effect of smartphone use on the perceived self-expressiveness of one's choice. We also included a tablet PC condition to rule out alternative accounts such as modality (touch vs. non-touch interface). We randomly assigned participants (Mturkers, N = 218, 41.7% females, M_{age} = 36) to use their smartphone, tablet, or PC to make a hypothetical car choice and measured the extent to which they perceived their choice as self-expression (e.g., "The choice of the car brand expresses that I am unique," "The choice of the car brand shows who I am"; (Kaiser et al. 2017; Whitley et al. 2018). We pretested to create the generic option sets that none of the options is particularly different or unique, and preferred. As we intended, choice did not vary across devices ($\chi^2(8)$ = 6.46, p = .60), but importantly, participants using smartphones perceived their chosen option can express who they are (M = 4.69) than participants using PCs (M = 3.71; $F(1, 215)$ = 16.54, p < .001) and tablets (M = 4.01; $F(1, 215)$ = 6.52, p = .011). There was no difference between the PC and tablet conditions (p = .28).

Study 2B tests whether our effect might reflect differences in the size of the display between smartphones and PCs. A smaller display may lead respondents to feel spatially confined (Levav and Zhu 2009), disfluency (Kim et al. 2015) or narrow the scope of attention (Ghose, Goldfarb, and Han 2013), which may impact our dependent measures. We randomly assigned participants (students, N = 311, 65.9% females, M_{age} = 20) into a three-condition smartphone vs. PC vs. PC-small-screen between-subjects design. Specifically, participants in the PC-small-screen condition used their laptops but saw the entire study on a smaller display in the middle of their screen, similar in size to a smartphone's screen. They made a hypothetical sunglasses choice and measured the extent to which they perceived their choice as self-expression using the same measures as in Study 2A. The results revealed that participants in the smartphone condition perceived their chosen option can express who they are (M = 4.32, SD = 1.16) compared with participants in both the PC (M = 3.88, SD = 1.24; $F(1, 308)$ = 6.20, p = .013) and PC-small-screen conditions (M = 3.91, SD = 1.44; $F(1, 308)$ = 5.36, p = .021).

Study 3 uses a moderation approach to test the underlying role of self-focus. We randomly assigned participants (Mturkers N = 198, 55.6% females, M_{age} = 37) to one of four conditions in a 2 (device: smartphone vs. PC) × 2 (self-focus: low vs. control) between-subjects design. Participants imagined visiting an online sunglasses store. To manipulate self-focus, we followed prior research which showed that feeling awe decreases self-focus (Bai et al. 2017; Piff et al. 2015). In the low self-focus condition, we presented a picture of awe-inducing landscape as a background image for the online sunglasses store. In the control condition, we presented a monochromatic and less awe-inducing version of the same picture. Manipulation checks validated the effect of this manipulation on self-focus. After participants chose their sunglasses, we measured the extent to which they perceived that their choice could show who they are as in Study 2. A significant in-

707

Advances in Consumer Research
Volume 48, ©2020

teraction ($F(1, 195) = 5.30$, $p = .02$) confirmed our theorizing regarding the role of self-focus: In the control condition, replicating our previous findings, smartphones led participants to see their choice as more self-expressive ($M = 5.07$), compared with PC ($M = 4.19$; $F(1, 195) = 7.44$, $p = .01$). However, the effect attenuated in the reduced self-focus condition ($F < 1$, $p = .59$, Figure 1).

So far, we intentionally provided generic option sets in previous studies, testing that people using smartphones perceive choice as the vehicle to express who they are than people suing other devices. Then, the natural question arises; when including a unique option in the option set, people using smartphones are more likely to choose the unique option than other options? Studies 4A and 4B investigate this question, using incentive-compatible paradigms. We predict that smartphones would increase participants' preference for options capable of expressing their uniqueness and idiosyncratic preferences.

Study 4A uses an incentive-compatible choice task adapted from prior work on uniqueness-seeking (Wan, Xu, and Ding 2014, Study 2). We randomly assigned participants (Mturkers, $N = 154$, 41.6% females, $M_{age} = 35$) to use their smartphones vs. PCs. Participants saw two Adidas t-shirts, both priced at "around $30". One t-shirt (i.e., the mainstream option) was labeled "Adidas Basic T-shirt" and was described as the popular choice among previous participants (i.e., "In a previous study, 82% participants preferred this option"). The other t-shirt (i.e., the unique option) was labeled "Adidas Eccentric T-shirt" and was described as the less popular option (i.e., "In a previous study, 18% of participants preferred this option"). We told participants that three randomly selected participants would receive their chosen t-shirt. Confirming our predictions, smartphone users were more likely to choose the unique (i.e., less popular) t-shirt (40.8%) than PC users (23.6%; $\chi^2(1) = 4.77$, $p = .03$).

Study 4B examines the effect of smartphone use on self-expressive choices in a different context, namely, preference for individually customized offers that are tailored to the consumers' idiosyncratic taste (Kramer 2007; Simonson 2005; West et al. 1999). We randomly assigned participants (students, $N = 164$, 64.0% females; $M_{age} = 20$) to use their smartphones vs. PCs. Participants first completed a "Charity Navigator Quiz," where they answered questions about prior donations and provided demographic information. We told participants that the university was collaborating with 10 (fictitious) local charity organizations and wanted students to support one charity by joining its Facebook group. Participants received two recommendations for a charity they could endorse on Facebook. One charity was said to be individually customized ("a charity based on your unique preferences") and one said to be a majority-endorsed option ("based on others' choices"). Confirming our prediction, smartphone users preferred the individually customized option (62.8%) than PC users (42.9%; $\chi^2(1) = 6.41$, $p = .01$).

Our research makes several theoretical and practical contributions. First, relatively little is known about how smartphone use influences consumer choice and choice perception. With few exceptions (Melumad, Inman, and Pham 2019; Melumad and Pham 2020) most previous research on smartphone use has been exploratory, either because it used correlational data or because it did not directly compare the effect of smartphone use with that of other devices (e.g., PC) in a controlled setting. Our work examines the causal effect of smartphone use on consumer behavior. Second, we contribute to the literature on self-focus by examining a novel, albeit pervasive, cue that activates self-focus in everyday life. Self-focus has far-reaching implications for consumer behavior, impacting product evaluation (Dagogo-Jack and Forehand 2018; Hung and Wyer 2011; Weiss and Johar 2013), service satisfaction (Pham et al. 2010), affective decision-making (Chang and Hung 2018), and choice (Goukens, Dewitte,

and Warlop 2009). Considering the pervasiveness of smartphones, demonstrating that smartphones increase self-focus could have similar, potentially far-reaching implications. Third, we contribute to the literature on choice's self-expressive function (Schwartz and Cheek 2017) by investigating the effect of smartphone use and self-focus on self-expression. Consumers often see their choices as a form of self-expression, but the extent to which this occurs varies depending on the decision task (e.g., Maimaran and Simonson 2011), the product category (Berger and Heath 2007), decision-makers' culture and self-construal (Kim and Drolet 2003), their self-concept clarity and confidence (Morrison and Johnson 2011; Rozenkrants, Wheeler, and Shiv 2017), and their motivations (Sela, Berger, and Kim 2017; Whitley, Trudel, and Kurt 2018). We extend this literature by demonstrating that self-focus, activated by smartphone use, can influence the self-expressive role of choice.

In addition, we expect to provide important insights for marketers. This work provides important insights for marketers. Online vendors routinely track the device used by their customers and often tailor site format and content to the device used. Our results suggest that consumers may find individually customized, unique, and self-expressive offers particularly appealing when using a smartphone. Amazon.com, for example, could prioritize presenting "especially for you" rather than "best-seller" recommendations for smartphone customers and Chipotle may offer their mobile users more customizable menu options. Considering the emphasized self-expressive function of choices made on smartphones, compared with PCs, marketers may wish to craft persuasive messages that target the self-expressive role of attitudes when advertising on smartphones (Shavitt 1990). Smartphone users may be more responsive to an identity-related appeal, whereas PC users may be better persuaded by a benefit-based appeal. Similarly, because hedonic choices are often more self-expressive than utilitarian ones (Maimaran and Simonson 2011), a hedonic frame may be more persuasive on a smartphone, whereas a utilitarian frame may be more effective on a PC.

Smartphones are revolutionizing consumer behavior, but little is known about whether and how they change consumer decision making. This research indicates that smartphones may influence what people choose and how they perceive their choices, once made. Thus, smartphones appear to influence choice itself as well as the perceived meaning of choice.

REFERENCES

Bai, Yang, Laura A Maruskin, Serena Chen, Amie M Gordon, Jennifer E Stellar, Galen D. McNeil, Kaiping Peng, and Dacher Keltner (2017), "Awe, the Diminished Self, and Collective Engagement: Universals and Cultural Variations in the Small Self," Journal of Personality and Social Psychology, 113(2), 185–209.

Berger, Jonah and Chip Heath (2007), "Where Consumers Diverge from Others: Identity Signaling and Product Domains," Journal of Consumer Research, 34(2), 121–34.

Chang, Hannah H. and Iris W. Hung (2018), "Mirror, Mirror on the Retail Wall: Self-Focused Attention Promotes Reliance on Feelings in Consumer Decisions," Journal of Marketing Research, 55(4), 586–99.

Clayton, Russell B., Glenn Leshner, and Anthony Almond (2015), "The Extended ISelf: The Impact of iPhone Separation on Cognition, Emotion, and Physiology," Journal of Computer-Mediated Communication, 20(2), 119–35.

Criteo (2018), "Global Commerce Review: Americas, Q2 2018" (accessed November 27, 2019), https://www.criteo.com/wp-content/uploads/2018/09/18_GCR_Q2_Report_AMER-1.pdf.

Dagogo-Jack, Sokiente W and Mark R Forehand (2018), "Egocentric Improvement Evaluations: Change in the Self as an Anchor for Brand Improvement Judgments," Journal of Marketing Research, 55(6), 934–50.

Duval, Shelley and Robert A. Wicklund (1972), "A Theory of Objective Selfconsciousness," Academic Press.

Ghose, Anindya, Avi Goldfarb, and Sang Pil Han (2013), "How Is the Mobile Internet Different? Search Costs and Local Activities," *Information Systems Research*, 24(3), 613–31.

Gibbons, Frederick X. (1990), "Self-Attention and Behavior: A Review and Theoretical Update," Advances in Experimental Social Psychology, 23(C), 249–303.

Google (2018), "Micro-Moments Evolve with Consumer Behavior" (accessed November 27, 2019), https://www.thinkwithgoogle.com/data-collections/micro-moments-consumer-behavior-immediate-expectations/.

Goukens, Caroline, Siegfried Dewitte, and Luk Warlop (2009), "Me, Myself, and My Choices: The Influence of Private Self-Awareness on Choice," Journal of Marketing Research, 46(5), 682–92.

Hung, Iris W and Robert S. Wyer (2011), "Shaping Consumer Imaginations: The Role of Self-Focused Attention in Product Evaluations," Journal of Marketing Research, 48(2), 381–92.

Ingram, Rick E. (1990), "Self-Focused Attention in Clinical Disorders: Review and a Conceptual Model," Psychological Bulletin, 107(2), 156–76.

Kaiser, Ulrike, Martin Schreier, and Chris Janiszewski (2017), "The Self-Expressive Customization of a Product Can Improve Performance," Journal of Marketing Research, 54(5), 816–31.

Kim, Heejung and Aimee Drolet (2003), "Choice and Self-Expression: A Cultural Analysis of Variety-Seeking," Journal of Personality and Social Psychology, 85(2), 373–82.

Kim, Jaewon, Paul Thomas, Ramesh Sankaranarayana, Tom Gedeon, and Hwan-Jin Yoon (2015), "Eye-Tracking Analysis of User Behavior and Performance in Web Search on Large and Small Screens," *Journal of the Association for Information Science and Technology*, 66(3), 526–44.

Levav, Jonathan and Rui Zhu (2009), "Seeking Freedom through Variety," *Journal of Consumer Research*, 36(4), 600–610.

Maimaran, Michal and Itamar Simonson (2011), "Multiple Routes to Self- Versus Other-Expression in Consumer Choice," Journal of Marketing Research, 48(4), 755–66.

McKinsey & Company (2015), "Global Media Report 2015" (accessed November 27, 2019), https://www.mckinsey.com/industries/media-and-entertainment/our-insights/2015-global-media-report.

Melumad, Shiri and Michel Tuan Pham (2020), "The Smartphone as a Pacifying Technology," ed. Darren W Dahl, Amna Kirmani, and Peter R Darke, Journal of Consumer Research, ucaa005.

Melumad, Shiri, J Jeffrey Inman, and Michel Tuan Pham (2019), "Selectively Emotional: How Smartphone Use Changes User-Generated Content," Journal of Marketing Research, 56(2), 259–75.

Morrison, Kimberly Rios and Camille S Johnson (2011), "When What You Have Is Who You Are: Self-Uncertainty Leads Individualists to See Themselves in Their Possessions," Personality and Social Psychology Bulletin, 37(5), 639–51.

Park, Chang Sup and Barbara K Kaye (2019), "Smartphone and Self-Extension: Functionally, Anthropomorphically, and Ontologically Extending Self via the Smartphone," Mobile Media & Communication, 7(2), 215–31.

Pham, Michel Tuan, Caroline Goukens, Donald R Lehmann, and Jennifer Ames Stuart (2010), "Shaping Customer Satisfaction through Self-Awareness Cues," Journal of Marketing Research, 47(5), 920–32.

Piff, Paul K, Pia Dietze, Matthew Feinberg, Daniel M Stancato, and Dacher Keltner (2015), "Awe, the Small Self, and Prosocial Behavior.," Journal of Personality and Social Psychology, 108(6), 883–99.

Ransbotham, Sam, Nicholas H Lurie, and Hongju Liu (2019), "Creation and Consumption of Mobile Word of Mouth: How Are Mobile Reviews Different?," *Marketing Science*, 1–20.

Rozenkrants, Bella, S. Christian Wheeler, and Baba Shiv (2017), "Self-Expression Cues in Product Rating Distributions: When People Prefer Polarizing Products," Journal of Consumer Research, 44(4), 759–77.

Schwartz, Barry and Nathan N. Cheek (2017), "Choice, Freedom, and Well-Being: Considerations for Public Policy," Behavioural Public Policy, 1(1), 106–21.

Sela, Aner, Jonah Berger, and Joshua Kim (2017), "How Self-Control Shapes the Meaning of Choice," Journal of Consumer Research, 44(4), 724–37.

Silvia, Paul J. and Ann G Phillips (2013), "Self-Awareness Without Awareness? Implicit Self-Focused Attention and Behavioral Self-Regulation," Self and Identity, 12(2), 114–27.

Statcounter (2019), "Desktop vs Mobile vs Tablet Market Share Worldwide" (accessed November 27, 2019), https://gs.statcounter.com/platform-market-share/desktop-mobile-tablet/worldwide/.

Wan, Echo Wen, Jing Xu, and Ying Ding (2014), "To Be or Not to Be Unique? The Effect of Social Exclusion on Consumer Choice," Journal of Consumer Research, 40(6), 1109–22.

Weiss, Liad and Gita V. Johar (2013), "Egocentric Categorization and Product Judgment: Seeing Your Traits in What You Own (and Their Opposite in What You Don't)," Journal of Consumer Research, 40(1), 185–201.

Whitley, Sarah C., Remi Trudel, and Didem Kurt (2018), "The Influence of Purchase Motivation on Perceived Preference Uniqueness and Assortment Size Choice," Journal of Consumer Research, 45(4), 710–24.

Wu, Eugenia C, Sarah G Moore, and Gavan J Fitzsimons (2019), "Wine for the Table: Self-Construal, Group Size, and Choice for Self and Others," Journal of Consumer Research, 46(3), 508–27.

Its Not All Kosher: Experience of Deviant Consumption In Context of Religion

Arti Srivastava, Indian Institute of Management Udaipur, India
Rajesh Nanarpuzha, Indian Institute of Management Udaipur, India
Prakash Satyavageeswaran, Indian Institute of Management Udaipur, India

EXTENDED ABSTRACT

Religion has been considered as a coping mechanism for individuals in difficult life situations (Cutright, 2012). For example, religious meta-narratives tend to help adherents cope with negative consequences associated with their non-compliant behavior (Muniz & O'Guinn, 2001). This could also explain why, even with increasing modernity and expected secularization, around 80% of the world population is affiliated to a religion (Pew Research Center, 2015).

Religious affiliations tend to manifest in peoples' life choices, including their consumption choices. But what happens when people deviate from their religious prescriptions in their consumption choices? Extant research shows that consumers experience severe identity conflicts when they leave the boundaries of their religious institution (McAlexander et al., 2014). However, it is unclear how consumers cope while making consumption choices that digress from their religious doctrines, even as they *continue to be affiliated* with their religion. For example, a large number of Hindus eat beef, many Muslims consume pork or liquor, and Catholics use contraception. We investigate deviant consumption in religious context through the enabling theoretical lens of 'edgework' to understand how consumers manage to operate within the boundaries of their religious institutions, while deviating from the doctrines that they believe are sacred to their institution.

Literature Review

A deviant consumption typically results in consumers' identities being threatened. In such situations, consumers sacralize their deviant consumption (Üstüner & Holt, 2007). They attach a religious metanarrative (Muniz Jr & Schau, 2005) to their deviant consumption to legitimize these choices.

In routine lives of consumers, religion specifies the norms to define standards of rights and wrongs (McAlexander et al., 2014). Consumers use religious norms to build their ideologies as well as identities. When they break away from this "central pillar of identity" (McAlexander et al., 2014, 859), they have to reconstruct their shattered identities even if they leave the field (religion). Thus, many find it difficult to exit the field of religion (McAlexander et al., 2014). But these individuals often violate certain prescriptions of the institution. How do such consumers manage to operate within the boundaries of their religious institutions, while deviating from the doctrines that they believe are sacred to their institution?

We investigate partial deviance from religious prescriptions when individuals continue to remain affiliated to their religion. These individuals who maintain their ties with the religious institution while negotiating with the limits of the acceptable behavior differ from those who are either outside the field (McAlexander et al., 2014) or remain inside its boundaries (Sandikci & Ger, 2010). Broadly, we situate our study within the broad contours of understanding individuals' negotiation between boundaries of acceptable verses non-acceptable consumption.

Theoretical Background

Individuals engaging in deviant consumption within religious boundaries simultaneously have to manage socially non-conforming consumption while continuing to be situated within the confines of religious norms. We adopt the enabling theoretical lens of 'edgework' to explain this interaction. Edgework has been studied in the context of high risk physical activities (Celsi et al., 1993; Lyng, 2004) as well as consumers challenging their identity boundaries (Thompson & Üstüner, 2015). Similar to Thompson & Üstüner's (2015) roller derby girls, our informants negotiate the boundaries of the field and try to make their deviant consumptionbacceptable. We use the concept of boundary work to explain this reconstruction of boundaries (Gieryn, 1983; Weinberger, 2015).

Methodology

We conducted sixteen depth interviews ranging with self-reported believers following McCracken (1988). Further, the informants were encouraged to recall critical incidents of non-adherence. All interviews were coded and conducted by the first author. Emergent themes were arrived at through a series of mutual discussions between all authors. Constant comparison was used to move between data collection, informant selection and data analysis (Glaser & Strauss, 2017; Miles & Huberman, 1984)

Findings and Discussion

Our participants described experiences of social exclusion and shaming within their social circles because of their deviant consumption. They also described religion as an important field of capital that provides them support, stability, and identity meanings.

Informants used phrases such as 'still there in upbringing', 'programmed that way', and 'I don't believe in it but can't break away' to describe their conformance. However, they described their deviant consumption experiences as transcendental and emancipatory. The contrasting experience of feeling entangled and liberated simultaneously means the consumer is neither bound to the field (religion) nor able to cross its boundaries.

In line with Thompson and Ustuner's (2015) findings, we found evidence of our informants challenging boundaries of religious institutions by *operating on the edge* of the field boundaries. For example, consumers engage in acts of deviant consumption that risks their social status, because they do not want to miss out on this experience. This behavior is close to the sociological concept of edgework. However, the perception of norms in the field of religion are not as fluid (McAlexander et al., 2014) as those in gendered spaces (Thompson & Üstüner, 2015). Thus, it is difficult to maintain the identity as follower of a religion and attempt to *reconstruct the boundaries* of the field norms.

In such cases, consumers try to legitimize their choices by detaching the spiritual aspect of religion from the religious dogma, which we term as *de-norming the institution*. In cases where the deviants were unable to separate these beliefs, we found that they *rationalize* their actions based on facts by finding reference points outside their religion. Further, to reduce the risk of status loss, they try to normalize their consumption choices by propagating their beliefs to others.

Conclusion

In the present research, we posit that in contexts where consumers value the field capital, they consciously choose to engage in deviant consumption because it provides them with the transcendental experience of operating on the edge. However, we also find deviant consumers using external reference points to

legitimize their consumption and expand the boundaries of acceptable behavior in their social domains. Combining boundary work with edgework allows us to explain this contradiction in behavior of deviant consumers, who maintain their field identities and yet deviate from its prescribed norms.

REFERENCES

Celsi, R. L., Rose, R. L., & Leigh, T. W. (1993). An Exploration of High-Risk Leisure Consumption Through Skydiving. *Journal of Consumer Research*, *20*(1), 1. https://doi.org/10.1086/209330

Cutright, K. M. (2012). The Beauty of Boundaries: When and Why We Seek Structure in Consumption. *Journal of Consumer Research*, *38*(5), 775–790. https://doi.org/10.1086/661563

Gieryn, T. F. (1983). Boundary-work and the demarcation of science from non-science: Strains and interests in professional ideologies of scientists. *American Sociological Review*, 781–795.

Glaser, B. G., & Strauss, A. L. (2017). *Discovery of grounded theory: Strategies for qualitative research*. Routledge.

Lyng, S. (2004). *Edgework: The sociology of risk-taking*. Routledge.

McAlexander, J. H., Dufault, B. L., Martin, D. M., & Schouten, J. W. (2014). The marketization of religion: Field, capital, and consumer identity. *Journal of Consumer Research*, *41*(3), 858–875.

McCracken, G. (1988). *The long interview* (Vol. 13). Sage.

Miles, M. B., & Huberman, A. M. (1984). *Qualitative data analysis. Beverly Hills*. Ca: Sage.

Muniz, A. M., & O'Guinn, T. C. (2001). Brand Community. *Journal of Consumer Research*, *27*(4), 412–432. https://doi.org/10.1086/319618

Muniz Jr, A. M., & Schau, H. J. (2005). Religiosity in the abandoned Apple Newton brand community. *Journal of Consumer Research*, *31*(4), 737–747.

Pew Research Center. (2015). America's changing religious landscape. *Pew Research Center*.

Sandikci, Ö., & Ger, G. (2010). Veiling in Style: How Does a Stigmatized Practice Become Fashionable? *Journal of Consumer Research*, *37*(1), 15–36. https://doi.org/10.1086/649910

Thompson, C. J., & Üstüner, T. (2015). Women Skating on the Edge: Marketplace Performances as Ideological Edgework. *Journal of Consumer Research*, *42*(2), 235–265. https://doi.org/ 10.1093/jcr/ucv013

Üstüner, T., & Holt, D. B. (2007). Dominated Consumer Acculturation: The Social Construction of Poor Migrant Women's Consumer Identity Projects in a Turkish Squatter. *Journal of Consumer Research*, *34*(1), 41–56. https://doi.org/10.1086/513045

Weinberger, M. F. (2015). Dominant Consumption Rituals and Intragroup Boundary Work: How Non-Celebrants Manage Conflicting Relational and Identity Goals. *Journal of Consumer Research*, *42*(3), 378–400. https://doi.org/10.1093/jcr/ucv020

Guidelines on Acquiescence in Marketing Research

Janina Steinmetz, City University of London, UK
Ann-Christin Posten, University of Cologne, Germany

EXTENDED ABSTRACT

Worldwide, companies spend an estimated 46 billion U.S. dollars annually on marketing research (Statista 2019). Given these investments, international big players and small start-ups alike base consequential decisions on the results of marketing research, which often uses survey methods that are easy to administer and interpret. Thereby, marketers implicitly assume that survey responses adequately capture respondents' true attitudes and preferences. These implicit assumptions are presumably shared by academic marketing researchers, who frequently use self-report to assess consumer attitudes (Malhotra, Agarwal, and Peterson 1996). However, research has documented various response biases that systematically distort survey responses and therefore the results of academic as well as industry marketing research. Misguided investments of time and money based on biased findings can follow.

In this review, we discuss the acquiescence bias, which is the most prevalent response bias in survey-based research (Baumgartner and Steenkamp 2006). Acquiescence means to respond affirmatively to self-report items irrespective of their content. For example, if consumers indicate their interest in a product on a 5-point Likert scale ("1 = not interested", "5 = very interested"), acquiescence leads to higher observed values (i.e., greater measured interest) than justified by consumers' true interest. Also other types of self-report items (e.g., nominal true/false choices or ordinal scales) are affected by acquiescence (Welkenhuysen-Gybels, Billiet, and Cambré 2003). Furthermore, acquiescence can produce spurious correlations between otherwise unrelated constructs (MacKenzie and Podsakoff 2012; Steinmetz and Posten 2017). Thus, acquiescence can lead to false conclusions when comparing means and correlations from groups (e.g., different segments) that differ in acquiescence or when interpreting absolute values on survey scales or yes/no items.

Given that acquiescence can significantly distort survey responses, past research has been dedicated to measurement and correction strategies for acquiescence (e.g., Krautz and Hoffmann 2018). Several such strategies have been developed as a result (e.g., trait acquiescence measure, balanced scales, or heterogeneous items). Whereas the usage of these strategies can decrease acquiescence, they can introduce various validity problems and are costly in terms of respondents' time (Greenleaf 1992). In light of this trade-off, identifying factors that foster or attenuate acquiescence can help researchers and practitioners to create settings that reduce acquiescence; and to make informed decisions when using strategies to mitigate acquiescence. Ultimately, marketing research can thus be conducted more efficiently and reliably.

Synthesizing and extending previous research, we identify individual differences as well as cultural and situational factors that foster acquiescence. We analyze existing strategies to counter the effects of acquiescence. Furthermore, we highlight when such strategies are beneficial—and when alternative market research methods that are unaffected by acquiescence are especially useful. Based on our analyses, we provide eight guidelines for marketers to assess, control for, and prevent acquiescence.

Individual Differences in Acquiescence

Some of the earliest research on acquiescence defined it as a personality variable that differs between individuals (Couch and Keniston 1960). Based on this understanding, three main strategies have been developed to identify (and potentially exclude from analyses) individual high-acquiescence respondents. As the first strategy, researchers can use an explicit measure of trait acquiescence. This measure extends surveys by a 19-item acquiescence scale (Couch and Keniston 1960). However, this scale is rarely used and consists of items whose wording seems somewhat outdated. Second, researchers construct surveys consisting of heterogeneous items, such that respondents' agreement with unrelated items signals acquiescence. However, content-heterogeneous items are difficult to design as item heterogeneity is not clearly defined and operationalized (Baumgartner and Steenkamp 2006). Third, surveys contain both positively worded ("Vaccines can save lives") and negatively worded ("Vaccines cannot prevent deadly diseases") items to identify (and exclude if necessary) those who agree with both positive and negative items as respondents high in acquiescence (Welkenhuysen-Gybels et al. 2003). Such balanced scales are indeed less affected by acquiescence (Baumgartner and Steenkamp 2006). However, researchers have recommended that balanced scales are used with caution, as respondents might be confused and the item error-variance might increase as a result (Weijters and Baumgartner 2012).

Over and above the potential measurement concerns, marketers might find the use of these three strategies inconvenient despite their benefits. As market research is increasingly using web-based short surveys with large sample sizes (Wilson 2018), the addition of a substantial number of items is hardly feasible. Newer research potentially offers another measurement option. It shows that respondents who score high in habitual interpersonal trust acquiesce to questions across a wide variety of content (Posten and Steinmetz 2020). In this view, acquiescence emerges when respondents accept the questions-asker's propositions because they generally trust others, which can be measured by adding a single item. Consequently, measuring habitual trust could be an efficient way to identify respondents who might acquiesce.

Cultural Differences in Acquiescence

Acquiescence does not only differ between individuals, but also between cultures. Acquiescence is especially pronounced in East-Asian cultures that are high in power distance and cultural collectivism (Krautz and Hoffmann 2018). That is, respondents from cultures (e.g., India) with large hierarchical differences (i.e., high power distance) or cultures that value group cohesion over individual uniqueness (i.e., high collectivism) are more likely to acquiesce than respondents from cultures with low power distance or individualism (e.g., Sweden). Cultural differences in acquiescence can pose a considerable problem for cross-cultural marketing, which has experienced a surge in recent years due to globalization (Leonidou et al. 2018). For example, if 50% of Swedish respondents indicate that they are interested in the product (whether on a yes/no or Likert scale item) and 60% of Indian respondents give the same response, these differences might well be solely due to greater acquiescence in India.

To account for cultural differences in acquiescence, the three types of strategies discussed above (i.e., explicit acquiescence measures, heterogeneous items, balanced scales) have been suggested, with the same practicality issues. Recent research has taken a different approach, by combining different question types (i.e., scales and true/false responses) to measure a single construct (pARS; Krautz and Hoffmann 2018). Via the deviation between the scale responses

and true/false choices, acquiescence can be estimated. However, pARS can only be applied to contexts in which consumers' objective knowledge is assessed with true/false choices. In contrast, in the majority of consumer contexts, marketers ask about constructs that are much more subjective (e.g., brand loyalty, evaluation of an ad or product). Despite its benefits, pARS can thus be applied to a limited range of surveys, but its potential is evident to identify specific cultures, subcultures, or segments that are high in acquiescence. Once such groups have been identified, surveys to target these groups can add more specific strategies against acquiescence.

Situational Determinants of Acquiescence

Over and above individual and cultural differences that foster acquiescence, research has highlighted situational factors that amplify this bias. Among these situational factors are consumers' lack of ability or motivation to respond accurately. In line with this notion, acquiescence increases when the question wording is vague or when respondents are uncertain of their true attitude or under time pressure (Baumgartner and Steenkamp 2006). Marketers would certainly be wise to avoid vague or ambiguous question wording in surveys. Yet, acquiescence would likely persist, as respondents with ample time and motivation to respond accurately might be difficult to recruit, especially when using online surveys (Savage and Waldman 2008).

Recent research has identified additional psychological factors that foster acquiescence, namely respondents' motivation to affiliate with the question-asker (Posten and Steinmetz 2018; Steinmetz and Posten 2017). When respondents thought about a friend reading their answers, acquiescence was greater than when they thought about a stranger. Because friends are more common targets of affiliation, these results suggest that affiliation motives increase acquiescence. This effect might pose a paradox for marketers: Whereas affiliation with brands is a desirable outcome of marketing (Veloutsou 2009), affiliation might undermine the accuracy of research about these brands. Two situations in particular could be problematic: first, (perceived) rejection by a brand, and second, marketing a brand as a friend. Regarding the first situation, research has shown that feeling rejected by an aspirational brand leads consumers to desire affiliation with the brand (Ward and Dahl 2014), for example when a consumer cannot afford signature products by a desired brand. Regarding the second situation, research has shown that consumers believe to have (friend-like) relationships with brands, stores, and salespeople (Kim and Kwon 2011). Such friend-like relationships might emerge especially for identity-relevant products such as clothing or entertainment.

Guidelines for Marketing Researchers

So far, we have identified individual and cultural respondent characteristics and contextual factors that render acquiescence likely. Among these are, paradoxically, contexts that are typically desired by marketers, namely affiliation between the consumer and a given brand. Based on these findings, our guidelines identify circumstances that might have previously not thought of as problematic for market research (e.g., covering an aspirational brand). Broadly speaking, our guidelines build on the notion that circumstances that foster trust, affiliation, and friend-like feelings to the researcher and/or the brand targeted by market research might undermine the veracity of the results because such circumstances can also foster acquiescence. Thus, with our guidelines we attempt to put recent research into practice (see Table 1).

Guideline 1: *Assess the extent to which the respondents, the environment, or the research subject are prone to acquiescence.*

At the onset of a marketing research project, marketers could assess to what extent their survey is prone to acquiescence. As discussed above, acquiescence is likely a problem if informants come from cultures that are high in power distance or collectivism (Krautz and Hoffmann 2018), or are habitually trusting (Posten and Steinmetz 2020). Acquiescence is also likely if the survey covers an aspirational brand or a brand with which consumers have friend-like ties (Kim and Kwon 2011; Ward and Dahl 2014), or if respondents are motivated to affiliate with the brand (Steinmetz and Posten 2017). Under such circumstances, we recommend the use of strategies to counter acquiescence.

Guideline 2: *Assess to what extent the survey consists of item types that are prone to acquiescence, and to what extent responses inform decisions.*

We suggest that marketers consider whether their survey consists of item types affected by acquiescence. In particular when interpreting Likert scales, yes/no choices, or correlations, the error variance might be inflated and responses might not reflect true attitudes. In such cases, it would be wise to exert special caution if survey responses directly inform decisions. For example, in case a restaurant plans to roll out a new pizza topping if a certain percentage of customers reply "yes" to the question whether they would like this topping, acquiescence could inflate this percentage, such that the roll-out decision relies on incorrect information.

Guideline 3: *If the risk of acquiescence is high, use alternative methods if possible.*

If the risk of acquiescence seems high due to the above considerations (cf. Guidelines 1-2), marketers could use methods that are typically less affected by acquiescence. Such techniques include the application of ranking rather than rating scales (Harzing et al. 2009) or the item count technique developed for researching sensitive consumer issues (e.g., criminal behaviour, de Jong and Pieters 2019). Given their resilience to acquiescence, we suggest using such alternative methods whenever the research question allows.

Guideline 4: *Add single-item control measures of factors that foster acquiescence.*

When designing surveys and experiments, marketers could make use of the relation between trust and acquiescence (Posten and Steinmetz 2020). These relations suggest a novel means to assess and control for acquiescence. In some of their studies, Posten and Steinmetz (2020) used a single-item measure of respondents' interpersonal trust to predict acquiescence, in online as well as laboratory settings. Such a single-item measure (e.g., "How trustworthy did you find the person asking you questions?") could be integrated even into very short online surveys, and responses could be used as a control variable in the analyses.

Guideline 5: *Combine surveys with methods that are less prone to acquiescence.*

Over and above the previous suggestions to counter acquiescence, marketers could use multi-method approaches whenever acquiescence is likely. Surveys on existing products or services can be complemented by observational data (e.g., online search data), whereas surveys on novel products and services can be complemented by experiments that can provide physiological and behavioral data. Such multi-method approaches curb the effects of acquiescence on a single method because they combine different data sources.

Guideline 6: *Reduce environmental factors that could foster acquiescence.*

Regardless of the specific risk of acquiescence, we suggest that marketers ensure that the survey environment does not foster acquiescence. If respondents complete surveys face to face, this could take place in a physically neutral space that does not signal affiliation

through a friendly atmosphere. As one remedy, we suggest that marketers use, if possible, computer-administered surveys without much interpersonal interaction to reduce possible effects of personal affiliation on acquiescence.

Guideline 7: *Separate respondent recruitment and survey administration.*

Advising marketers to use interpersonally neutral environments might be contrary to the experience of market researchers who at times use affiliation, trust, and personal warmth to recruit survey respondents. On the one hand, affiliation is undoubtedly helpful to recruit respondents. On the other hand, affiliation can distort responses. A solution to this paradox could be to separate recruitment and survey administration as much as possible. One way to do so would be to create temporal, spatial, or personal distance, for example such that the recruiter is a different person than the survey administrator. Whereas the recruiter can capitalize on affiliation and trust to find respondents, the administrator can create a neutral space that is free of such cues to prevent acquiescence. The same applies to web surveys. Whereas the recruitment could take place in trusted apps, the survey itself could be taken on separate neutral websites.

Guideline 8: *Mask the recipient of the survey responses.*

An additional way to potentially reduce acquiescence would be to dilute the identification of the recipient of respondents' answers. As research has shown, acquiescence increases if respondents believe their answers will be read by a friend (Steinmetz and Posten 2017). By implication, if respondents believe their answers will be read by representatives of an aspirational or affiliative brand, they might acquiesce more. Thus, marketers could try to ask about several brands or products within one survey, and some questions could serve as filler items to obscure who will read the survey responses. Thereby, respondents might feel less motivation to affiliate through acquiescence.

Conclusion

Acquiescence can pose a significant problem for the validity of marketing research. As a result, a variety of strategies to assess it have been developed. We reviewed these strategies, and integrated them into a broader discussion of the individual, cultural, and situational factors that foster acquiescence. Therefrom, we developed guidelines for marketers to address the concern of acquiescence when designing, administering, and interpreting surveys.

REFERENCES

Baumgartner, H., & Steenkamp, J.-B. E. M. (2006). Response biases in marketing research. In Grover, R., & Vriens, M. (Eds), *The Handbook of Marketing Research – Uses, Misuses, and Future Advances (pp. 95-109).* Sage, Thousand Oaks, CA.

Couch, A., & Keniston, K. (1960). Yeasayers and naysayers: Agreeing response set as a personality variable. *The Journal of Abnormal and Social Psychology, 60(2),* 151-174.

de Jong, M. G., & Pieters, R. (2019). Assessing sensitive consumer behavior using the item count response technique. *Journal of Marketing Research, 56(3),* 345-360.

Greenleaf, E. A. (1992). Measuring extreme response style. *Public Opinion Quarterly, 56(3),* 328-351.

Harzing, A. W., Baldueza, J., Barner-Rasmussen, W., Barzantny, C., Canabal, A., Davila, A., ... & Liang, Y. K. (2009). Rating versus ranking: What is the best way to reduce response and language bias in cross-national research?. *International Business Review, 18(4),* 417-432.

Kim, H. Y., & Kwon, Y. J. (2011). Soulmates, best friends, and casual buddies: The relationship of US college students to retailer brands. *Clothing and Textiles Research Journal, 29(1),* 67-82.

Krautz, C., & Hoffmann, S. (2018). Cross-cultural application of a practice-oriented acquiescence measure. *International Marketing Review, 36(3),* 391-415.

Leonidou, L. C., Katsikeas, C. S., Samiee, S., & Aykol, B. (2018). International marketing research: A state-of-the-art review and the way forward. In *Advances in Global Marketing (pp. 3-33).* Springer, Cham.

Malhotra, N.K., Agarwal, J., & Peterson, M. (1996). Methodological issues in cross-cultural marketing research: a state-of-the-art review. *International Marketing Review, 13(5)*, 7-43.

MacKenzie, S. B., & Podsakoff, P. M. (2012). Common method bias in marketing: causes, mechanisms, and procedural remedies. *Journal of Retailing, 88(4),* 542-555.

Posten, A. C., & Steinmetz, J. (2018). Temperatur und Zustimmung-ein bisher unbekannter Zusammenhang: Einblicke für Praxis und Forschung. *Praxis der Rechtspsychologie.*

Posten, A. C., & Steinmetz, J. (2020). Who's a yea-sayer? Habitual trust and affirmative response behaviour. *Paper presented at the Fachgruppe Sozialpsychologie Conference in Cologne/ Germany.*

Savage, S. J., & Waldman, D. M. (2008). Learning and fatigue during choice experiments: a comparison of online and mail survey modes. *Journal of Applied Econometrics, 23(3),* 351-371.

Statista (2019). https://www.statista.com/statistics/242477/global-revenue-of-market-research-companies/ (accessed July 17th 2019).

Steinmetz, J., & Posten, A. C. (2017). Physical temperature affects response behavior. *Journal of Experimental Social Psychology, 70,* 294-300.

Veloutsou, C. (2009). Brands as relationship facilitators in consumer markets. *Marketing Theory, 9(1),* 127-130.

Ward, M. K., & Dahl, D. W. (2014). Should the devil sell Prada? Retail rejection increases aspiring consumers' desire for the brand. *Journal of Consumer Research, 41(3),* 590-609.

Weijters, B., & Baumgartner, H. (2012). Misresponse to reversed and negated items in surveys: A review. *Journal of Marketing Research, 49(5),* 737-747.

Welkenhuysen-Gybels, J., Billiet, J., & Cambré, B. (2003). Adjustment for acquiescence in the assessment of the construct equivalence of Likert-type score items. *Journal of Cross-Cultural Psychology, 34(6),* 702-722.

Wilson, A. (2018). *Marketing Research: Delivering Customer Insight, 4th Ed.* Basingstoke, U.K. Palgrave MacMillan.

Propelling Pride to Promote Healthy Food Choices
Among Entity and Incremental Theorists

Julia Storch, University of Groningen, The Netherlands
Jing Wan, University of Guelph, Canada
Koert van Ittersum, University of Groningen, The Netherlands

EXTENDED ABSTRACT

Past research suggests that people's beliefs about the malleability of their body weight influence their motivation to engage in healthful behaviors: people who perceive their body weight as fixed (entity theorists) engage less in healthful behaviors than people who perceive their body weight as changeable (incremental theorists; e.g., Burnette 2010; Lyons, Kaufman, and Rima 2015; Parent and Alquist 2016). The reason for more maladaptive behaviors among entity theorists appears to be disbelief in their personal ability to successfully engage in healthful behaviors and change their body weight (Ehrlinger et al. 2017).

We test whether the elicitation of pride from past achievements can serve as an intervention to promote healthful behaviors among entity theorists. In two studies, we examined the effect of pride recall based on different events – related and unrelated to the health domain – on entity theorists' food choice healthiness. We also examine how such pride recall affects food choice healthiness among incremental theorists.

We propose that pride recall has different motivational consequences for incremental versus entity theorists due to their tendencies to orient towards *effort* versus *ability*, respectively as dominant explanation for successful weight management. Incremental theorists tend to attribute success or failure to sufficient or insufficient expenditure of effort, whereas entity theorists tend to attribute success and failure to their ability to control their body weight thereby discounting the role of effort (see Hong et al., 1999). Owing to their tendency to attribute prior success to sufficient levels of ability, pride may serve as a validation of entity theorists' ability to successfully pursue a long-term goal. We hypothesize that pride will promote healthy food choices among entity theorists irrespective of wheher pride is *related* (a healthy food choice) or *unrelated* (a smart spending decision) to the health domain – the source of pride should not matter.

However, among incremental theorists the source of pride should matter. Although pride can signal the importance of achievement within a given domain (Hofmann and Fisher 2012) – people deduce from their feeling of pride that they value achievement – pride can also serve as a justification for self-reward after achievement (Salerno, Laran, and Janiszewski 2015; Wilcox, Kramer, and Sen 2011). A pride experience that is unrelated to the health domain may only signal a prior successful expenditure of effort without reinforcing the perceived desirability of achievement within the health domain. As such, we hypothesize that only health-related, but not health-unrelated pride will promote food choice healthiness among incremental theorists

Hypothesis 1: *The recall of a pride experience related to past healthful behaviors will increase subsequent engagement in healthful behavior compared to a situation when no pride is experienced, irrespective of implicit theories.*

Hypothesis 2: *Among those with stronger incremental theories, the recall of a pride experience unrelated to past healthful behaviors will decrease subsequent engagement in healthful behavior compared to a situation when no pride is experienced.*

Study 1 was conducted online using Mturk ($N = 282$). To elicit pride, participants either wrote about recent healthy consumption decision (health-related pride), or recent spending decision that allowed them to save money (health-unrelated pride), or described what their regular day looks like (control condition; see Salerno et al. 2015). As measure of food choice healthiness, each participant received seven virtual lottery tickets to allocate between either of the two prize packages – an indulgent "candy box" versus a relatively healthier "fruit and nut box". Implicit theories of body weight were measured as a continuous moderator (Levy, Stroessner, and Dweck 1998).

We find support for a non-significant interaction between implicit theories and health-related pride ($b = 1.49$, $SE = .14$, $p = .296$). Participants in the health-related pride condition were significantly more likely to prefer the fruit and nut box over the candy box, irrespective of their implicit theories, providing support for H1. Supporting H2, we find a significant interaction effect between spending-related pride and implicit theories ($b = -.29$, $SE = .14$, $p = .029$) – in the spending-related pride condition, preference for the fruit and nut box decreased with stronger incremental theories.

Study 2 was conducted in the lab ($N = 183$) using the same emotion induction task. As measure of food choice healthiness, participants made a real snack choice between an indulgent caramel chocolate bar versus a relatively healthier oat biscuit with raisins. Implicit theories of body weight (Burnette 2010) were measured as a continuous moderator as part of an unrelated study prior to the emotion induction task.

Replicating findings from Study 1 and supporting H2, we again find a significant interaction between spending-related pride and implicit theories of body weight ($b = -1.05$, $SE = .44$, $p = .016$) in Study 2. However, contrary to our expectations, we find directional support for an interaction between health-related pride and implicit theories ($b = -.74$, $SE = .47$, $p = .116$), thus providing no additional support for H1. Follow-up spotlight analysis suggests that the recall of health-related pride only increases food choice healthiness for entity ($b = 1.64$, $SE = .62$, $p = .008$), but not for incremental theorists ($b = .26$, $SE = .55$, $p = .643$).

Overall, our findings suggest that health-related pride may be the more suitable motivational tool compared with health-unrelated pride. Across two studies, we find that health-unrelated pride experiences instill reward-seeking behavior among incremental theorists, whereas health-related pride boosts entity theorists' motivation to engage in weight management practices without diminishing incremental theorists' motivation. This research contributes to the growing stream of literature studying how implicit theories affect health-related outcomes (e.g., Burnette and Finkel 2012; Lyons et al. 2015; Thai et al. 2018). Contrary to the prevailing notion that incremental theories are more adaptive with regards to many aspects of the self-regulation process than entity theories, our research reveals that incremental theorists may suffer from a higher potential to engage in self-indulgence after past achievements. Our research also points to a more nuanced picture of the emotion pride by suggesting that

whether pride is beneficial for goal-directed behavior in a focal domain depends on both its source and the lay beliefs of the individual.

REFERENCES

Burnette, Jeni L. (2010), "Implicit Theories of Body Weight: Entity Beliefs Can Weigh You Down," *Personality and Social Psychology Bulletin*, 36(3), 410–22.

Burnette, Jeni L. and Eli J. Finkel (2012), "Buffering against Weight Gain Following Dieting Setbacks: An Implicit Theory Intervention," *Journal of Experimental Social Psychology*, 48, 721–25, http://dx.doi.org/10.1016/j.jesp.2011.12.020.

Ehrlinger, Joyce, Jeni L. Burnette, Jina Park, Mycah L. Harrold, and Kasey Orvidas (2017), "Incremental Theories of Weight and Healthy Eating Behavior," *Journal of Applied Social Psychology*, 47, 320–30.

Hofmann, Wilhelm and Rachel R. Fisher (2012), "How Guilt and Pride Shape Subsequent Self-Control," *Social Psychological and Personality Science*, 3(6), 682–90.

Levy, Sheri R., Steven J. Stroessner, and Carol S. Dweck (1998), "Stereotype Formation and Endorsement: The Role of Implicit Theories.," *Journal of Personality and Social Psychology*, 74(6), 1421–36, http://doi.apa.org/getdoi.cfm?doi=10.1037/0022-3514.74.6.1421.

Lyons, Claire, Annette R. Kaufman, and Brandi Rima (2015), "Implicit Theories of the Body among College Women: Implications for Physical Activity," *Journal of Health Psychology*, 20(9), 1142–53.

Parent, Mike C. and Jessica L. Alquist (2016), "Born Fat: The Relations Between Weight Changeability Beliefs and Health Behaviors and Physical Health," *Health Education and Behavior*, 43(3), 337–46.

Salerno, Anthony, Juliano Laran, and Chris Janiszewski (2015), "Pride and Regulatory Behavior: The Influence of Appraisal Information and Self-Regulatory Goals," *Journal of Consumer Research*, 42(3), 499–514, https://academic.oup.com/jcr/article-lookup/doi/10.1093/jcr/ucv037.

Thai, Chan L, Kisha I Coa, and Annette R Kaufman (2018), "Implicit Theories of Smoking and Association with Current Smoking Status," *Journal of Health Psychology*, 23(9), 1234–39, http://journals.sagepub.com/doi/10.1177/1359105316648483.

Wilcox, Keith, Thomas Kramer, and Sankar Sen (2011), "Indulgence or Self-Control: A Dual Process Model of the Effect of Incidental Pride on Indulgent Choice," *Journal of Consumer Research*, 38(1), 151–63.

A Global Consumer Culture Perspective on the Fresh Start Mindset

Yuliya Strizhakova, Rutgers University, USA
Robin Coulter, University of Connecticut, USA
Linda L Price, University of Oregon, USA

EXTENDED ABSTRACT

Recent work by Price and her colleagues (2018) introduced the "fresh start mindset," defined as a belief that people can make a new start, get a new beginning, and chart a new course in life, regardless of past or present circumstances. Their research, theoretically grounded in neoliberalism and conducted in the U.S., established a valid and reliable scale to measure the fresh start mindset and documented that the fresh start mindset is associated with greater consumer engagement in transformative (e.g., budget-related and health-related) activities, as well as greater support of charities aimed at transforming lives of disadvantaged populations (e.g., at-risk teens and veterans). Price et al. (2018) argued that the fresh start mindset is linked to liquid modernity, where consumer identity is multi-faceted and fluid within a global environment (Bauman 2001), suggesting that the fresh start mindset may not be restricted to the U.S., but rather manifest more broadly within the global consumer culture paradigm and beyond neoliberal Western societies.

The overarching purpose of this research is to situate the fresh start mindset within a broader global context. To that end, our research agenda is four-fold, and we conduct our empirical investigation in three countries (U.S., Mexico, and Russia; see method for rationale of choice for these countries). First, we seek to establish the fresh start mindset scale (FSM) as a valid and reliable measure cross-nationally; we expect to replicate the findings of Price et al. (2018) related to the fresh start mindset nomological network. Second, within the globalization and consumer culture paradigm and across countries, we examine the relationship between the fresh start mindset and measures related to global consumer culture. Specifically based on links to liquid modernity, we posit that the fresh start mindset has a positive relationship with expressions of global consumer culture, including global identity, global citizenship through global brands, and consumer environmental consciousness (Steenkamp and de Jong 2010; Strizhakova and Coulter 2013; Strizhakova, Price, and Coulter 2008; Zhang and Khare 2009), and a negative relationship with consumer ethnocentrism as an expression of local consumer culture (Steenkamp and de Jong 2010). Third, we examine select psychographic variables linked to global consumer culture (i.e., travel abroad, social media use, religion) as predictors of the fresh start mindset. Finally, we evaluate the fresh start mindset as a predictor of several brand-related outcomes, such as attitudes toward global brands, choices of global (over local) brands in a traditional local category of food, and involvement with global/glocal consumer culture.

Method

In exploring the fresh start mindset within the broader global arena, we included the U.S. as a "baseline" country. We chose Mexico and Russia as countries for investigation because they are linked to the U.S. as trade partners and provide variance on cultural traditions. As related to U.S. trade partners, Mexico ranked second ($235.7 million), China ranked third ($116 million), and Russia ranked twenty-fourth ($16.4 million) ("Top U.S. Trade Partners" 2016). Countries from the emerging markets have emerging global consumer cultures (Zhao and Belk 2004), and are marked by stronger cultural traditions grounded in family, collectivistic values (in contrast to the U.S.), as well as varying strnegth of their religious traditions. Christianity, however, is the dominant religious across all three countries. The U.S., often seen as the "land of opportunity," reports immigrants (1990 to 2014) from Mexico (11.7 million), China (2.5 million) and Russia (.5 million) (Zeigler and Camarota 2016).

We collected data using an online survey with Qualtrics panels in the U.S. (n = 300, M_{age} = 33), Mexico (n = 305, M_{age} = 31) and Russia (n = 310, M_{age} = 32); gender was evenly split in each country. Included in the survey were established scales (all seven-point Likert items) measuring: the fresh start mindset (six items; Price et al. 2018), growth mindset (four items; Dweck 2006), optimism (four items; Scheier, Carver, and Bridges 1994), future focus (four items; Shipp, Edwards, and Lambert 2009), desire for a fresh start (three items, Price et al. 2018), self-perceptions of being capable to get a fresh start (three items, Price et al. 2018), global identity (seven items; Strizhakova and Coulter 2013), global citizenship through global brands (three items; Strizhakova, Coulter, and Price 2008), environmental consciousness (seven items; Haws, Winterich, and Naylor 2014), and consumer ethnocentrism (four items, Shimp and Sharma 1987). Participants responded to questions assessing travel aboard ("Within the past two years, how many times have you traveled outside of [country]?", social media usage ("Please indicate your level of activity with social media, e.g., Facebook, Twitter, Instagram and other sites" 1= not at all active/ 7 = very active), and religion ("which of the following describes your religious affiliation? Christian, Islam, Buddhism, Judaism, Hinduism, Nonreligious/secular).

In relation to our dependent variables, we selected four global shampoo brands with high market shares across the four markets (Euromonitor GMID database: Pantene, L'Oreal, Schwarzkopff, Head & Shoulders) and measured consumer attitudes toward these brands on a seven-point scale (1 = dislike very much, 7 = like very much). We also asked consumers to imagine shopping for yogurt, chocolates, and soda and asked them to make a choice among three brands; two global brands – one U.S.-based and one non-U.S.-based – with the largest market shares across the four countries (Yogurt: Yoplait, Dannon; chocolates: Hershey's, Ferrero; soda: Coca Cola, Mirinda) and the national brand with the largest market share in the country (Euromonitor GMID database). As a measure of consumer involvement with glocal consumer culture, participants responded to Steenkamp and de Jong's (2010) brand involvement; for analyses, we merged responses that chose brand involvement with global, glocal, and national culture and contrasted them with those who expressed no brand involvement (averaged 15%-16% across countries).

Results

First, we examined FSM across countries. The model fit (CFA, AMOS 24) is acceptable (χ^2/df = 3.35, CFI = .98, TLI = .96, RMSEA < .05), and the scale achieved partial metric and scalar invariance (Steenkamp and Baumgartner 1998). Cronbach's α for FSM for each county ranges from .89 in Mexico to .93 in the U.S. Our cross-national comparison indicates that the mean for FSM is stronger in Mexico (M = 5.29, z-tests < .001), than in Russia (M = 4.75), and the U.S. (M = 4.60). There is no significant difference in FSM between Russia and the U.S. Our results indicate that a good fitting model of FSM and variables in the nomological network (χ^2/df = 1.76, CFI = .94, TLI = .94, RMSEA < .03), and consistent with Price et al. (2018), FSM has strong positive relationships with the growth mind-

set, optimism, future focus, desire for a fresh start and perceptions of being capable of a fresh start in all four countries (see table). Desire for a fresh start was lowest in the U.S. and highest in Mexico.

Second, consistent with our expectations, FSM is positively (significantly) related to global identity, global citizenship through global brands, and environmental consciousness in all countries. In contrast to our expectation, FSM has no significant relationship with consumer ethnocentrism (see table).

Third, using regression analyses, we explored the extent to which select psychographic variables predict FSM. As expected, consistent across countries, social media use is a significant positive predictor of FSM (β =.14 (U.S), p < .05; β =.21 (Russia), p < .00; β =.25 (Mexico), p < .001). Consistent with Price et al. (2018), Christian beliefs (Mexico: β = .17, p < .01; Russia: β =.16, p < .01; U.S.: β =.17, p < .01) is a significant positive predictor of FSM. Travel abroad was a significant predictor in Mexico (.13, p < .05) and marginally significant in Russia (.10, p < .09) but not a significant predictor in the U.S. (p > .10).

In relation to predictive validity of FSM in related to brand-related outcomes (see table), across countries FSM is a significant positive predictor of consumers' more positive attitudes toward global brands across all countries. FSM is also a significant positive predictor of consumer involvement with global/glocal consumer culture through brands and global brand choices of food products in the U.S. and Russia; its effects on involvement and global brand choices are positive but marginally (p < .08) significant in Mexico.

Discussion

Our research makes significant contributions to emerging research on transformative consumer research in the global arena. We support Price et al.'s (2018) proposition that the fresh start mindset is linked to global consumer culture, globalization and liquid modernity. Consumers appear to embrace this believe in markets that do not have traditional neoliberal Western roots. We further validate the fresh start mindset scale across two emerging markets – Mexico and Russia – with varying level of economic development, religious beliefs, socio-historical-cultural traditions. The fresh start mindset scale is reliable across markets and exhibits partial metric and scale invariance, which allows to compare it across consumers in these markets. Specifically, we observed consumers in Mexico exhibiting the highest and significantly different levels of the fresh start mindset versus consumers in other countries. Our findings support relationships of the fresh start mindset with other variables in its immediate nomological network – growth mindset, optimism, future temporal focus, desire for a fresh start and being capable of a fresh start. Interestingly, relationships between the fresh start mindset and desire for a fresh start was stronger in our emerging markets than the U.S. Importantly, we have positioned understanding of the fresh start mindset within the global consumer culture and its relevant constructs. Indeed, the fresh start mindset has significant positive relationships with other variables linked to global consumer culture, such as global identity, global citizenship through global brands and environmental consciousness (Steenkamp and de Jong 2010; Strizhakova and Coulter 2013). Effects between the fresh start mindset and consumer ethnocentrism were non-significant in our countries. Hence, the fresh start mindset is an additional belief that is shared among consumers who identify with global consumer culture, globalization processes and environmentalism.

Consistent with other global consumer culture predictions, consumers with a stronger fresh start mindset exhibit greater involvement with global/glocal branding culture, more positive global brand attitudes and higher rate of global brand choices. Further, consumers

with a stronger fresh start mindset are also more likely to use social media. Interestingly, similar to Price et al., religion (vs. none) was a significant positive predictor of the fresh start mindset. Hence, both global consumer culture and a more traditional Christian doctrine are likely to contribute to development of consumers' fresh start mindset worldwide.

Our research furthers our understanding the fresh start mindset from the global consumer culture perspective, and points to additional opportunities for investigation. Future research should examine effectiveness of the fresh start mindset and fresh start messaging in encouraging transformative choices in various markets. Examination of the fresh start mindset in relation to other global culture constructs, such as materialism, social responsibility and ethics, entrepreneurship and other global values offers promising opportunities for enriching both transformative consumer research and globalization theories. Our predictive network primarily focused on global culture constructs, but future research might further investigate relationships between the fresh start mindset and other localization-based beliefs, including, for example, fate, class structures, and nostalgia.

REFERENCES

Bauman, Zygmunt (2001), *The Individualized Society,* Cambridge: Polity.

Dweck, Carol S. (2006), *Mindset: The New Psychology of Success*, New York, NY: Ballantine Books.

Haws, Kelly L., Karen Page Winterich, and Rebecca Walker Naylor (2014), "Seeing the World through GREEN-tinted Glasses: Green Consumption Values and Responses to Environmentally Friendly Products," *Journal of Consumer Psychology*, 24 (3), 336-354.

Price, Linda, L., Robin A. Coulter, Yuliya Strizhakova, and Ainslie E. Schultz (2018), "The Fresh Start Mindset: Transforming Consumers' Lives," *Journal of Consumer Research*, 45 (1), 21–48.

Scheier, Michael F., Charles S. Carver, and Michael W. Bridges (1994), "Distinguishing Optimism from Neuroticism (and Trait Anxiety, Self-mastery, and Self-esteem): A Reevaluation of the Life Orientation Test," *Journal of Personality and Social Psychology*, 67 (6), 1063–78.

Steenkamp, Jan-Benedict E.M and Martijn G. de Jong (2010), "A Global Investigation into the Constellation of Consumer Attitudes toward Global and Local Products," *Journal of Marketing*, 74 (6), 18–40.

Shimp, Terence A. and Subhash Sharma (1987), "Consumer Ethnocentrism: Construction and Validation of the CETSCALE," *Journal of Marketing Research*, 24 (3), 280–9.

Shipp, Abbie J., Jeffrey R. Edwards, and Lisa S. Lambert (2009), "Conceptualization and Measurement of Temporal Focus: The Subjective Experience of the Past, Present, and Future," *Organizational Behavior and Human Decision Processes*, 110 (1), 1–22.

Strizhakova, Yuliya and Robin A. Coulter (2019), "Consumer Cultural Identity: Local and Global Cultural Identities and Measurement Implications," *International Marketing Review*, 36 (5), 610–627.

Strizhakova, Yuliya and Robin A. Coulter (2019), "Spatial Distance Construal Perspectives on Cause-Related Marketing: The Importance of Nationalism in Russia," *Journal of International Marketing*, 27(1), 38–55.

Strizhakova, Yuliya and Robin A. Coulter (2013), "The "Green" Side of Materialism in Emerging BRIC and Developed Markets: The Moderating Role of Global Cultural Identity," *International Journal of Research in Marketing*, 30 (1), 69–82.

Strizhakova, Yuliya, Robin A. Coulter, and Linda L. Price (2008), "Branded Products as a Passport to Global Citizenship: Perspectives from Developed and Developing Countries," *Journal of International Marketing*, 16 (December), 57–85.

"Top U.S. Trade Partners" (2016), http://trade.gov/mas/ian/ build/groups/public/@tg_ian/ documents/webcontent/tg_ ian_003364.pdf.

Zeigler, Karen and Steven A. Camarota (2016), "Immigrants in the United States," http://cis.org/Immigrants-in-the-United-States?gclid=CjwKEAiAjcDBBRCJxo uz9fWHynwSJADaJg9Bm9NuQsfkq8O7FH93A_ xDJcRSDFDaTPJz1EOpCkhFDBoC7Jbw_wcB.

Zeugner-Roth, Katharina Petra, P., Vesna Žabkar, and Adamantios Diamantopoulos (2015), "Consumer Ethnocentrism, National Identity, and Consumer Cosmopolitanism as Drivers of Consumer Behavior: A Social Identity Theory Perspective," Journal of International Marketing, 23 (2), 25 54.

Zhang, Yinlong and Adwait Khare (2009), "The Impact of Accessible Identities on the Evaluation of Global versus Local Products," Journal of Consumer Research, 36 (October), 524 37.

Zhao, Nan and Russell Belk (2004), "Chinese Consumer Readings of Global and Local Advertising Appeals," Journal of Advertising, 33 (3), 63 76

Looking Better by Making Others Look Worse: The Competitive Spillovers of Sustainability

Kristina Šubrtová, Wageningen University, The Netherlands
Ilona E. de Hooge, Wageningen University, The Netherlands
Ellen J. van Loo, Wageningen University, The Netherlands
Hans van Trijp, Wageningen University, The Netherlands

EXTENDED ABSTRACT

Despite the ubiquitous presence of spillover effects in consumers´ lives and their indisputable influence on consumers´ perceptions, attitudes, and choices (e.g., Votola & Unnava 2006; Ahluwalia & Gurhan-Canli 2000; Cleeren, Van Heerde & Dekimpe 2013), research on the impact of spillover effects on competing brands is scarce. The product-harm crisis literature reveals that spillover effects may also occur between directly competing brands. Yet, the product-harm crisis spillovers concern the effects of extremely negative information about one brand. This makes is difficult, if not impossible, to generalize these findings to daily situations where consumers perceive products in a product assortment (e.g., in a supermarket). Although, a few studies examine the external sources of spillover effects, such as advertising of a brand (Sahni 2016; Janakiraman, Meyer & Morales 2006; Heilman, Nakamoto & Rao 2009) to competitors, these findings also do not translate to daily in-store situations.

The present research proposes that direct exposure to product attributes at an in-store comparison of products in a product assortment may already generate competitive spillover effects (see figure 1). Anagnostou, Ingenbeek & van Trijp (2015) find that the introduction of a new sustainable brand decreases perceptions of a brand which consumers regularly buy. Inspired by these findings, we suggest that the introduction of a new attribute (sustainability) by one product (e.g., with information on the packaging) decreases consumers attitudes towards brands competing in the same product category. Current understanding of the impact of spillover effects on consumers´ attitudes and choices rather follows the traditional attitude theorist approaching attitudes as self-reported cognitive processes (Ajzen & Fishben 1977). Following this logic, attitude should translate into a decrease in consumers´ actual choices for these competitors. However, dual-process theories suggest that there are two distinct mental processes underlying consumers attitudes; rational and intuitive (e.g., Epstein 1994; Fazio 1990; Kahneman 2003). Some even posit that most of real-life decision-making is dominated by automatic processes (Lindsey & Jacoby 1994; Kahneman 2011). Therefore, we propose that the spillover effect from the introduction of a new attribute on competing products has an underling intuitive mechanism. More specifically, we argue that when consumers notice the new attribute on one product, they will engage in a verification search to examine how competing brands perform on this new product attribute. As competing brands will not convey information about their performance concerning the new product attribute, consumers will subsequently draw negative inferences about the competing brands, thereby negatively affecting both attitude formation and product choice for competing brands.

In two eye-tracking studies, we demonstrate that the introduction of a new attribute (sustainability) by one product indeed negatively spills over to consumers´ choices for competing products, and we uncover the underlying cognitive and intuitive mechanism. The objective of the two future studies (study 3 and study 4) is to test alternative explanations for our core effects.

Study 1 (n=170) examined our basic premise combining eye-tracking with self-reported measures and explores the moderating role of price. We tested our predictions in a between-subject de-sign, in the context of one product category (pasta). Main dependent variables were choice, attention (in terms of fixation durations and fixation counts), and attitudes. Participants were randomly allocated to an assortment of eight products, with target product having an organic label, sold at regular price (Label-regular price), or having an organic label, sold at premium price, or having no label (Label-premium price), sold at regular price (control condition). Participants were first asked to choose one product from the assortment while their eye movements were recorded. Then, they evaluated target product next to one competing product. Consistent with our predictions, study 1 finds that the information about the new attribute increases visual attention towards competitors, decreases attitudes towards competitors, and decreases choice likelihood for competitors in the same product category. This effect weakens when the new attribute is introduced at the premium price (vs regular price).

The aim of study 2 (n=225) was to seek further evidence for the effect of the introduction of a new sustainability attribute to attention and choices for competing products and to extend findings from study 1 to more product categories. Due to a large variance in attention between individuals, the presence (vs absence) of the organic label was manipulated within-subjects. The evidence for the effect of introduction of the label on attention and choices for competing products in study 1 was limited to a relatively small sample, as only 37% in Label-regular price, and 36% in Label-premium price condition noticed the cue. To ensure enough data of consumers who processed the information about new attribute, the salience of this information was increased by adding a priming task, and by reducing the number of available products to six alternatives per product category. Results of study 2 replicated the findings from study 1 that noticing the information about the new attribute information increases visual search for competing products and decreases the choice likelihood for these competitors across six food product categories.

The present research makes essential contributions to the research on spillover effects, and generates practical knowledge for marketers, packaging designers, and new product developers. First, we identify a new source of competitive spillover effects that has not been considered before. An introduction of a new product attribute through product cues of may already affect attitudes and choices for competing products. This opens a new area of possible causes of spillover effects for future research. Second, we demonstrate new insights into the mental processes underlying spillover effects. It appears that competitive spillover effects on choice are mediated by attention. Thereby we show that the mechanism behind the spillover effects can operate in more autonomous manners, providing a new perspective to the research on spillovers in general. This perspective is especially important in times when limiting our understanding of constructs in consumer research to conscious processes is increasingly criticized and calls for more research beyond cognition are made (e.g. Williams & Poehlman 2016; Dijksterhuis, Knippenberg, Holland & Harm Veling 2014; Evans 2014).

REFERENCES

Ahluwalia, R., & Gürhan-Canli, Z. (2000). The effects of extensions on the family brand name: An accessibility-diagnosticity perspective. Journal of Consumer Research, 27(3), 371-381.

Ajzen, I., & Fishbein, M. (1977). Attitude-behavior relations: A theoretical analysis and review of empirical research. Psychological bulletin, 84(5), 888-918.

Anagnostou, A., Ingenbleek, P. T., & van Trijp, H. C. (2015). Sustainability labelling as a challenge to legitimacy: spillover effects of organic Fairtrade coffee on consumer perceptions of mainstream products and retailers. Journal of Consumer Marketing, 32(6), 422-431.

Cleeren, K., van Heerde, H. J., & Dekimpe, M. G. (2013). Rising from the ashes: How brands and categories can overcome product-harm crises. Journal of Marketing, 77(2), 58-77.

Dijksterhuis, Ap, Ad van Knippenberg, Rob W. Holland, and Harm Veling (2014), "Newell and Shanks' Approach to Psychology Is a Dead End," Behavioral and Brain Sciences, 37, 25–26.

Epstein, S. (1994). Integration of the cognitive and the psychodynamic unconscious. American psychologist, 49(8), 709-724.

Evans, Jonathan St. B. T. (2014), "The Presumption of Consciousness," Behavioral and Brain Sciences, 37, 26–27.

Fazio, R. H. (1990). Multiple processes by which attitudes guide behavior: The MODE model as an integrative framework. Advances in experimental social psychology, 23, 75-109.

Heilman, C. M., Nakamoto, K., & Rao, A. G. (2002). Pleasant surprises: Consumer response to unexpected in-store coupons. Journal of Marketing Research, 39(2), 242-252.

Janakiraman, N., Meyer, R. J., & Morales, A. C. (2006). Spillover effects: How consumers respond to unexpected changes in price and quality. Journal of Consumer Research, 33(3), 361-369

Kahneman, D. (2011). Thinking, fast and slow. Macmillan.

Lindsay, D. S., & Jacoby, L. L. (1994). Stroop process dissociations: The relationship between facilitation and interference. Journal of Experimental Psychology: Human Perception and Performance, 20(2), 219-234.

Sahni, N. S. (2016). Advertising spillovers: Evidence from online field experiments and implications for returns on advertising. Journal of Marketing Research, 53(4), 459-478.

Votola, N. L., & Unnava, H. R. (2006). Spillover of negative information on brand alliances. Journal of Consumer Psychology, 16(2), 196-202.

Williams, L. E., & Poehlman, T. A. (2016). Conceptualizing consciousness in consumer research. Journal of Consumer Research, 44(2), 231-251.

Ask Formally: The Role of Formality on Charitable Giving

Aparna Sundar, University of Washington, USA
Edita Cao, University of Washington, USA
Bruce E. Pfeiffer, University of New Hampshire, USA

EXTENDED ABSTRACT

Advertising uses language in its messaging, which includes both content and style (Norton, 1978; Schindler & Bickart, 2012). In charitable advertising, the content of such messages remains relatively constant, generally consisting of information about the charity and a request of readers to donate. What can change about the message is the style. Style in language is that aspect of communication that is intended to state information with varied expression (Labov, 1972). Formal style includes word choice and structure that adheres carefully to standard grammatical form. Informal (or colloquial) style, on the other hand, includes characteristics that follow everyday conversational norms which differ based on social context (Grice, 1975; Heylighen & Dawaele, 1999). Given that people use different styles to communicate dependent on context (Joos, 1961), we expect that formality would not be received in the same way in every context. One aspect of social context which makes language style so critical is the social distance between individuals. This is because the information inherent in the style adopted by the communicator helps the audience infer meaning (Halliday, 1985; Poynton, 1985).

The purpose of a charitable ask is a sincere request to help others in need. Therefore, we would expect that when formal language is used, communication would focus on the core, informational content. This, we contend, would be more persuasive than colloquial language because it is more precise. We further posit that such a tactic would be contingent on the audience or the social context of communication. When individuals share contextual knowledge (i.e. when communicating to friends or family), they tend to use colloquial language (Grice, 1975; Heylighen & Dawaele, 1999). This is because such language can reinforce social closeness (Fitzsimons & Kay, 2004). However, when individuals share less contextual knowledge (i.e., when communicating to distant acquaintances or strangers), formal language is preferred (Joos, 1961). In two experiments, we provide evidence that the effectiveness of formality on donations depends on social distance. We operationalize formality by adapting real-world charitable appeals for wildfires (Study 1) and heart disease (Study 2) and show that formality is differentially persuasive based on the social distance of who prompts the charitable ask (Study 2).

Study 1 examined the differential effect of formal vs. colloquial language on willingness to donate. Participants ($N = 57$) completed a 2 (appeal language: formal vs. colloquial) between-subjects experiment. They were asked to evaluate a charitable appeal written in either a formal or colloquial language style. After viewing the appeals, participants indicated their charitable support (Greitemeyer & Sagioglou, 2018) and willingness to donate (in US dollars; Strahilevitz & Myers, 1998). A manipulation check indicated that the language style manipulation worked as intended ($p < .001$). As hypothesized, participants were more likely to demonstrate support for the charity when presented with the formal (vs. colloquial) appeal ($p < .05$). Participants also indicated a marginally greater willingness to donate when they viewed the formal appeal rather than the colloquial appeal ($p = .07$).

This study provides initial evidence that formality of appeal language increases participants' willingness to give to a charitable cause. In the next study, we investigate the role of social distance in how it could moderate the effect of language on intention to donate.

How formality is received is based on social context (Grice, 1975). Formality is a strategy used to maintain social distance (Levin, Giles, & Garrett, 1994). We therefore expect that a variation in language would influence donation intent based on the social context in which the donation is introduced.

Study 2 examined the role of social distance as a moderator of the effect of language on donation intentions. Participants ($N = 320$) completed a 2 (appeal language: formal vs. colloquial) × 3 (social distance: self vs. close other vs. distant other) between-subjects experiment. They were told that they were reviewing a cause either because they were considering donation (self), one of their friends had asked them to review information on the cause (close other), or a person named Alex, a distant connection on their favorite social media site, had asked them to review information on the cause (distant other). Manipulation checks indicated that the formality and social distance manipulations worked as intended ($ps < .002$). As predicted, there was a significant interaction ($p < .01$). Specifically, participants were more willing to donate when presented with the formal (vs. colloquial) appeal in both the self and close other conditions ($ps < .01$). However, for the distant other (Alex) condition, formality of language style made no difference on willingness to donate ($p = .89$).

This study provides further evidence that formality of appeal language increased participants' willingness to give to a charitable cause. Importantly, this effect occurs in socially close contexts (i.e., when an individual or close other prompts donation considerations). Contrary to prior research that suggests consumers are less likely to donate in socially distant contexts (Small & Simonson, 2008), we find that both formal and colloquial appeals are persuasive when a charitable ask comes from an organization recommended by a distant other.

The results of two studies suggest that formal language in a charitable ad appeal is more effective than colloquial language, which varies based on the social distance of who prompted the individual to review the appeal. Study 1 demonstrated that individuals who read an appeal written in a formal (vs. colloquial) style were more willing to donate to the charitable cause. Study 2 found the social distance of who is asking the individual to consider donating moderates the effect, such that formal (vs. colloquial) language is only effective when the ask comes from an organization recommended by someone socially close (i.e., the self or a friend). Importantly, both formal and colloquial language are equally persuasive when the ask is prompted by a distant other. Our findings provide an initial understanding of the role of formality in charitable appeals, but there is much space for future research. The first avenue is to investigate the underlying process for the effect of formality on donations.

REFERENCES

Fitzsimons, G. M. & Kay, A. C. (2004). Language and interpersonal cognition: causal effects of variations in pronoun usage on perceptions of closeness. *Personality and Social Psychology Bulletin*, *30*(5), 547–557.

Greitemeyer, T. & Sagioglou, C. (2018). When positive ends tarnish the means: the morality of nonprofit more than of for-profit organizations is tainted by the use of compliance techniques. *Journal of Experimental Social Psychology*, *76*, 67–75.

Grice, H. P. (1975). Logic and conversation. In P. Cole and J. L. Morgan (Eds.), *Syntax and Semantics* (pp. 41–58), New York: Academic Press.

Halliday, M. A. K. (1985). *Spoken and written language*. Oxford: Oxford University Press.

Heylighen, F. & Dewaele, J.-M. (1999). Formality of language: definition, measurement and behavioral determinants. *Unpublished manuscript*, Free University of Brussels, Brussels, Belgium.

Joos, M. (1961). *The five clocks: a linguistic excursion into the five styles of English usage*. New York: Harcourt, Brace and World.

Labov, W. (1972), *Sociolinguistic patterns*. Philadelphia: University of Philadelphia Press.

Levin, H., Giles, H., & Garrett, P. (1994). The effects of lexical formality attributions and accent on trait. *Language & Communication*, *14*(3), 265–274.

Norton R.W. (1978). Foundation of a communicator style construct. *Human Communication Research*, *4*, 99–112.

Poynton, C. (1985). *Language and gender: making the difference*. Geelong, Victoria: Deakin University Press.

Schindler, R. M. & Bickart, B. (2012). Perceived helpfulness of online consumer reviews: the role of message content and style. *Journal of Consumer Behaviour*, *11*(3), 234–243.

Small, D. A. & Simonsohn, U. (2008), "Friends of victims: personal experience and prosocial behavior," *Journal of Consumer Research*, *35*(3), 532–542.

Strahilevitz, M. & Myers, J. G. (1998). Donations to charity as purchase incentives: how well they work may depend on what you are trying to sell. *Journal of Consumer Research*, *24*(4), 434–446.

Not All "Wins" Are Equal: The Effect of Unequally Attractive Prizes on Stimulus Appraisal

Arash Talebi, EDHEC Business School, France
Sonja Prokopec, ESSEC Business School, Singapore
Ayse Onculer, ESSEC Business School, France

EXTENDED ABSTRACT

As the proverb "to look a gift horse in the mouth," suggests, people might question the value of a gift. In a similar spirit, this research examines people's reaction toward the gains from *uncertain* promotions. Specifically, we investigate whether people question the value of the gained discount and transfer it to the promotional brand.

The perceived attractiveness of a risky outcome is dependent not only on the realized outcome, but also on other unattained but plausible outcomes, aka counterfactual comparison (McMullen, Markman, and Gavanski 1995). In certain situations, both upward and downward counterfactual comparisons are *simultaneously* plausible (e.g., a final gain of $10 when $5 and $20 gains were also plausible). Under these circumstances, i.e., when multiple reference points coexist, an outcome may be simultaneously perceived as a loss and a gain (Kahneman 1992). Note that two types of outcomes are plausible in uncertain promotions: the best outcome ("High win") and any other lower-magnitude outcome ("Low win"). We propose that the Low win recipients are likely to engage in simultaneous upward (versus High win) and downward (versus no-discount) counterfactual comparison; and hence, develop a concurrent gain and loss perception.

Simultaneous perception of gain and loss activates respectively positive and negative evaluative processes that engender attitude ambivalence (Larsen et al. 2004). Accordingly, we suggest an experience of attitude ambivalence in the recipients of the Low win.

Attitude ambivalence is a bothersome state (Cacioppo, Gardner, and Berntson 1997) that reduces the appraisal of the stimulus (Hong and Lee 2010; Williams and Aaker 2002). Therefore, we predict that an experience of attitude ambivalence in the recipients of a Low win results in a less favorable appraisal of the promotional brand.

Study 1 (a field study; N=59 Students), recruited research assistants (RAs) to sell lottery tickets on behalf of a fictitious casino ("El Royale") on the campus of a European school. Each lottery participant was randomly assigned to either the Low- (26 participants) or the High win (33 participants) condition. After participants received the prize, their Future Purchase Likelihood for El Royale's services was recorded (1-7 scale).

Study 2A (N=304 MTurkers) used a 4-group (Low-magnitude sure-discount vs. High-magnitude sure-discount vs. Low win vs. High win) between-subjects design and Chick-fil-A as the promotional brand. The participants of the sure-discount conditions received either a $2 or a $12 discount notice, respectively in the Low- and High-magnitude conditions. Participants of the uncertain conditions played a game to get either a Low- ($2) or a High-win ($12). Subsequently, all participants reported their Future Purchase Likelihood (slider bar: 0-100%).

Study 2B (N=106 Students) employed a 3-group (No discount vs. Low win frame vs. High win frame) between-subjects design where the offered discount magnitude in both Low and High win frame conditions was the same (€1.5) but framed against different counterfactuals to convey the discount as Low (€1.5 vs. €9) or High (€1.5 vs. 25¢). In addition, Study 2B included a no-discount baseline condition and used WIND, an e-scooter service, as the stimulus brand. The rest of the procedures paralleled those of Study 2A.

The results of the field study provide initial evidence for the main effect: receiving a Low win reduces consumers' stimulus ap-praisal. Studies 2A and 2B tested the effect in the controlled environment of the lab with including distinct control conditions. These studies replicated the main effect. Furthermore, Study 2A reveals that participants evaluated the brand less (more) favorably when they received a Low (High) *win* than when they received the same Low- (High-) magnitude of discount *directly*. This finding supports counterfactual comparison rather than discount magnitude in driving the results. Study 2B provides additional support for the role of counterfactual comparison in driving the results by holding the magnitude of the discounts constant between conditions. Further, Study 2B reveals that the unpleasantness of the Low win is so intense that it forces the Low win to underperform the zero-discount.

Studies 3A and 3B test the proposed mechanism through attitude ambivalence, as an affect-laden manifestation of counterfactual comparison, by direct measurement of the mediator. Study 3A (N=195 MTurkers) employed a 2-group (Low win vs. High win) between-subjects design. Respondents participated in the uncertain promotion campaign of CURB, a mobility service (Low win: $2 vs. High win: $10). After participants played the game, we measured their attitude ambivalence (Russel and Carroll's method, 1999) and Future Purchase Likelihood (slider bar: 0-100%).

Study 3B (N=246 MTurkers) was similar to Study 3A with the exception of counterbalancing the measurement order of the mediator and the dependent variable, employing different probabilities for the wins for robustness check, and using Pizza Hut as the stimulus brand.

Studies 3A and 3B replicated the main effect (i.e., the negative effect of the Low win on stimulus appraisal) and documented that attitude ambivalence mediates the effect of Promotion Outcome on Future Purchase Likelihood (Study 3A: indirect effect=-1.33, *SE*=.83, 95%CI=[-3.4245, -.1215]; Study 3B: indirect effect=-2.11, *SE*=.92, 95%CI=[-4.3150, -.7303]). Taken together, Studies 3A and 3B show that receiving a Low win elicits ambivalent feelings that negatively spill over into individuals' Future Purchase Likelihood of the target brand. In addition, Study 3B ruled out the role of measurement order in driving the results (Table 1).

This research investigates the effect of uncertain promotions on the promotional brand. We show that consumers who receive a Low outcome of an uncertain promotion engage in simultaneously comparing their attained outcome with the unattained outcomes. A comparison of the Low win with a no-discount situation induces positive emotions. However, a comparison with a High win results in negative emotions. Such a concurrent experience of emotions with opposite valences engenders attitude ambivalence. This bothersome state, in turn, reduces the brand evaluation.

This research contributes to the theory by documenting the role of attitude ambivalence (as a manifestation of simultaneous upward and downward counterfactual comparison) in determining appraisal of a promotional brand.

In sum, we suggest that marketers revisit the design of such promotions to ensure that consumer's perception of prizes is relatively uniform, preventing them from developing ambivalent feelings.

REFERENCES

Cacioppo, John T, Wendi L Gardner, and Gary G Berntson (1997), "Beyond Bipolar Conceptualizations and Measures: The Case of Attitudes and Evaluative Space," *Personality and Social Psychology Review*, 1 (1), 3-25.

Hong, Jiewen and Angela Y Lee (2010), "Feeling Mixed but Not Torn: The Moderating Role of Construal Level in Mixed Emotions Appeals," *Journal of Consumer Research*, 37 (3), 456-72.

Kahneman, Daniel (1992), "Reference Points, Anchors, Norms, and Mixed Feelings," *Organizational Behavior and Human Decision Processes*, 51 (2), 296-312.

Larsen, Jeff T, A Peter McGraw, Barbara A Mellers, and John T Cacioppo (2004), "The Agony of Victory and Thrill of Defeat: Mixed Emotional Reactions to Disappointing Wins and Relieving Losses," *Psychological science*, 15 (5), 325-30.

McMullen, Matthew N, Keith D Markman, and Igor Gavanski (1995), "Living in Neither the Best nor Worst of All Possible Worlds: Antecedents and Consequences of Upward and Downward Counterfactual Thinking," *What might have been: The social psychology of counterfactual thinking*, 133-67.

Russell, James A. and James M. Carroll (1999), "On the Bipolarity of Positive and Negative Affect," *Psychological bulletin*, 125 (1), 3-30.

Williams, Patti and Jennifer L Aaker (2002), "Can Mixed Emotions Peacefully Coexist?," *Journal of Consumer Research*, 28 (4), 636-49.

The Unresolved Uncertainty Effect: Do Brands Gain or Lose Stars When Consumers Have to Wait For Resolution of Brand-led Uncertainty?

Arash Talebi, EDHEC Business School, France
Sonja Prokopec, ESSEC Business School, Singapore
Ayse Onculer, ESSEC Business School, France

EXTENDED ABSTRACT

From the simplest decisions ("to get a Pepsi or a Coke with my meal"!) to the most complicated decisions ("to marry Emma or Louise!") are made in the presence of uncertainty. People generally express an inherent distaste for uncertainty (Tversky and Shafir 1992).

However, uncertainty associated with positive prospects may elicit, and prolong, positive feelings (Lee and Qiu 2009) because people could derive utility from savoring the expectation of the prospects (Loewenstein 1987).

Considering both views, how do people react toward a brand that led to an uncertain event? We investigate this question in the context of uncertain promotions.

Prior research has documented the benefits of uncertainty in a variety of domains: consumers' well-being (Clore and Colcombe 2003), romantic infatuations (Pennebaker 1997), and motivation (Shen, Fishbach, and Hsee 2014). We posit that the utility associated with the waiting period of uncertain promotions may induce positive emotions, specifically excitement, because excitement is an uncertainty-associated emotion in positive contexts (Lee and Andrade 2015). Highly intensified emotions (e.g., excitement) exert a strong impact on behavior (Loewenstein and Lerner 2003). Therefore, we expect the uncertainty-generated excitement to affect individuals' stimulus appraisal positively.

Note that two types of outcomes are plausible in uncertain promotions: the best outcome ("High win") and any other lower-magnitude outcome ("Low win"). People generally believe that larger prospects are less likely to happen than smaller outcomes (Pleskac and Hertwig 2014). This uniqueness is a driver of arousal (Ku, Malhotra, and Murnighan 2005), and hence, excitement. Therefore, we propose:

Hypothesis 1: *When people await the resolution of uncertainty or when they receive an immediate High win, they are more likely to evaluate the uncertainty-associated stimulus more favorably than when they receive an immediate Low outcome.*

Hypothesis 2: *The more favorable evaluations described in H1 is driven by heightened excitement of people during the waiting period or when they receive the immediate High win.*

Study 1 (N=214 MTurkers) employed a 3-group (Low vs. High win vs. Unresolved Uncertainty) between-subjects design. Participants played the promotional gamble of AppyFizz. Participants in the Low/High win conditions received the outcome immediately and indicated their Future Purchase Likelihood. Participants of the Unresolved Uncertainty condition went through the same procedure except that they filled the dependent variable measure before knowing the outcome.

Study 2 (N=113 Student) paralleled the design of study 1 with two changes: (1) The stimulus brand changed (CRAX), (2) The probabilities of Low/High win changed for robustness check.

Study 3 (N=405 MTurkers) was a conceptual replication of the previous studies with a familiar brand (Domino's). This study also ruled out several alternative accounts and collected a behavioral dependent variable: sharing personal email ID.

Studies 1-3 consistently found a positive effect of the waiting period (and the High win) on the brand evaluation (H1 supported; $F_{(2,211)}=5.20$, $p<.01$ Study 1; $F_{(2,110)}=4.88$, $p<.01$ Study 2; and $F_{(2,402)}=2.57$, $p<.08$ Study 3). In addition, mediation analysis in Studies 2 and 3 showed that excitement mediates the effect. Furthermore, Study 3 replicated the main effect and the mediation model with the behavioral dependent variables and ruled out the role of arousal and "feeling smart" in explaining the results (Table 1).

We also predict that the recipients of the Low win and those who wait for resolution of uncertainty experience mixed emotions because while on the one hand, people may detest receiving a low win or experiencing uncertainty (Gneezy, List, and Wu 2006); on the other hand, they may gain some positive feelings due to a gain or because of savoring the expectation of the prospects (Loewenstein and Elster 1992).

If not handled, mixed emotions make people experience discomfort, which in turn results in a less favorable stimulus appraisal (Williams and Aaker 2002). Nonetheless, people's ability in handling mixed emotions varies as a function of their construal level (Trope and Liberman 2000). Specifically, individuals with high-level construals handle their mixed emotions better than those with low-level construals (Hong and Lee 2010). Therefore, we propose:

Hypothesis 3: *Compared to those who gain a High win immediately, those who await the resolution of uncertainty and those who receive a Low win immediately may experience psychological discomfort, that in turn, negatively affects their stimulus evaluation. This mediating path happens only for individuals with low-level construals.*

On a related note, people's experience of happiness may also vary as a function of their construal level. Specifically, excitement, as one type of happiness, is a high-level construal emotion (Mogilner, Aaker, and Kamvar 2011). Thus:

Hypothesis 4: *The mediation path through excitement, H2, happens for individuals with high-level construals.*

Study 4 (N=305 MTurkers) used a 3 (Low vs. High win vs. Unresolved Uncertainty) × Construal level (measured) between-subjects design. Respondents participated in Uber's promotional game. Low/High win conditions saw the outcome immediately. Then, we measured their mixed emotions (Russel and Carroll's method, 1999), discomfort (Williams and Aaker 2002), excitement, Future Purchase Likelihood, and construal level (Vallacher and Wegner 1989). Participants of the Unresolved Uncertainty condition went through the same procedure except that the measures were collected from them before knowing the outcome.

The results show that only at high-level construals, the indirect effect through excitement was significant. For concrete mindset individuals, the indirect effect through psychological discomfort was significant. Further analysis demonstrated that the experience of mixed

emotions per se does not drive the results. Instead, a failure in handling mixed emotions (psychological discomfort) drives the results.

In this paper, we propose the unresolved uncertainty effect that suggests a *net* positive effect of the waiting period on consumers' appraisal of the stimulus. We find that individuals with high-level construals experience heightened excitement during the waiting period. Excitement, in turn, affects their evaluation of the uncertainty-associated stimulus positively. Those with low-level construals fail to handle their mixed emotions. This failure results in psychological discomfort and spills over into their stimulus appraisal negatively.

This research contributes to the theory by showing that people form an evaluation of the stimulus that created an uncertain event and by detailing how people feel during the period they live with the uncertainty: excited and/or uncomfortable depending on their construal level.

REFERENCES

Clore, Gerald L and Stanley Colcombe (2003), "The Parallel Worlds of Affective Concepts and Feelings," *The psychology of evaluation: Affective processes in cognition and emotion*, 335-69.

Gneezy, Uri, John A List, and George Wu (2006), "The Uncertainty Effect: When a Risky Prospect Is Valued Less Than Its Worst Possible Outcome," *The Quarterly Journal of Economics*, 121 (4), 1283-309.

Hong, Jiewen and Angela Y Lee (2010), "Feeling Mixed but Not Torn: The Moderating Role of Construal Level in Mixed Emotions Appeals," *Journal of Consumer Research*, 37 (3), 456-72.

Ku, Gillian, Deepak Malhotra, and J Keith Murnighan (2005), "Towards a Competitive Arousal Model of Decision-Making: A Study of Auction Fever in Live and Internet Auctions," *Organizational Behavior and Human Decision Processes*, 96 (2), 89-103.

Lee, Chan Jean and Eduardo B Andrade (2015), "Fear, Excitement, and Financial Risk-Taking," *Cognition and Emotion*, 29 (1), 178-87.

Lee, Yih Hwai and Cheng Qiu (2009), "When Uncertainty Brings Pleasure: The Role of Prospect Imageability and Mental Imagery," *Journal of Consumer Research*, 36 (4), 624-33.

Loewenstein, George (1987), "Anticipation and the Valuation of Delayed Consumption," *The Economic Journal*, 97 (387), 666-84.

Loewenstein, George and Jon Elster (1992), "Utility from Memory and Anticipation," *Choice over time*, 213-34.

Loewenstein, George and Jennifer S Lerner (2003), "The Role of Affect in Decision Making," *Handbook of affective science*, 619 (642), 3.

Mogilner, Cassie, Jennifer Aaker, and Sepandar D Kamvar (2011), "How Happiness Affects Choice," *Journal of Consumer Research*, 39 (2), 429-43.

Pennebaker, James W (1997), *Opening Up: The Healing Power of Expressing Emotions*: Guilford Press.

Pleskac, Timothy J and Ralph Hertwig (2014), "Ecologically Rational Choice and the Structure of the Environment," *Journal of Experimental Psychology: General*, 143 (5), 2000.

Russell, James A. and James M. Carroll (1999), "On the Bipolarity of Positive and Negative Affect," *Psychological bulletin*, 125 (1), 3-30.

Shen, Luxi, Ayelet Fishbach, and Christopher K Hsee (2014), "The Motivating-Uncertainty Effect: Uncertainty Increases Resource Investment in the Process of Reward Pursuit," *Journal of Consumer Research*, 41 (5), 1301-15.

Trope, Yaacov and Nira Liberman (2000), "Temporal Construal and Time-Dependent Changes in Preference," *Journal of personality and social psychology*, 79 (6), 876.

Tversky, Amos and Eldar Shafir (1992), "The Disjunction Effect in Choice under Uncertainty," *Psychological science*, 3 (5), 305-10.

Vallacher, Robin R. and Daniel M. Wegner (1989), "Levels of Personal Agency: Individual Variation in Action Identification," *Journal of personality and social psychology*, 57 (4), 660-71.

Williams, Patti and Jennifer L Aaker (2002), "Can Mixed Emotions Peacefully Coexist?," *Journal of Consumer Research*, 28 (4), 636-49.

Circular Disposal Increases the Value of Products More Than Linear Disposal

Anna Tari, Boston University, USA
Remi Trudel, Boston University, USA

EXTENDED ABSTRACT

A viable alternative to a linear economy (i.e., where we take resources, produce, consume and ultimately waste), is a circular economy. A circular economy is a "closed loop" model where systems are designed so that products flow back into the cycle after use (i.e., through recycling, donating, and reselling) to minimize waste generation (Stahel 2016). A circular strategy presents a fundamental shift in thinking for firms and consumers, where consumers are required to think of disposal at acquisition and be active in "closing the loop". We suggest that considering disposal at point of purchase will influence consumers' valuation of products. We report four experiments demonstrating that a higher value is ascribed to products that will be disposed of through a circular means (i.e. recycling, donating, reselling) in comparison to a linear means (i.e. trashing).

Prior literature shows that people are strongly averse to creating waste (Arkes 1996; Donnelly, Lamberton, Reczek and Norton 2017; Trudel and Argo 2013; Winterich, Reczek and Irwin 2017) and that not being wasteful can also evoke positive self-conscious emotions (e.g. feelings of pride) (Sun and Trudel, 2017). We know that people may experience negative self-conscious emotions (e.g. guilt, shame, and embarrassment; Lewis 1997; Tracy and Robins 2004) when they purchase products that are not fully utilized (Bolton and Alba 2012). In particular, Arkes (1996) found that participants expressed negative emotion when paying for products that were not fully utilized (e.g. only using two of a three-pack). In line with these results, we propose that consumers will feel more pride in making a circular disposal decision and in turn less guilt in spending resources because they avoid being wasteful and are able to more fully utilize a product that is disposed through circular (recycle, donate or resell) vs. linear means (trash).

Studies 1A-1E *(N*=1,955) showed preliminary evidence of the main phenomenon. Participants read a scenario that contained information about a product they were about to purchase. In a 4-cell between-subject design, participants read information about how they thought they were going to dispose of the product when they no longer needed it, thinking they were either going to dispose it through a circular (i.e., recycle, donate, resell) or a linear means (i.e., trash). Participants stated their willingness to pay for the product. Across all studies, participants were willing to pay more for the product when they were going to dispose it of through circular vs. linear means (all ps < .05). This effect was robust across domains (i.e., table, sofa, jacket, hoodie) and in an incentive compatible experiment.

Study 2 (*N*=426) sought to provide further evidence of the hypothesized effect of anticipated disposal behavior on product valuation, and used an analysis of mediation to examine the role of pride in disposal and guilt in spending resources as the sequential path revealing the underlying psychological mechanism. The study design replicated that of studies 1A-1E. After participants gave their willingness to pay for the product, they rated how proud they felt about disposing the product and how guilty they felt about spending resources in the product. As predicted, circular disposal led to higher pride in disposal, which made participants feel less guilty about spending resources and be more willing to pay for products they thought they were going to dispose through circular vs. linear means ($\beta_{recycle}$ = 9.53, SE = 3.07, 95% CI = [4.32; 16.28]; (β_{donate} = 11.69, SE = 3.69, 95% CI = [5.39; 19.68]; β_{resell} = 9.29, SE = 2.98, 95% CI = [4.23; 15.86]). The next two studies sought to corroborate the mediating role of pride in disposal and guilt in spending through moderated mediation.

Study 3 (*N*=588) sought to provide further evidence for the role of pride in disposal in driving guilt in spending and therefore product valuation. We reasoned that, if pride in disposal drives product valuation, such effect should be eliminated when consumers' disposal decision is attributed to external circumstances that the consumer had to comply with rather than to the individual's goodwill. As predicted, results of the internal condition (i.e., when the disposal decision was attributed to the individual) replicated study 1A-1E, but product valuation was similar across disposal conditions in the external condition (i.e., when disposal means was determined by government regulations).

Study 4 (*N*=545) examined the role of guilt in spending as psychological mechanism underlying product valuation. We reasoned that guilt in spending should decrease when an individual has financial incentives to dispose the product in a certain way, such as receiving a government rebate for disposing a product. Participants were assigned to one of the conditions in a 3 (disposal: trash, recycle, donate) x 2 (no incentives vs. incentives). As predicted, the hypothesized effect only manifested when individuals had no economic incentives to dispose through a specific means but was eliminated when participants had incentives to dispose of the product.

Overall, this research contributes to the literature on product valuation (e.g. Atasoy and Morewedge 2018; Carmon and Ariely 2000; Dommer and Swaminathan 2013; Keinan, Kivetz, and Netzer 2016; Loewenstein and Kahneman, 1991), by showing what consumers expect to do with a product when they no longer want or need it can influence how much they value a product. Moreover, our results inform the growing literature on disposal decision making and on sustainability (Cialdini et al. 1990; Brough et al. 2016; Goldstein et al. 2008; Griskevicius et al. 2010; Luchs et al. 2010; White and Simpson 2013; Reczek et al. 2018), by pointing to an important outcome of disposal decisions (i.e., product valuation). Lastly, this research brings the circular economy into the fold. By doing so we hope to introduce some fruitful areas for future research. How does a circular strategy influence a brand, self-brand connection, product quality perceptions, price-fairness perceptions and other spillover sustainable behaviors? Because circular products or made of "others waste", it is possible, even likely to affect some the factors mentioned.

REFERENCES

Arkes, Hal R. (1996), "The Psychology of Waste," *Journal of Behavioral Decision Making*, 9(3), 213-224.

Atasoy, Ozgun, and Carey K. Morewedge (2017), "Digital goods are valued less than physical goods," *Journal of Consumer Research*, 44(6), 1343-1357.

Bolton, Lisa E., and Joseph W. Alba (2012), "When Less Is More: Consumer Aversion to Unused Utility," *Journal of Consumer Psychology*, 22(3), 369–83.

Brough, Aaron R., James E. Wilkie, Jingjing Ma, Mathew S. Isaac, and David Gal (2016), "Is Eco-Friendly Unmanly? The Green-Feminine Stereotype and its Effect on Sustainable Consumption," *Journal of Consumer Research*, *43*(4), 567-582.

Carmon, Ziv, and Dan Ariely (2000), "Focusing on the forgone: How value can appear so different to buyers and sellers," *Journal of Consumer Research*, 27(3), 360-370.

Cialdini, Robert B., Raymond R. Reno, and Carl A. Kallgren (1990), "A Focus Theory of Normative Conduct: Recycling the Concept of Norms to Reduce Littering in Public Places," *Journal of Personality and Social Psychology*, 58(6), 1015-1026.

Dommer, Sara L., and Vanitha Swaminathan (2013), "Explaining The Endowment Effect Through Ownership: The Role Of Identity, Gender, And Self-Threat." *Journal of Consumer Research,* 39(5), 1034-1050.

Donnelly, Grant E., Cait Lamberton, Rebecca W. Reczek, and Michael I. Norton (2017), "Social Recycling Transforms Unwanted Goods into Happiness," *Journal of the Association for Consumer Research*, 2(1), 48-63.

Goldstein, Noah J., Robert B. Cialdini, and Vladas Griskevicius (2008), "A Room with a Viewpoint: Using Social Norms to Motivate Environmental Conservation in Hotels," *Journal of Consumer Research*, 35(3), 472-482.

Griskevicius, Vladas, Joshua M. Tybur, and Van den Bergh, B. (2010), "Going Green to be Seen: Status, Reputation, and Conspicuous Conservation," *Journal of Personality and Social Psychology*, 98(3), 392-404.

Keinan, Anat, Ran Kivetz, and Oded Netzer (2016), "The Functional Alibi." *Journal of the Association for Consumer Research*, 1(4), 479-496.

Lewis, Michael (1997), "Self-Conscious Emotions: Embarrassment, Pride, Shame, and Guilt," In M. Lewis & J. M. Haviland (Eds.), *Handbook of emotions* (pp. 563-573). New York, NY, US: Guilford Press.

Lowenstein, George, and Kahneman Daniel (1991), "Explaining the Endowment Effect," working paper, Department of Social and Decision Sciences, Carnegie Mellon University.

Luchs, Michael G., Rebecca W. Naylor, Julie R. Irwin, and Ragajopal Raghunathan (2010), "The Sustainability Liability: Potential Negative Effects of Ethicality on Product Preference," *Journal of Marketing*, 74(5), 18-31.

Reczek, Rebecca W., Remi Trudel, and Katherine White (2018), "Focusing on the Forest or the Trees: How Abstract Versus Concrete Construal Level Predicts Responses to Eco-friendly Products," *Journal of Environmental Psychology, 57*, 87-98.

Stahel, Walter R. (2016), "The circular economy," *Nature News*, 531(7595), 435.

Sun, Monic, and Remi Trudel (2017), "The Effect of Recycling Versus Trashing on Consumption: Theory and Experimental Evidence," *Journal of Marketing Research*, 54(2), 293-305.

Tracy, Jessica L., and Richard W. Robins (2004), "Putting the Self Into Self-Conscious Emotions: A Theoretical Model," *Psychological Inquiry*, 15(2), 103-125.

Trudel, Remi, and Jennifer J. Argo (2013), "The Effect of Product Size and Form Distortion on Consumer Recycling Behavior," *Journal of Consumer Research,* 40(4) 632-643.

White, Katherine, and Bonnie Simpson (2013), "When do (and don't) Normative Appeals Influence Sustainable Consumer Behaviors?" *Journal of Marketing*, 77(2), 78-95.

Winterich, Karen P., Rebecca W. Reczek, and Julie R. Irwin (2017), "Keeping the Memory but Not the Possession: Memory Preservation Mitigates Identity Loss From Product Disposition," *Journal of Marketing*, 81(5), 104-120.

Food Sharing Reduces Perceived Consequences of Caloric Intake

Nükhet Taylor, York University, Canada
Theodore J. Noseworthy, York University, Canada

EXTENDED ABSTRACT

There has been a growing trend toward food sharing as means of portion control. Brands such as M&M's, Snickers, and Skittles released "*sharing size*" options, accompanied by overt claims promoting a healthier lifestyle (Mars Official Website 2017). This trend was not restricted to junk food. "Shared plate" options became some of the most popularized restaurant menu items (National Restaurant Association 2018). Yet, despite the popularity, obesity rates continued to climb (Trust for America's Health 2019). Far from a tool to promote portion control, food sharing may be promoting weight gain (Wurtman 2011). The goal of this research is to be the first to systematically explore why this may be happening.

In exploring the potential link between food sharing and weight gain, our first step was to probe whether consuming food shared by others was leading consumers to underestimate the caloric intake and/or fattening potential of the food item. The rationale was twofold. First, obesity research in diverse areas has pinpointed the underestimation of caloric content and fattening potential of food to be two of the prime drivers behind weight gain (Chernev 2011; Lansky and Brownell 1982). Second, testing caloric estimates alongside fattening judgments allowed us to simultaneously explore two possibilities. Fattening judgments, defined as the perceived potential for weight gain, is a possible outcome of caloric intake (Ilyuk et al. 2019). While caloric estimates often go hand in hand with fattening judgments, there are cases where people mentally decouple calories from fattening potential (cf. Oakes 2006). Thus, whereas one explanation is that people are downplaying their caloric intake, the other possibility is that people are downplaying the fattening potential of the consumption episode even though they understand their caloric intake. Three studies tested these possibilities. The data was analyzed using Bayesian analysis methods.

Study 1 (N=140) explored the core prediction that food sharing may be impacting caloric estimates and/or fattening judgments. Participants were randomly assigned to one of two between-subjects ownership conditions in a 2 (ownership: self, other) × 5 (categorical replication: grapes, pizza, M&M's, French fries, cookies) mixed factorial design. Participants were presented with a picture of each food item, and read that the item either belonged to them (self-ownership condition) or to their friend (other-ownership condition). Participants then imagined a consumption episode with this item. The questionnaire consisted of two randomized items, one capturing caloric estimates (open-ended), and the other capturing fattening judgments (1=*not fattening at all*, 9=*very fattening*). The task was repeated across five product categories.

A Bayesian repeated measures ANOVA yielded evidence against ownership having a reliable impact on caloric estimates ($BF_{10} = 0.48$). This suggested that food sharing was not altering caloric estimates. However, there is the possibility that people perceiving caloric intake to be less fattening when the food is shared by others. Our next analysis explored this possibility. A Bayesian repeated measures ANOVA supported the main effect of ownership ($BF_{10} = 2.93$), such that participants perceived their caloric intake to be less fattening when the food was shared by others ($M = 4.21$) than when it was owned by them ($M = 4.88$). The analysis also provided support against the full interaction model ($BF_{10} = .04$), suggesting that the food sharing reduced fattening judgments across all product categories. Overall, these results confirmed that participants judged their caloric intake to be less fattening when the food was shared by others.

Downplaying fattening potential of food can promote weight gain because it may reduce the likelihood that people will correct for the extra caloric intake in subsequent choices (cf. Dhar and Simonson 1999). Study 2 (N=206) tested this possibility. Participants imagined being at a restaurant with a friend, and were exposed to a picture of a plate of French fries. Participants read that this plate was either ordered by them (self-ownership condition) or by their friend (other-ownership condition). After imagining eating 5 individual French fries, participants were asked to select the desert alternative they preferred (1=*definitely the fruit salad*, 9=*definitely the chocolate cake*), followed by the same caloric estimate and perceived fattening measures as study 1. The caloric estimate and fattening judgments mirrored the findings of study 1, suggesting that people are downplaying the consequences of caloric intake when the food is shared by others. The critical question was whether this impacted subsequent choice. The analysis confirmed that the calorie-dense desert was preferred more in the other-ownership condition ($M = 6.93$) than in the self-ownership condition ($M = 6.13$; $BF_{10} = 2.68$). A frequentist mediation analysis confirmed a significant indirect effect of ownership through perceived fattening on desert choice (95% CI: .14, 1.11). Thus, consuming shared food reduced perceived fattening of the first consumption episode, which enhanced the preference for the calorie-dense desert.

The defining characteristic of food sharing, and the core manipulation in our studies, is the lack of ownership over the food item that one consumes. Thus, one possibility is that consumers are downplaying the consequences of caloric intake because they feel a lack of ownership over the food item. If true, then one may attenuate the bias by altering perceptions of ownership.

Study 3 (N=330) explored this possibility. All participants imagined being at McDonalds with a friend. Participants in the self-ownership (other-ownership) condition read that they (their friend) ordered Chicken McNuggets. The critical addition was the "other-with-psychological-ownership" condition. Like the other-ownership condition, participants in this condition read that their friend ordered the Chicken McNuggets. However, a classic psychological ownership manipulation was deployed to accentuate felt ownership over the food (Friedman 2010). The analysis showed a clear difference in fattening judgments ($BF_{10} = 20.24$). Fattening judgments were lower in in the other-ownership condition ($M = 5.34$) than in the psychological-ownership condition ($M = 5.86$; $BF_{10} = 1.56$), which was marginally lower than the self-ownership condition ($M = 6.29$; $BF_{10} = 1.35$). Thus, we were able to attenuate the biased fattening judgments by increasing felt ownership.

In contrast to the health benefits touted by companies, the current article shows that consumers are downplaying the fattening potential of consumption episodes when engaging in food sharing.

REFERENCES

Chernev, Alexander, and David Gal (2010), "Categorization effects in value judgments: Averaging bias in evaluating combinations of vices and virtues," *Journal of Marketing Research,* 47 (4), 738–747.

Dhar, Ravi, and Itamar Simonson (1999), "Making complementary choices in consumption episodes: Highlighting versus balancing," *Journal of Marketing Research*, 36 (1), 29–44.

Ilyuk, Veronika, Lauren Block, and Kelly L. Haws (2019), "Justifying by "healthifying": When expected satisfaction from consumption closure increases the desire to eat more and biases health perceptions of unhealthy leftovers," *Appetite*, 133, 138–146.

Mars Official Website (2017), "*Mars Chocolate & Wrigley lead industry evolution with partnership for a healthier America,*" Retrieved from https://www.mars.com/news-and- stories/ press-releases/mars-pha-announcement ([Online; accessed 12-12-2019])

National Restaurant Association (2018), "*What's Hot? 2019 Culinary Forecast*".

Oakes, Michael E. (2006), "Filling yet fattening: stereotypical beliefs about the weight gain potential and satiation of foods," *Appetite*, 46 (2), 224–233.

Trust for America's Health (2019), "*The State of Obesity: Better Policies for a Healthier America.*"

Wurtman, Judith J. (2011), "*Is someone in your life enabling you to gain weight?*" Retrieved from https://www.psychologytoday. com/us/blog/the-antidepressant-diet/201110/is- someone-in- your-life-enabling-you-gain-weight ([Online; accessed 12-13- 2019])

Firing Founders that Behave Badly: Effects of Morality versus Authenticity on Brand Evaluation

Lan Anh N. Ton, University of Georgia, USA
Rosanna Smith, University of Georgia, USA

EXTENDED ABSTRACT

When a company's founder engages in ethical misconduct, the company decides to fire the founder in hopes that the brand's reputation is maintained and that the company can recover from the financial losses. Specifically, 39% of the 89 cases of the CEO departures were due to ethical misconduct in 2018, an increase from the record of less than a quarter five years ago (McGregor 2019). For example, John Schnatter, founder of Papa John's Pizza, was forced out in the wake of his racist comment during a conference call in July 2018 (Neuman 2018). Jonathan Bush, co-founder and former CEO of Athenahealth, was also ousted amid past domestic assault and sexual misconduct allegations (Leaf 2018). Recently, McDonald's CEO stepped down after reports emerged that he violated company policy by engaging in a consensual relationship with an employee (Yaffe-Bellany 2019).

However, would the company's decision to fire an unethical founder improve the company's brand evaluation relative to the company's decision to retain him or her? Anecdotally, consumer reactions have been mixed. On the one hand, removing the founder can lead to positive reactions because the company has distanced itself from the moral violation. On the other hand, consumer reaction can be negative because firing the founder can lead consumers to see the company as no longer true to its origins. In this paper, we seek to provide an answer to the above question by proposing two parallel mechanisms (i.e., morality and authenticity) that explain the impact of the company's decision toward the unethical founder on its brand evaluation.

The company's perceived morality refers to the extent to which consumers perceive the company's intentions to be genuine or in service of a set of values (Beverland and Farrelly 2010; Morhart et al. 2015). Authenticity has been found to be subject to many meanings and has been classified into a variety of types (Newman and Smith 2016). In a recent article, authenticity is organized into three perspectives – authenticity as consistency between an entity's internal and external expressions, authenticity as conformity of an entity to the norms of its social category, and authenticity as connection between an entity and a person, place, or time as claimed (Lehman et al. 2019). The company's perceived authenticity is presented in the third perspective. Specifically, the company's perceived authenticity refers to the extent to which consumers perceive the company to be connected to its origin (i.e., the founder). The removal of an unethical founder could signal that the brand is committed to upholding a high ethical standard. Thus, firing (vs. retaining) the unethical founder should increase consumers' brand evaluation through enhanced company's perceived morality. However, the removal of the unethical founder could suggest that the company is no longer connected to its origin. Consumers tend to define what a product or brand is (i.e., its essence) in relation to its origins (Grayson and Martinec 2004; Newman and Dhar 2014). Hence, firing (vs. retaining) the founder could hurt the brand evaluation due to decreased company's perceived authenticity. In short, the company's decision to fire (vs. retain) the unethical founder could decrease and concurrently increase consumers' brand evaluation due to decreased company's perceived authenticity and increased company's perceived morality, respectively (See Figure 1). We tested our proposed relationship between the company's decision toward the unethical founder, the company's perceived morality and perceived authenticity, and brand evaluation across three experiments.

Empirical Evidence

Study 1. Study 1 tested whether firing an unethical founder had a positive effect on brand evaluation relative to retaining him or her. Participants first read about a coffee company whose current CEO was the founder. They either went on to rate their likelihood of purchasing a cup of coffee from the company (control condition) or learned that the CEO had physically assaulted someone and was either fired (fire condition) or not fired (retain condition) before evaluating the brand. Participants' brand evaluation in both the fire and retain conditions ($M = 4.00$, $SD = 1.34$) were significantly lower than the control condition ($M = 5.41$, $SD = 1.15$.; $t(363) = 9.63$, $p < .001$). Interestingly, there was no significant difference in brand evaluation between the fire ($M = 3.97$, $SD = 1.17$) and retain condition ($M = 4.03$, $SD = 1.50$; $t(363) = 0.33$, $p = .75$), suggesting that firing the unethical founder did not positively impact the company relative to retaining. Consistent with our predictions, consumer perceptions of the company's authenticity were directionally higher in the retain condition than in the fire condition, despite not being significant. In contrast, the company's perceived morality was significantly lower in the retain condition ($M = 3.43$, $SD = 1.51$) than in the fire condition ($M = 3.85$, $SD = 1.31$; $t(363) = 2.53$, $p = .01$, $d = 0.30$). These results were suggestive that the opposing forces of perceived morality and perceived authenticity might offset the overall positive effect of firing the unethical founder on consumers' brand evaluation compared to retaining. Hence, in the next two studies, we explored the boundary conditions under which one force drove the company's decision over the other.

Study 2. In study 2, we examined whether the effect of the company's decision toward the unethical CEO on consumers' brand evaluation, the firm's perceived authenticity, and the firm's perceived morality was moderated by the company's connection to its origin (i.e., CEO as a founder vs. CEO as a non-founder). We manipulated whether participants learned that the current CEO was the founder versus not the founder of the company, in addition to manipulating the company's decision toward the CEO (fire versus retain). Different from the previous study, a sexist comment at work was used as a moral violation. We expected that when the CEO was the non-founder, the company's decision to fire (vs. retain) him increased the company's perceived authenticity and perceived morality, which led to an increase in consumers' brand evaluation. In contrast, when the CEO was the founder, we would observe a competing effect of the two mediators. Specifically, the company's decision to fire (vs. retain) him decreased the firm's perceived authenticity and concurrently increased the firm's perceived morality, which led to a decrease and increase in consumers' brand evaluation, respectively.

A 2(decision: fire, retain) x 2(connection to origin: founder, non-founder) between-subjects ANOVA on consumers' brand evaluation revealed a main effect of decision, with brand evaluation rated higher in the fire condition ($M = 4.89$, $SD = 1.67$) than in the retain condition ($M = 4.34$, $SD = 1.79$; $F(1, 354) = 11.32$, $p = .001$, $d = 0.32$). There was no significant main effect of connection to origin on consumers' brand evaluation ($F(1, 354) = 0.43$, $p = .51$). Additionally, we observed a significant interaction between decision and

connection to origin ($F(1, 354) = 7.53$, $p = .006$). Consistent with the previous study, in the founder conditions, we observed no significant main effect of decision ($F(1, 354) = 0.22$, $p = .64$). In contrast, in the non-founder conditions, the brand was evaluated more positively in the fire condition ($M = 5.25$, $SD = 1.55$) than in the retain condition ($M = 4.34$, $SD = 1.79$; $F(1, 354) = 16.54$, $p < .001$, $d = 0.54$).

We also observed a significant interaction between decision and connection to origin on the firm's perceived authenticity ($F(1, 354) = 21.66$, $p < .001$). Consistent with our predictions, in the founder conditions, the company was perceived as more authentic in the retain condition than in the fire condition ($F(1, 354) = 4.81$, $p = .03$). In contrast, in the non-founder conditions, the company was perceived as more authentic when the non-founder was fired than when he was kept ($F(1, 354) = 18.23$, $p < .001$). There was also an interaction between decision and connection to origin on the firm's perceived morality ($F(1, 354) = 8.23$, $p = .004$). As expected, we observed that the company was perceived as more moral in the fire condition than in the retain condition across the non-founder ($F(1, 354) = 46.96$, $p < .001$) and founder conditions ($F(1, 354) = 11.87$, $p = .001$).

We then separately tested the proposed parallel mediation model when the CEO was the founder and when the CEO was the non-founder (Hayes 2013, model 4). When the CEO was the non-founder, we observed significant mediating effects of the firm's perceived authenticity and perceived morality (indirect effect = 0.41, $SE = 0.14$, 95% CI = [.16, .72]; indirect effect = 1.00, $SE = 0.25$, 95% CI = [.57, 1.54]). Specifically, firing the non-founder increased both the firm's perceived authenticity and perceived morality, leading to an increase in brand evaluation. In contrast, when the CEO was the founder, we found competing effects of the firm's perceived authenticity and perceived morality (indirect effect = -0.18, $SE = 0.09$, 95% CI = [-.37, -.02]; indirect effect = 0.46, $SE = 0.15$, 95% CI = [.19, .77]). That is, firing the founder increased the firm's perceived morality but at the same time decreased the firm's perceived authenticity, resulting in an increase and decrease in brand evaluation, respectively.

Study 3. Using the same moral violation as in study 2, we tested whether the effect of the company's decision on brand evaluation was moderated by the founder's engagement in moral restoration (i.e., apology vs. no apology). In addition to the manipulation of the company's decision, we manipulated whether the participants received information about the founder's apology (i.e., apology condition) or they received no additional information after reading about the company's decision (i.e., no apology condition). We anticipated that, given the information about the founder's apology, firing him decreased the firm's perceived authenticity relative to retaining him. That, in turn, resulted in a decrease in consumers' brand evaluation. In contrast, given no information about the founder's apology, firing the founder increased the firm's perceived morality relative to retaining him, which led to an increase in consumers' brand evaluation.

A 2(decision: fire, retain) x 2(moral restoration: apology, no apology) between-subjects ANOVA on consumers' brand evaluation revealed a main effect of decision, with brand evaluated higher in the retain condition ($M = 4.48$, $SD = 1.77$) than in the fire condition ($M = 4.06$, $SD = 1.67$; $F(1, 387) = 6.41$, $p = .01$, $d = 0.24$). There was also a main effect of moral restoration, with consumers' brand evaluation rated higher in the apology condition ($M = 4.46$, $SD = 1.82$) than in the no apology condition ($M = 4.11$, $SD = 1.64$; $F(1, 387) = 3.94$, $p = .05$, $d = 0.20$). Additionally, we observed a significant interaction between decision and moral restoration ($F(1, 387) = 6.29$, $p = .01$). Consistent with the results from the previous studies, when there was no additional information about the founder's apology, we found no significant effect of the company's decision on brand evaluation ($F(1, 387) = 0.00$, $p = .99$). In contrast, when the was information

about the founder's apology, retaining the founder increased consumer's brand evaluation relative to firing him ($M = 4.89$, $SD = 1.84$ vs. $M = 4.01$, $SD = 1.69$; $F(1, 387) = 11.99$, $p = .001$, $d = 0.50$).

We also observed a significant interaction between decision and moral restoration on the firm's perceived authenticity ($F(1, 387) = 5.60$, $p = .02$). Consistent with our predictions, in the apology conditions, retaining the founder increased the company's perceived authenticity relative to firing him ($F(1, 387) = 9.77$, $p = .002$). In contrast, in the no apology conditions, we observed no significant effect of decision on the company's perceived authenticity ($F(1, 387) = 0.02$, $p = .89$). We also found an interaction between decision and moral restoration on the firm's perceived morality ($F(1, 387) = 4.47$, $p = .04$). Specifically, in the no apology conditions, the company was perceived as more moral in the fire condition ($M = 4.72$, $SD = 1.47$) than in the retain condition ($M = 4.12$, $SD = 1.52$; $F(1, 387) = 7.64$, $p = .006$). However, in the apology conditions, there was no significant effect of the company's decision on the firm's perceived morality ($F(1, 387) = 0.09$, $p = .77$).

Similar to study 2, we then separately tested the proposed parallel mediation model when there was information about the founder's apology and when there was none (Hayes 2013, model 4). When there was information about the founder's apology, we observed only the mediating effect of the firm's perceived authenticity but not of the firm's perceived morality (indirect effect = -0.34, $SE = 0.15$, 95% CI = [-.68, -.11]; indirect effect = -0.03, $SE = 0.11$, 95% CI = [-.25, .20]). In contrast, when there was no information about the founder's apology, the effect of the firm's decision on brand evaluation was mediated by the firm's perceived morality but not by the firm's perceived authenticity (indirect effect = 0.26, $SE = 0.11$, 95% CI = [.07, .50]; indirect effect = 0.01, $SE = 0.11$, 95% CI = [-.20, .24]).

General Discussion

The current paper offers two theoretical contributions. First, we extend prior work that emphasizes the important role of authenticity on consumer behavior, by showing that when the origin (i.e., founder) of the company is tainted, the company's decision to fire or to retain the unethical founder evokes a tension between the company's perceived authenticity and morality. Second, we confirm the importance of apology in crisis communication in that an apology validates the morality of retaining the founder, who once committed a wrongful act. As a result, retaining the founder increases the firm's perceived authenticity relative to firing the founder, which, in turn, enhances consumers' evaluation of the brand.

Our findings provide consistent evidence across the three studies that firing an unethical founder did not enhance consumer evaluations of the brand relative to retaining the founder. This result was suggestive that the opposing effects of the firm's perceived authenticity and perceived morality might offset the positive impact of firing the unethical founder on consumers' brand evaluation relative to retaining. Given this finding, we proceeded to explore the boundary conditions in which one force drove the company's decision over the other. Specifically, we tested whether the effect of the company's decision on consumers' brand evaluation was moderated by the company's connection to its origin (study 2) and by the founder's engagement in moral restoration (Study 3). The results from these studies offered important implications for practitioners. When the unethical CEO was a non-founder, firing him improved both consumers' perceptions of the firm's authenticity and morality, leading to consumers' positive evaluation of the brand relative to retaining the non-founder. When the founder provides a sincere apology for his wrongful act, retaining him increased the firm's perceived au-

thenticity relative to firing, thereby enhancing consumers' evaluation of the brand. In future studies, we will continue to explore conditions under which companies can manage ethical violations by their leaders by improving either its perceived authenticity or its perceived morality.

REFERENCES

Beverland, Michael B. and Francis J. Farrelly (2010), "The Quest for Authenticity in Consumption: Consumers' Purposive Choice of Authentic Cues to Shape Experienced Outcomes," *Journal of Consumer Research*, 36 (5), 838–56.

Grayson, Kent and Radan Martinec (2004), "Consumer Perceptions of Iconicity and Indexicality and Their Influence on Assessments of Authentic Market Offerings," *Journal of Consumer Research*, 3 (2), 296–312.

Leaf, Clifton (2018), "The Blunt Truth about Athenahealth's Jonathan Bush," *Fortune*, June 6.

Lehman, David W., Kieran O'Connor, Balázs Kovács, and George E. Newman (2019), "Authenticity," *Academy of Management Annals*, 13 (1), 1–42.

McGregor, Jena (2019), "More CEOs were Forced Out for Ethical Lapses in 2018 than Poor Financial Performance," *The Washington Post*, May 15.

Morhart, Felicitas, Lucia Malär, Amélie Guèvremont, Florent Girardin, and Bianca Grohmann (2015), "Brand Authenticity: An Integrative Framework and Measurement Scale," *Journal of Consumer Psychology*, 25 (2), 200–18.

Neuman, Scott (2018), "Papa John's Founder Quits as Chairman After Using The N-Word During Conference Call," *National Public Radio (NPR)*, July 12.

Newman, George E. and Ravi Dhar (2014), "Authenticity Is Contagious: Brand Essence and the Original Source of Production," *Journal of Marketing Research*, 51 (3), 371–86.

Newman, George E. and Rosanna K. Smith (2016), "Kinds of Authenticity," *Philosophy Compass*, 11 (10), 609–18.

Yaffe-Bellany, David (2019), "McDonald's Fires C.E.O. Steve Easterbrook after Relationship with Employee," *The New York Times*, November 3.

Purity Packaging: How and When Simple Packaging Designs Enhance Product Evaluations and Choice

Lan Anh N. Ton, University of Georgia, USA
Rosanna Smith, University of Georgia, USA
Julio Sevilla, University of Georgia, USA

EXTENDED ABSTRACT

Packaging design is a common way for companies to enhance product appeal (Ampuero and Vila 2006; Underwood, Klein, and Burke 2001). Conventional marketing practice typically involves adding a set of design elements (e.g., graphics, images, illustrations) on packaging to communicate valued product attributes (Rundh 2009; Underwood and Klein 2002) such as product quality (Underwood and Klein 2002) or product healthiness (Vila and Ampuero 2007). Here, we examine when the use of less can lead to more. Specifically, this article examines the consumer response to products with simple (vs. complex) packaging designs.

Design simplicity often involves relatively minimal use of design elements (Agrawal 2019), whereas design complexity involves a relatively high number of design elements (Pieters, Wedel, and Batra 2010). Prior research has primarily examined the influence and benefits of general visual complexity on consumer attitudes (e.g., Orth, Campana, and Malkewitz 2010; Orth and Crouch 2014; Pieters et al. 2010). In this work, we focus on the contrast between overall package design simplicity (vs. complexity) on a set of consequential product inferences for both consumables and non-consumables in the context of consumer packaged goods. Holding constant all other information, we propose that a package with a simple (vs. complex) design will be more effective at conveying certain valued product attributes such as product quality and healthiness, which, in turn, will enhance product valuation and choice.

We theorize that these enhanced judgments primarily stem from the simplicity of the package design leading consumers to draw an implicit parallel connecting the design elements on the exterior package and the nature of the interior product. As simple packaging keeps visual features on the package to a minimum, we propose that consumers are likely to infer that the product's composition is similarly minimal or pure (i.e., has involved little processing or alteration) relative to that in complex packaging. We then posit that the enhanced perceptions of product purity with simple packaging design will increase product valuation and choice through enhancing dual inferences of product quality and healthiness.

To test the proposed processes, we first drew from four of the six design complexity principles of Pieters, Wedel, and Batra (2010) to create the simple (vs. complex) packaging designs: (1) the dissimilarity of objects, (2) the quantity of objects, (3) the irregularity of object arrangement, and (4) the detail of objects. We posit that design simplicity is the reduction of these principles. Thus, a simple design is one in which the objects used are similar to one another, are low in quantity, are regularly arranged, and possess little detail. Using their principles, we then developed a novel two-stage process to create the packaging designs for both consumable (trail mix) and non-consumable (hand lotion) products. To ensure the effectiveness of our design simplicity manipulation, we tested the two sets of created packaging designs for design simplicity perceptions (see table 1, pilot test). These created designs were then used as stimuli across five experiments (except for study 3 which used real packaging designs).

EMPIRICAL EVIDENCE

Study 1A. Study 1A tested our proposed processes using the created packaging designs for a consumable product (trail mix). Partici-

pants were randomly assigned to view a trail mix in either a simple or complex package. They were then asked to assess product valuation: How high-end do you think this product is? (1 = *Not at all High-end*, 9 = Very High-end); How expensive do you think this product is? (1 = *Not at all Expensive*, 9 = Very Expensive). Items were averaged to create a composite measure of product valuation (α = .87).

To capture product purity, participants rated: I think this product is pure; I think this product is made from unprocessed materials; I think this product is made from unprocessed ingredients; I think this product is made from natural materials; I think this product is made from natural ingredients (1 = *Strongly Disagree*; 9 = *Strongly Agree*). Items were averaged to create a composite measure of product purity (α = .93).

To measure perceptions of product quality, participants rated: To what extent do you think this product is of high quality? (1 = *Not at all*; 9 = *Very much*). To capture perceptions of product healthiness, participants rated: How healthy do you think this product is? (1 = *Not at all Healthy*; 9 = *Very Healthy*).

As a check for design simplicity, participants rated the same item from the pilot test (i.e., How complex do you think the packaging design of this product is? (1 = *Simple*; 9 = *Complex*)). To control for design attractiveness and brand familiarity, participants were asked: To what extent do you think the packaging design of this product is attractive? (1 = *Not at all Attractive*; 9 = Very Attractive); To what extent do you feel familiar with this product brand? (1 = *Not at all Familiar*; 9 = *Very Familiar*). Participants completed attention checks and demographics.

As expected, the simple package was perceived as less complex than the complex package (2.22 vs. 4.93; $t(177)$ = -8.80, $p < .001$, d = 1.33). Furthermore, we found no significant difference in design attractiveness ($p = .86$) or in brand familiarity ($p = .61$) across conditions.

We found that the trail mix in the simple (vs. complex) package was seen as higher in valuation (6.26 vs. 5.37; $t(177)$ = 3.34, $p = .001$, $d = .50$), purer (5.57 vs. 4.69; $t(177)$ = 3.59, $p < .001$, $d = .54$), higher in quality (6.10 vs. 5.29; $t(177)$ = 2.79, $p = .006$, $d = .42$), and healthier (6.04 vs. 5.08; $t(177)$ = 4.02, $p < .001$, $d = .61$). Moreover, we predicted that the trail mix in the simple (vs. complex) package would be perceived as purer, which, in turn, would increase perceived product quality and subsequent product valuation. Results from the serial mediation analysis (Model 6, Hayes 2018) revealed that the packaging design had a significant indirect effect on product valuation through sequential enhancement in perceived product purity and quality (β = .30, $SE = .11$, 95% CI = [.12, .55]). We also found support for our theorizing that the effect of packaging design on valuation was explained by the serial process from perceived product purity to healthiness (β = .13, $SE = .06$, 95% CI = [.03, .27]).

Study 1B. Study 1B extended the effects of simple versus complex packaging to a non-consumable product (hand lotion). Participants were randomly assigned to view a hand lotion in either a simple or complex package. They again rated the following: product valuation (α = .94), product purity (α = .94), product quality, and product healthiness. The product healthiness item was modified for a non-consumable product: To what extent do you think this product is good for your health? (1 = *Not at all*; 9 = *Very much*). Participants

rated the design simplicity of the package, design attractiveness, and brand familiarity. Lastly, they completed attention checks and demographics.

As expected, the simple package was perceived as less complex than the complex package (2.11 vs. 4.58; $t(333) = -11.61$, $p < .001$, $d = 1.28$). We again found no significant difference in design attractiveness ($p = .41$) and brand familiarity ($p = .22$) across conditions.

The hand lotion in the simple (vs. complex) package was seen as higher in valuation (5.79 vs. 5.04; $t(333) = 3.61$, $p < .001$, $d = .39$), purer (4.57 vs. 4.09; $t(333) = 2.74$, $p = .007$, $d = .30$), higher in quality (5.79 vs. 4.98; $t(333) = 3.98$, $p < .001$, $d = .43$), and healthier (4.85 vs. 4.33; $t(333) = 2.87$, $p = .004$, $d = .32$). Moreover, results from the serial mediation analysis (Model 6, Hayes 2018) revealed that the effect of packaging design on valuation was driven by the serial process both through purity and quality ($\beta = .26$, $SE = .09$, 95% CI = [.08, .45]) and through purity and healthiness ($\beta = .07$, $SE = .03$, 95% CI = [.02, .14])

Study 2. Study 2 tested our proposed process via both a mediation and a moderation approach by directly manipulating perceived product purity in addition to measuring the construct. We theorize that simple packaging increases perceived product valuation, quality, and healthiness because consumers draw an implicit visual parallel between the simplicity of the design and the purity of the product's composition. Thus, we reason that if consumers were given information about the product's composition that suggested the interior was altered from its original state, then we would expect the positive effect of simple packaging on perceived valuation, quality, and healthiness to attenuate. This is because providing this information about the product composition contradicts the implicit parallel made between the minimal features of the exterior simple design and the purity within.

A 2 (packaging design: simple vs. complex) by 2 (product interior: control vs. altered) between-subjects ANOVA on perceived product purity revealed a significant interaction between packaging design and product interior ($F(1, 463) = 7.91$, $p = .005$, $\eta_p^2 = .02$). In the control conditions, the trail mix in the simple package was seen as purer (5.76 vs. 5.00; $F(1, 463) = 11.23$, $p = .001$, $d = .45$). By contrast, in the altered conditions, we found no significant effect of packaging design (2.80 vs. 2.96; $F(1, 463) = .44$, $p = .51$, $d = .09$). There was a marginally significant main effect of packaging design ($F(1, 463) = 3.49$, $p = .06$, $d = .09$) and a main effect of product interior ($F(1, 463) = 238.06$, $p < .001$, $d = 1.40$). Of note, we also performed the same analysis on design simplicity manipulation check, product interior manipulation check, product valuation, quality, and healthiness and found support for our predictions (see table 1, study 2).

As expected, we observed significant moderated serial mediation (Model 83, Hayes 2018) by purity and quality ($\beta = -.45$, $SE = .17$, 95% CI = [-.77, -.14]) and by purity and healthiness ($\beta = -.20$, $SE = .09$, 95% CI = [-.40, -.05]). In the control conditions, participants thought the trail mix in the simple package was purer, which, in turn, increased quality and valuation ($\beta = .38$, $SE = .11$, 95% CI = [.17, .59]). These patterns were replicated in the sequential process through purity and healthiness ($\beta = .17$, $SE = .06$, 95% CI = [.06, .30]). However, in the altered conditions, perceived purity and quality/ healthiness no longer mediated the relationship between design simplicity and valuation ($\beta = -.08$, $SE = .12$, 95% CI = [-.31, .16]; $\beta = -.03$, $SE = .06$, 95% CI = [-.15, .07], respectively).

Study 3. Study 3 examined a potential boundary condition via another consequential consumer outcome: product choice. Since studies 1A-2 revealed that participants perceived products in simple packages to be higher in quality and, in turn, of higher valuation, we reasoned that people (less) concerned about product affordability would be (more) less likely to choose products in simple packages. To test this, participants were randomly assigned to one of two affordability conditions: low versus high concern about product affordability. They were then presented with a choice between two hand lotions, one in a simple package and the other in a complex package. As noted earlier, we used found product packaging designs as stimuli.

To test this, we ran a logistic regression with choice as the dependent measure and affordability concern as the independent variable. Consistent with our predictions, 74.5% chose the simple package in the low concern condition, whereas 64% chose the simple package in the high concern condition, revealing a significant attenuation in simple package choice by affordability concern (Wald = 4.93, $p = .03$; $X^2 (1) = 4.97$, $p = .03$). The effect of affordability concern on choice was significantly mediated by a serial process through purity and quality ($\beta = .05$, $SE = .03$, 95% CI = [.01, .12]) but not through purity and healthiness ($\beta = .04$, $SE = .03$, 95% CI = [-.01, .11]).

Study 4. Study 4 also examined another key boundary condition with choice as the dependent measure. Given that product healthiness is one key product inference attributed to simple designs, we reasoned that people would be (more) less likely to value products with simple designs if they had a (health) indulgence goal. To test this, participants were randomly assigned to either the health goal condition or the indulgence goal condition. They were then presented with a choice between the trail mix in the simple package and the trail mix in the complex package. Consistent with our expectations, 65% chose the simple package in the health goal condition, while only 41.4% chose the simple package in the indulgence goal condition (Wald = 17.48, $p < .001$; $X^2 (2) = 20.18$, $p < .001$, see figure 1). The difference in choice was mediated by the serial process between purity and healthiness ($\beta = .22$, $SE = .09$, 95% CI = [.08, .43]) but not between purity and quality ($\beta = .02$, $SE = .04$, 95% CI = [-.07, .10]).

General Discussion

Marketers typically add design elements to packages to signal valued product attributes. We find across a pilot test and five experiments that less can convey more. Using a theoretically grounded approach (Pieters et al. 2010), we created and tested simple (vs. complex) packaging designs across a consumable and non-consumable product. Studies 1A-1B provided support for our proposed processes across two product domains. Specifically, we found that the use of simple packaging enhanced product valuation. This enhanced valuation was explained through two paths—one through increased perceived product purity and quality and the other through increased perceived product purity and healthiness. Study 2 bolstered these results by providing moderation support for our proposed process by manipulating the perceived alteration of the product interior. Studies 3 and 4 tested two boundary conditions while also introducing a consequential dependent variable, product choice. Study 3 showed that the preference for simple packaging attenuated with high product affordability concerns. In Study 4, people with an indulgence goal were more likely to choose products with complex packaging.

This paper offers several theoretical contributions. First, this work enhances our understanding of how consumers evaluate design complexity by highlighting and providing conceptual grounding to the construct of design simplicity in the context of packaging designs for both consumable and non-consumable products. Second, this research introduces a theoretically and empirically driven conceptualization of product purity and shows that product purity can be signaled via subtle visual cues. Third, we establish a novel and effective way to convey product quality and healthiness through simple packaging signaling product purity. Our findings hold important manage-

rial implications. Simplifying packaging may be a win-win strategy for marketing managers in that simple packaging not only enhances valued product inferences but also may require less resource expenditure than complex packaging. Moreover, given that consumers are increasingly suspicious of artificial ingredients and processes, evoking product purity in packaging design is a key way managers can convey related product attributes like quality and healthiness.

REFERENCES

Agrawal, Nidhi (2019), "Simple Packaging is Ruling the Market. Read Up to Know Why?," https://bizongo.com/blog/simple-packaging-trends/.

Ampuero, Olga, and Natalia Vila (2006), "Consumer Perceptions of Product Packaging," *Journal of Consumer Marketing*, 23 (2), 100–12.

Orth, Ulrich R., Daniela Campana, and Keven Malkewitz (2010), "Formation of Consumer Price Expectation Based on Package Design: Attractive and Quality Routes," *Journal of Marketing Theory and Practice*, 18 (1), 23–40.

Orth, Ulrich R., and Roberta C. Crouch (2014), "Is Beauty in the Aisles of the Retailer? Package Processing in Visually Complex Contexts," *Journal of Retailing*, 90 (4), 524–37.

Pieters, Rik, Michel Wedel, and Rajeev Batra (2010), "The Stopping Power of Advertising: Measures and Effects of Visual Complexity," *Journal of Marketing*, 74 (5), 48–60.

Rundh, Bo (2009), "Packaging Design: Creating Competitive Advantage with Product Packaging," *British Food Journal*, 111 (9), 988–1002.

Underwood, Robert L., and Noreen M. Klein (2002), "Packaging as Brand Communication: Effects of Product Pictures on Consumer Responses to the Package and Brand," *Journal of Marketing Theory and Practice*, 10 (4), 58–68.

Underwood, Robert L., Noreen M. Klein, and Raymond R. Burke (2001), "Packaging Communication: Attentional Effects of Product Imagery," *Journal of Product and Brand Management*, 10 (7), 403–22.

Vila, Natalia, and Olga Ampuero (2007), "The Role of Packaging in Positioning an Orange Juice," *Journal of Food Products Marketing*, 13 (3), 21–48.

Past Imperfect or Present Perfect: How Dynamic Ranks Influence Consumer Perceptions

Sanjeev Tripathi, Indian Institute of Management, Indore, India
Arpita Pandey, Indian Institute of Management Ahmedabad, India
Shailendra Pratap Jain, University of Washington, USA

EXTENDED ABSTRACT

Consumers evaluate market offerings based on their inclusion and their rank in the list (Sorensen 2007, Issac and Schindler 2014; Issac and Jain 2018). As such, firms can frame information about their relative standing in these lists to influence consumer perceptions (Sevilla, Issac and Bagchi 2018).

Ranking of firms in such lists can change over time. While it is known that consumers choose products based on their movement on a list (Pope 2009), there is little research on how such movement affects consumer perceptions (Petit et al. 2013).

We investigate how consumers evaluate firms based on historical rank information. We demonstrate that individuals rely on both, historical as well as current rank of the firm. For the same rank, consumers penalize firms if their ranks fall and reward them when they rise. Further, relying on Murphy and Dweck (2016), we show that for a given change, entity theorists who believe that world is stable/fixed are less malleable in their evaluations and do not penalize firms much when firms slide. However, incremental theorists who believe that the world is changeable penalize such firms more. Finally, we show that the effect of the direction of rank change on consumers' reactions is mediated by their evaluation of the firm and moderated by the degree of rank change. Formally,

Hypothesis 1:   *Consumers' evaluations of firms are dependent on current as well as past ranks of the firms in the list.*

Hypothesis 2:   *For the same rank, consumers reward firms for a rise in rank and penalize them for a fall.*

Hypothesis 3:   *The effect of rank change on consumers' reaction is mediated by the evaluation of the firm.*

Hypothesis 4:   *The effect of rank change will be attenuated for entity theorists and accentuated for incremental theorists.*

Hypothesis 5:   *Larger the change in rank magnitude, greater the impact on consumers' evaluations.*

In study 1, student participants (N = 102, 37% females) were randomly assigned to the three between-subjects rank change conditions in a 1 X 3 (rise 44→24, fall 2→24, remained stable 24→24) one-way design. The context of the study was the evaluation of a bank. Participants evaluated the quality of the bank on a three-item, 11-point scale (Isaac et al, 2016). A one-way ANOVA with quality perception as the dependent variable and rank change as the independent variable, indicated a significant effect ($F(2, 101) = 3.48$, $M_{Rise} = 6.16$, $M_{Drop} = 4.77$, $M_{Control} = 4.88$; $p = .035$). A pairwise comparison indicated that the quality perception associated with rise in rank was significantly different from drop in rank ($p = .046$) and marginally so from control ($p = .082$).

Study 2 replicated study 1 using a different context and different set of ranks. Participants (N = 68, 44% females) responded to a perception study about startups (Rise in rank 60→35/Drop in rank 5→35). An ANOVA showed a significant effect of rank change for both, evaluation, ($F(1, 67) = 6.29$, $M_{Rise} = 7.17$, $M_{Drop} = 6.06$; $p =$ .015) and investment worthiness ($F(1, 67) = 4.95$, $M_{Rise} = 6.77$, $M_{Drop} = 5.82$; $p = .03$).

Study 3 utilized a 1X2 (Belief systems: Incremental/Entity theorists) between subjects design. In the first part of a two-part study, participants (N = 117, 40% females) responded to an instrument (Implicit theory for general world order, Dweck and Legett 1988; Dweck 2013) to measure beliefs about changeability of the world order. In the second part, the subjects envisaged a scenario of planning a visit to a museum. Next, participants were informed that the museum had dropped from 2nd to 8th on a list of top 10 museums in Europe. They indicated their likelihood of visiting the museum on a three-item, 11-point scale (Goodall 1988; Summers and Kennedy 1995). An ANOVA based on median split on the implicit theory instrument revealed a significant main effect of belief system ($F(1, 116) = 7.04$, $M_{Incremental} = 4.83$, $M_{Entity} = 5.20$; $p = .009$) confirming that incremental theorists were less likely to visit the museum than entity theorists.

In Study 4, respondents (N = 129, 37% females) evaluated Football players for a fantasy league and considered them for drafting on the basis of their ranks in the top 100 list of players. The design was a 2 (Direction: Drop/Rise in rank) X 2 (Change: Large (20-ranks)/Small (5-ranks) between subjects. Participants evaluated the player on a four item, 11-point scale and their intention to select the player on a 3-item, 11-point scale. An ANOVA showed a significant effect of direction ($F(1, 128) = 12.607$, $M_{Rise} = 7.93$, $M_{Drop} = 6.90$; $p < 0.001$) on player evaluation. There was no effect of magnitude of rank change ($F(1, 128) = 0.112$, $M_{Small Change} = 7.40$, $M_{Large Change} = 7.43$; $p > 0.05$). However, this effect was qualified by a significant interaction ($F(1, 128) = 9.2$, $p = .003$). Similar results were observed for player selection. There was a significant effect of direction, no significant effect of magnitude of rank change and a significant interaction. The interaction indicated that while the selection likelihood was significantly different for large change in rank, there was no significant difference for small change in ranks.

A test of moderated mediation (Hayes process, model 7) indicated a significant mediation by evaluation ($p < 0.001$, 95%CI = [.83, 1.07]). The indirect effect of direction on evaluation and subsequently on DV was significant for drop in rank (95%CI = [-2.29, -.97]) but not for rise in rank (95%CI = [-.49, .24]).

This research contributes to the sparse literature on dynamic ranks and their consequences. We show that consumers' evaluations are impacted by historical ranks and bad past ranks may make the firm look good. While firms get penalized for falling ranks, entity theorists are less harsh in penalizing firms (vs. incremental theorists). Moreover, we find that the extent of rank change impacts consumer perceptions. Thus, firms may choose to provide information on past ranks depending on their movement in ranks. Further, if they know about consumers' implicit beliefs, they can frame information appropriately to manage consumer perceptions.

REFERENCES

Dweck, C. S., & Leggett, E. L. (1988). A social-cognitive approach to motivation and personality. *Psychological review*, 95(2), 256.

Goodall, B. (1988). How tourists choose their holidays: An analytical framework. Marketing in the tourism industry: The promotion of destination regions, 1, 1-17.

Isaac, M. S and Jain, S. P. (2018), "Assuming Ordinality: Best-To-Worst Inferences in Vertical Lists", in AP - Asia-Pacific Advances in Consumer Research Volume 12, eds. Shailendra Pratap Jain and Akshaya Vijayalakshmi, Duluth, MN : *Association for Consumer Research*, Pages: 17-17.

Isaac, M. S., & Schindler, R. M. (2014), "The top-ten effect: Consumers' subjective categorization of ranked lists," *Journal of Consumer Research*, *40*(6), 1181-1202.

Isaac, M. S., Brough, A. R., and Grayson, K. (2016), "Is top 10 better than top 9? The role of expectations in consumer response to imprecise rank claims," *Journal of Marketing Research*, *53*(3), 338-353.

Murphy, M. C., and Dweck, C. S. (2016). "Mindsets shape consumer behavior," *Journal of Consumer Psychology*, 26(1), 127-136.

Pettit, N. C., Sivanathan, N., Gladstone, E., and Marr, J. C. (2013), "Rising stars and sinking ships: Consequences of status momentum," *Psychological science*, *24*(8), 1579-1584.

Pope, Devin G. (2009), "Reacting to Rankings: Evidence from 'America's Best Hospitals," *Journal of Health Economics*, 28 (6), 1154–65.

Sevilla, J., Isaac, M. S., and Bagchi, R. (2018), "Format neglect: how the use of numerical versus percentage rank claims influences consumer judgments", *Journal of Marketing*, *82*(6), 150-164.

Sorensen, Alan T. (2007), "Bestseller Lists and Product Variety," *Journal of Industrial Economics*, 55 (4), 715–38.

Summers, J. M., & McColl-Kennedy, J. R. (1995). Development of a measurement scale for analysing destination choice criteria in the tourist decision process. ACR European Advances.

Stressed or Self-Importance? Intentions vs Perceptions When Communicating Busyness

Maria Giulia Trupia, IESE Business School, Spain
Cassie Mogilner, University of California Los Angeles, USA
Isabelle Engeler, IESE Business School, Spain

EXTENDED ABSTRACT

Polls show that people are feeling busier than ever (Carroll 2008; Hamermesh 2019). "Busyness" is commonly defined as the *feeling* of having a lot to do but not enough time to do it all (Gershuny 2005; Wilcox, Laran, Stephen, and Zubcsek 2016; Kim, Wadhwa, and Chattopadhyay 2019). Not only do busy people feel more stressed and less satisfied in life (Kasser and Sheldon 2009; Sharif, Mogilner, and Hershfield 2020), but they are also less likely to slow down and give time to others (Mogilner, Chance, and Norton 2012). An intuitive coping strategy is to communicate one's experience of busyness to others. Indeed, social media posts in which people complain about being busy are widespread (Alford 2012).

However, it is unclear what people are *intending* to convey when telling others they are busy versus what others perceive. Prior research has focused on identifying causes and consequences of people's feelings of busyness (Rudd 2019; Wilcox et al. 2016), as well as inferences that observers make about busy people (Bellezza, Paharia, and Keinan 2017). Still, little is known about what those *expressing* busyness want to convey. While research suggests that busyness is associated with feelings of stress (e.g., Etkin, Evangelidis, and Aaker 2015), recent findings suggest that through signaling status, busyness may instead be intended and perceived as conveying self-importance (Kim et al. 2019). Saying, "I am busy," to express stress versus self-importance would serve distinct interpersonal goals. While admitting feeling stressed might facilitate interpersonal connection (Alicke et al. 1992), highlighting one's importance might serve to impress the other (Sezer, Gino, and Norton 2018).

We examined what people ("expressers") are actually feeling and intending when they express being busy compared to what others ("receivers") perceive the person is feeling and intending. Four studies reveal a miscalibration, such that others over-perceive statements of busyness as expressing self-importance (vs. stress) and an intention to impress (vs. connect). That is, when told, "I am busy," receivers think that expressers feel more self-important than they actually do, and receivers believe expressers want to impress them more than they intend to. Importantly, we find that this miscalibration has interpersonal costs: receivers infer that expressers like them less than they actually do. Studies 1 and 2 identify and replicate the miscalibration using two different paradigms; Study 3 examines process and downstream consequences; and Study 4 shows that explaining this miscalibration can elicit expressions of busyness that are more accurately received.

Study 1 (*N* = 506) was a 2 (person: expresser vs. receiver, between) x 2 (expression: stress vs. self-importance, within) mixed design. Expressers were asked, "*In times when you have a lot to do and you tell someone (e.g., a friend, a colleague), "I am busy," what are you thinking and feeling?*", and receivers were asked, "*In times when they have a lot to do and someone (e.g., a friend, a colleague) tells you, "I am busy," what do you think they are thinking and feeling?*"). Expressers [receivers] then reported their own [the other's] feelings of stress and self-importance (1-7).

Overall, communicating busyness was associated more with feelings of stress than self-importance by both expressers and receivers (expression main effect: *p*<.001, *d*=.90). Importantly, there was a significant person x expression interaction (*p*=.021): receivers significantly overestimated expressers' feelings of self-importance (*p*=.004, *d*=.26); but not their feelings of stress (*p*=.867, *d*=.02).

Using the same mixed design as Study 1, Study 2 (*N* = 802) instructed participants to recall a particular situation. Expressers were instructed, "*Think of a time when you told someone (e.g., a friend, a colleague), 'I am busy'*", and receivers were instructed, "*Think of a time when someone (e.g., a friend, a colleague) told you, 'I am busy'*"). Expressers [receivers] then reported their own [the other's] feelings of stress and self-importance (1-7).

We again found a person x expression interaction (*p*<.001) based on receivers overestimating expressers' feelings of self-importance (*p*<.001, *d*=.44). In this study, receivers also marginally underestimated expressers' feelings of stress (*p* =.088, *d*=.14).

Making the recalled scenario even more specific, Study 3 (*N* = 1,006) specified the interaction partner (friend) and situation (in a conversation about how they are doing). In addition to measuring feelings of stress and self-importance, we also measured intentions to impress and connect (1-7), and liking (1-7).

We again found a person x expression interaction (*p*<.001) based on receivers overestimating expressers' feelings of self-importance (*p*<.001, *d*=.42). Receivers also underestimated expressers' feelings of stress (*p*=.021, *d*=.16). Consistent with this, receivers significantly overestimated expressers' intention to impress (*p* <.001, *d*=.38) and marginally underestimated expressers' intention to connect (*p*=.092, *d*=.12). Receivers' misperception of expressers' intention to impress (vs. connect) significantly mediated the receivers' misperception of expressers' feelings of self-importance (vs. stress) (95%CI=[-.43, -.16]). This all resulted in receivers inferring that expressers liked them less than expressers actually did (*p*<.001, *d*=.61).

To explore whether expressers of busyness can correct this misperception, Study 4 first informed a sample of MBA students (*N* = 89) about our observed effect and asked them to provide an alternative way to say *"I am busy"*—making it clear to the other that it is NOT their goal to impress them. We then randomly presented six of these generated alternatives (along with the sentence, "I am busy,") to a separate online sample of participants (*N* = 1,311). The participants were asked to imagine being told this by a friend and to rate their friend's stress, self-importance, intentions to connect and impress, and liking (1-7).

The results provided convergent evidence for the underlying process and, importantly, showed that—if people are made aware of the miscalibration—people can alter their expressions of busyness to more accurately convey their feelings, intentions, and liking.

In sum, this research identified a miscalibration between intentions and perceptions when people express busyness. Though others might see busyness as a status symbol that creates distance, our findings offer insight into the feelings that people actually want to convey and their reasons for telling others they are busy. The ultimate goal of communicating busyness is to connect, not impress.

REFERENCES

Alford, Henry (2012), "If I Do Humblebrag So Myself," https://www.nytimes.com/2012/12/02/fashion/bah-humblebrag-the-unfortunate-rise-of-false-humility.html.

Alicke, Mark D., Braun, James C., Glor, Jeffrey E., Klotz, M. L., Magee, Jon, Sederholm, Heather, and Siegel, Robin. (1992), "Complaining Behavior in Social Interaction," *Personality and Social Psychology Bulletin*, 18,286-295.

Bellezza, Silvia, Paharia, Neeru, and Keinan, Anat (2017), "Conspicuous Consumption of Time: When Busyness and Lack of Leisure Time Become a Status Symbol," *Journal of Consumer Research*, 44(1), 118-138.

Carroll, Joseph (2008), "Time Pressures, Stress Common for Americans," https://news.gallup.com/poll/103456/Time-Pressures-Stress-CommonAmericans.aspx.

Etkin, Jordan, Evangelidis, Ioannis, and Aaker, Jennifer (2015), "Pressed for Time? Goal Conflict Shapes How Time Is Perceived, Spent, and Valued," *Journal of Marketing Research*, 52, 394-406.

Gershuny, Jonathan (2005), "Busyness as the Badge of Honor for the New Superordinate Working Class," *Social Research*, 72, 287-314.

Hamermesh, Daniel S. (2019), "Time Use—Economic Approaches," *Current Opinion in Psychology*, 26, 1-4.

Kasser, Tim, and Sheldon, Kennon M. (2009), "Time Affluence as a Path toward Personal Happiness and Ethical Business Practice: Empirical Evidence from Four Studies," *Journal of Business Ethics*, 84(2), 243-255.

Kim, Jeehye Christine, Wadhwa, Monica, and Chattopadhyay, Amitava (2019), "When Busy is Less Indulging: Impact of Busy Mindset on Self-Control Behaviors," *Journal of Consumer Research*, 45(5), 933-952.

Mogilner, Cassie, Chance, Zoë, and Norton, Michael I. (2012), "Giving Time Gives You Time," *Psychological Science*, 23 (10), 1233-1238.

Rudd, Melanie (2019), "Feeling Short on Time: Trends, Consequences, and Possible Remedies," *Current Opinion in Psychology*, 26, 5–10.

Sezer, Ovul, Gino, Francesca, and Norton, Michael (2018), "Humblebragging: A Distinct—and Ineffective—Self-Presentation Strategy," *Journal of Personality and Social Psychology,* 114(1), 52-74.

Sharif, Marissa, Mogilner, Cassie, and Hershfield, Hal (2020), "The Relationship Between Being Time Poor or Time Rich and Life Satisfaction," *working paper.*

Wilcox, Keith, Laran, Juliano, Stephen, Andrew T., and Zubcsek, Peter Pal (2016), "How Being Busy Can Increase Motivation and Reduce Task Completion Time," *Journal of Personality and Social Psychology*, 110(3), 371-384.

I Will Get a Reward, Too: Disclosing the Referrer-Reward Increases Referring

Yanping Tu, University of Florida, USA
Zhihao Yu, University of South Florida, USA
Minzhe Xu, University of Florida, USA

EXTENDED ABSTRACT

Customer referral programs ("Refer a friend, reward yourself!") are prevalent nowadays because they can be a cost-effective way to acquire new customers (Berman 2016). While customer referral is an appealing idea to marketers, consumers are not enthusiastic—even among the most satisfied, only 29% participate (Decker 2018). One psychological barrier is that consumers view referral as a commercial activity, which conflicts with their communal relationship with friends (Grayson 2007), and worry that sending referral messages would make them look like salespersons.

How can companies alleviate the negative perception and increase referral rates? We propose a subtle change regarding the design of the referral message, which most companies automatically generate for customers to send to their friends. Interestingly, although referral programs may reward both customers and their friends (e.g., $10 for you, $10 for your friend), the referral messages usually mention referee-reward only but omit referrer-reward (only 10 out of the 50 brands we sampled disclosed).

Would disclosing referrer-reward in the referral message increase referrers' likelihood of sending the message? We hypothesize so, suggesting that disclosure enhances referrers' perception of the referral process as a communal/cooperative (vs. commercial) activity. This is because, first, disclosure is a gesture of cooperation (Baum and Critcher 2020). By being open and honest about their rewards, referrers make themselves vulnerable to their friends' judgment—an action that reflects trust, the foundation of cooperation. Second, disclosing referrer-reward weakens the "marketing message," which can reduce its sales-pitch feel (based on Attribution Theory; Kelley 1973). Third, in most cases, customers think of potential referees based on a genuine assessment of preferences/needs and pause only to worry that their friend may misread their intention. Disclosing referrer-reward helps customers "come clean" and steer clear of the ambiguity that may exist initially (John, Barasz, and Norton 2016).

Study 1a established the main effect in a field setting, using a 2 (referrer-reward: disclosed vs. undisclosed) between-participants design. Undergraduate students tried a coffee shop brand and received a referral opportunity—if their friend buys a coffee, both the self (i.e., the referrer) and the friend (i.e., the referee) will get a 20% discount for one cup of coffee. Participants then read a referral message that either mentioned the referee-reward only or both the referrer-reward and the referee-reward. We found that more people in the disclosed (vs. undisclosed) condition decided to send the message to their friends ($\chi^2(1) = 6.14$, $p = .01$). Study 1b replicated the main effect using a meal delivery service in a hypothetical setting ($\chi^2(1) = 5.31$, $p = .02$).

Study 2 tested the proposed mechanism by directly measuring perceptions of the referring action (communal vs. commercial). It also explored whether the main effect held in communal relationships with varying degrees of closeness. In a 2 (referrer-reward: disclosed vs. undisclosed) × 2 (referee: a close vs. new friend) between-participants design, participants first listed either a close friend or a new friend and indicated how close they felt to that person. They then imagined being a user of a music streaming service and learned about its referral program. Next, they read a referral message that disclosed their rewards or not and decided whether to send it to the listed person. Finally, participants rated whether they found the re-

ferral process a communal/cooperative activity in four questions (e.g., "This referral program offers a win-win opportunity for me and [the listed person]. (1 = strongly disagree, 7 = strongly agree)"). We found a main effect that disclosure increased the likelihood to refer ($\chi^2(1) = 4.66$, $p = .03$), and the effect was mediated by the communal perception of the referral process ($Z = 2.73$, $p = .01$; Iacobucci, 2012). Closeness did not moderate disclosure's effect on referral rate ($\beta = .02$, Wald = .02, $p = .90$), suggesting that this effect is generalizable to communal relationships that vary in closeness.

Study 3 tested a boundary condition—disclosure effect would be attenuated when the referral process already appears communal. In a 2 (referrer-reward: disclosed vs. undisclosed) × 2 (activity framing: control vs. communal) between-participants design, current players of Angry Birds 2 or Pokémon Go read an announcement from the game, asking them to invite their friends to join the game so that both can get some game currency. The announcement either emphasized the referrer's benefit (e.g., *"Want to earn gems in Angry Birds 2?"* control condition) or the communal benefit of friends playing the game together (e.g., *"Angry Birds 2 is more fun with friends!"* communal condition). Afterward, participants read a referral email, which either disclosed the referrer-reward or not, and indicated their willingness to refer to friends (1 = definitely No, 7 = definitely Yes). We found that disclosure increased willingness to refer in the control condition ($F(1, 157) = 5.78$, $p = .02$) but not in the communal condition (if anything, an unexpected marginal reversal; $F(1, 157) = 2.98$, $p = .09$).

Study 4 tested another boundary condition—disclosure would have a negative effect on referring when it signals a clear conflict-of-interest between the referrer and the referee. The study procedure was similar to that of study 1a, except that we orthogonally manipulated whether the referrer-reward came from the coffee company (no-conflict-of-interest) or from the referee's purchase (conflict-of-interest). We found that disclosure increased referring in the no-conflict-of-interest condition ($\chi^2(1) = 8.66$, $p < .01$) but marginally reduced referring in the conflict-of-interest condition ($\chi^2(1) = 3.25$, $p = .07$).

This research suggests an easy and costless way to improve the effectiveness of referral programs. It also demonstrates that disclosing the persuasion agent's benefit can enhance or diminish persuasion attempts, which complement the persuasion knowledge literature and the disclosure of conflict-of-interest literature that mainly focuses on the negative effect of disclosure (Campbell and Kirmani 2000; Sah and Loewenstein 2015).

REFERENCES

Baum, Stephen M and Clayton R Critcher (2020), "The Costs of Not Disclosing," *Current Opinion in Psychology*, 31 (February), 72-75.

Berman, Barry (2016), "Referral Marketing: Harnessing the Power of Your Customers," *Business Horizons*, 59 (1), 19-28.

Campbell, Margaret C and Amna Kirmani (2000), "Consumers' Use of Persuasion Knowledge: The Effects of Accessibility and Cognitive Capacity on Perceptions of an Influence Agent," *Journal of Consumer Research*, 27 (1), 69-83.

Decker (2018), "How to Close the Referral Gap," https://today.ttu.edu/posts/2018/05/close-referral-gap/.

Grayson, Kent (2007), "Friendship Versus Business in Marketing Relationships," *Journal of Marketing*, 71 (4), 121-39.

Iacobucci, Dawn (2012), "Mediation Analysis and Categorical Variables: The Final Frontier," *Journal of Consumer Psychology*, 22 (4), 582-94.

John, Leslie K, Kate Barasz, and Michael I Norton (2016), "Hiding Personal Information Reveals the Worst," *Proceedings of the National Academy of Sciences*, 113 (4), 954-59.

Kelley, Harold H. (1973), "The Process of Causal Attribution," American Psychologist, 28 (2), 107-28.

Sah, Sunita and George Loewenstein (2015), "Conflicted Advice and Second Opinions: Benefits, but Unintended Consequences," *Organizational Behavior and Human Decision Processes*, 130, 89-107.

What You Do Or What You Don't: The Impact of Framing on Goal Level Setting

Mirjam Tuk, Erasmus University Rotterdam, The Netherlands
Sonja Prokopec, ESSEC Business School, France
Bram Van den Bergh, Erasmus University Rotterdam, The Netherlands

EXTENDED ABSTRACT

Goals are a key determinant of motivated consumer behavior, and previous research showed that ambitious, specific goal levels have a positive impact on performance (Latham and Locke 1991; Locke & Latham, 2002). While the relationship between goal levels and performance has been studied extensively, much less is known about the *determinants* of goal level setting. What leads a consumer to decide to work out twice or three times per week? Why does a student decide to attend 15 or 17 out of 20 lectures? The aim of the current work is to fill this gap and to examine how we can nudge consumers into setting more ambitious goal levels.

We propose that how the goal level decision is framed has a strong impact on the eventual goal level set. Specifically, when setting a goal level, one can think about how much of a certain goal one wants to undertake (e.g., work out 3 out of 7 days per week; attend 18 out of 20 lectures; "inclusion frame") but also about how much one wants to forego (e.g., forego working out 4 out of 7 days; skip 2 out of 20 lectures; "exclusion frame"). We expect that consumers consistently set more ambitious goal levels when they are considering how much of a certain goal to forgo (exclusion frame). We argue and show that this decision to forgo goal-directed activities is inconsistent with the actual goal and highlights a discrepancy between the current self and the ideal self (as someone who strives to achieve goals). Self-discrepancies are characterized by experiences of negative feelings such as guilt, stress, worry, tension and discomfort, and in turn can trigger a drive to compensate (Allard and White 2015; Higgins 1987; Mandel et al., 2017). A key way to compensate for these negative feelings is by 'direct resolution' – directly dealing with the source of the discrepancy. Setting more ambitious goal levels is a way to directly resolve a self-discrepancy. Thus, we expect that a consideration of how many goal-directed activities to forego will make consumers feel bad about themselves and that they will compensate for this negative feeling by setting higher goals.

In Study 1A, we examine the impact of goal-level framing across 6 different real-world contexts. Specifically, we find that sophomore students plan to study 5.3% more hours when setting their study goal in an exclusion frame (e.g., when asked how many study hours to skip vs. to work on the course). Master students aim to attend 12.5% more seminars when indicating their seminar plans in an exclusion frame (e.g., when asked how many of the scheduled 20 seminars they planned to skip vs. attend). Mturk participants decide to save 17% more of their discretionary income when setting a savings goal in an exclusion frame. They also aim to solve 10.6% more puzzles in order to earn raffle tickets when asked to set their goal level in an exclusion (vs. inclusion) frame, and subsequently solve more puzzles. Finally, students plan to eat 13.5% more vegetables when setting their consumption plan in an exclusion frame, and their performance closely follows their goal level (all *d*'s > .30, *p*'s < .05). In Study 1B, we show that participants who set their goal level in an exclusion frame plan to evaluate 35% more pictures in order to raise money for charity and that they in turn evaluate 20.7% more pictures as compared to participants in the inclusion frame or in a neutral baseline condition. This suggests that it is the exclusion frame that drives goal levels up, rather than that it is the inclusion frame that moves goal levels down.

In Study 2, we aim to rule out a variety of alternative explanations based on the usage of reference points. We show that the framing effect emerges ($F(1,300) = 21.10$, $p < .0001$, $\eta_p^2 = .066$) irrespective of whether people indicate their goal level on an open-ended scale, use a slider scale where the slider is either positioned at the highest or the lowest possible goal level, or when they are asked to indicate a range of acceptable goal levels (e.g., a minimum and a maximum goal level). The framing effect is not influenced by any of these manipulations, evidenced by no main effect of response format ($F(1,300) = 0.18$, $p = .839$, $\eta_p^2 = .001$) and no interaction effect between response format and frame ($F(1,300) = 0.40$, $p = .668$ $\eta_p^2 = .003$).

The aim of Study 3 is to show that the framing effect crucially depends on the emergence of a self-discrepancy. Specifically, while excluding goal-directed activities feels bad and should cause compensatory responses, the same should hold for the inclusion of goal-undermining activities. For example, both skipping healthy meals and having unhealthy meals should make participants feel bad. Hence, in Study 3 we manipulate both the framing (have. vs. skip) and the nature of the activity (healthy vs. unhealthy food). We exposed participants to a scenario in which they were asked to imagine having a goal to improve their health. Their work-place cafeteria offers a healthy-lunch program where healthy lunches are offered for the next 30 days in addition to the regular offerings. Participants were then asked to think and indicate how many (un)healthy lunches they would plan to have/ skip. Next, we recoded all responses to reflect the number of healthy foods participants wanted to have and we found a significant interaction effect $F(1,478) = 126.20$, $p < .0001$, $\eta_p^2 = .21$. Participants plan to have more healthy meals when they decide how many healthy meals they want to skip (M = 25.44) vs. have (M = 22.37), but they also plan to have more healthy meals when they decide how many unhealthy meals they want to have (M = 24.83) vs. skip (M = 13.92), all p's < .001. This study shows that the framing effect depends on the emergence of a self-discrepancy, which will arise both when including goal-inconsistent acts and excluding goal-consistent acts.

The aim of study 4 is to provide further evidence for a self-discrepancy as the key driver of the effect. If the framing effect is driven by a need to compensate for feeling bad about foregoing goal-directed opportunities, then we should find that this effect reduces if the activity for which the goal level is set is less instrumental towards goal achievement. In the end, it is less bad for goal-achievement to skip acts that are only of limited instrumental value to the goal, then it is to skip acts that are of high instrumental value. In study 4, all participants were recruited as being 'employed' and were asked to imagine that they planned to take a course aimed to improve their work performance. Half of the participants read that the course was of incremental value to improving their core work competencies, while the other half read that the course was of key importance to improve their core work competencies. Next they were asked to indicate how many of the 20 course sessions they would plan to attend / skip. We find that the framing effect crucially depends on the instrumentality manipulation, as indicated by a significant interaction effect between frame and instrumentality, $F(1,291) = 3.77$, $p = .053$, $\eta_p^2 = .013$. Specifically, while participants set higher goal levels in the exclusion frame (M = 17.13) than in the inclusion frame (M = 15.65) in the high instrumental condition, there is no difference between

exclusion frame (M = 15.75) and inclusion frame (M = 15.71) in the low instrumental condition.

In study 5 we aim to provide further evidence for a compensatory mechanism based on the experience of a self-discrepancy. Specifically, as Mandel et al. (2017) argue, a self-discrepancy can be resolved in different ways. Consumers can directly compensate for the experience of the self-discrepancy (e.g., through setting higher goal levels, as we consistently find), but they can also engage in other strategies. One effective strategy to cope with self-discrepancies is fluid compensation – the notion that affirming the self in an unrelated domain can nevertheless effectively reaffirm one's sense of the self as a capable, worthy individual. If the self is reaffirmed in an unrelated domain, then subsequently the need for other forms of compensation diminishes. This reasoning leads us to expect that confronting participants with a self-affirmation in an unrelated domain should reduce the need for compensatory responses and consequently reduce the impact of the exclusion frame on the goal level. We examined the impact of self-affirmation in Study 5. Specifically, participants read that they had the goal to improve their physical health and found a 30-session fitness course. However, they also realized that it might be difficult to attend to all the sessions [**as they occasionally engaged in charity activities for their local community**]. The latter part in bold was only included in the self-affirmation present condition. Next, half of the participants were asked to indicate how many sessions they planned to attend, while the other half were asked to indicate how many sessions they planned to skip.

Results show that the self-affirmation reduces the emergence of the framing manipulation, as evidenced by a marginally significant interaction effect, $F(1,191) = 3.56$, $p = .061$, $\eta_p^2 = .019$. Specifically, participants set more ambitious goal levels in the exclusion (M = 25.02) condition as compared to the inclusion condition (M = 20.52) in the self-affirmation absent condition. Contrary, goal levels were comparable in the exclusion (M = 22.85) and inclusion (M = 21.06) conditions in the self-affirmation present conditions. Hence, study 5 provides further evidence for the notion that a self-discrepancy drives the emergence of a framing effect, which is much less pronounced when the self is affirmed in a completely different context.

Finally, in Study 6, we aim to provide evidence for the process through mediation. However, we do not expect a traditional mediation pattern. Specifically, we expect that the impact of feelings on goal level crucially depends on the framing condition one is in. In the exclusion frame, consumers are expected to feel bad about skipping goal-directed activities. This experience of feeling bad in turn is expected to drive them to compensate and set higher goal levels. Hence, we expect a negative relationship between feelings and goal level in the exclusion frame. Contrary, people are generally expected to feel good in the inclusion frame, and not to experience a drive to compensate. Contrary, based on previous work (Cameron, Bertenshaw, and Sheeran 2018) we would expect that there is a positive relationship between feelings and goal level within the inclusion frame. In other words, we expect the impact of the mediator (feelings) on the DV (goal level) to depend crucially on the level of the IV (inclusion vs. exclusion frame). We tested for this effect in Study 6. Specifically, participants were again told that they had the goal to eat healthier and that their workplace cafeteria offered a 30-day healthy lunch program. Next, they read that they decided on how many healthy lunches to have or to skip, and were asked to indicate

how they felt about deciding to **skip / have** healthy meals (100-pt scale where 0 = very bad – 100 = very good). Then they were asked to indicate their goal level, and lastly evaluated how they felt about their plan. Results showed that people felt much worse about making an exclusion vs. inclusion decision, $t(121.45) = 8.23$, $p < .001$, $d = 1.43$ (corrected for inequalities in variance) but set higher goal levels in the exclusion vs. inclusion condition $t(111.45) = 1.88$, $p = .063$, $d = 0.33$ (corrected for inequalities in variance). Participants still felt slightly worse about their goal level after having made the decision in the exclusion frame, but this effect was much smaller than their feelings before making the decision, as evidenced by a significant repeated measures ANOVA, $F(1,130) = 36.19$, $p < .001$, $\eta_p^2 = .22$ (see Table 1 for all means).

Moreover, Process Model 74 (Preacher et al., 2007) confirms the existence of a positive indirect effect of the inclusion frame through feelings on goal level, and a negative indirect effect of the exclusion frame through feelings on goal level (see Figure 1).

Hence, this study shows that the exclusion frame makes people feel worse, which in turn prompts them to set higher goal levels.

In sum, the current work makes important contributions. First, where previous research studied the impact of (externally provided) goal levels on performance, we shed light on how consumers come to set their own goal levels. We show that a simple change in how the goal level decision is framed (as an exclusion rather than an inclusion decision) can lead to significantly higher goal levels, which in turn also lead to higher performance. Second, we contribute to the framing literature by showing that framing can influence goal level and trigger compensatory responses. Finally, we believe that our work has important and directly relevant practical implications. The framing manipulation we employed is easy to implement in various contexts where consumers set goal levels for themselves, such as when making savings decisions, setting exercise goals or setting goals to eat healthier. The current work suggests that simply prompting consumers to make an exclusion decision can significantly increase their goal levels, with direct downstream consequences on performance.

REFERENCES

Allard, T. and K. White (2015), "Cross-Domain Effects of Guilt on Desire for Self-Improvement Products," *Journal of Consumer Research,* 42, 401-419.

Higgins, E. T. (1987), "Self-Discrepancy - a Theory Relating Self and Affect," *Psychological Review*, 94, 319-340.

Locke, E. A. and G. P. Latham (2002), "Building a Practically Useful Theory of Goal Setting and Task Motivation - A 35-Year Odyssey," *American Psychologist*, 57, 705-717.

Locke, E. A., L. M. Saari, K. N. Shaw, and G. P. Latham (1981), "Goal Setting and Task-Performance - 1969-1980," *Psychological Bulletin*, 90, 125-152.

Mandel, N., D. D. Rucker, J. Levav, and A. D. Galinsky (2017), "The Compensatory Consumer Behavior Model: How Self-Discrepancies Drive Consumer Behavior," *Journal of Consumer Psychology*, 27, 133-146.

Preacher, K. J., D. D. Rucker, and A. F. Hayes (2007), "Addressing Moderated Mediation Hypotheses: Theory, Methods, and Prescriptions," *Multivariate Behavioral Research*, 42, 185-227.

Alexa or Alex or Neither? Exploring Gender-Neutral
Voices, Gender Framing and Consumer Judgments of Synthetic Voices

Broderick Lee Turner, Virginia Tech, USA
Brett Christenson, Pennsylvania State University, USA

EXTENDED ABSTRACT

At any given time, more than a billion consumers are interacting with smart products, such as smart-phones and smart-speakers which are enabled with synthetic voice-prints, i.e., computer-generated voices unique to each device (Perez, 2019). These voice-prints are an aesthetic product characteristic which is made salient to the consumer through social interaction, similar to a human agent (Reeves and Nass, 1996). Similar to human characteristics which influence the perception of personality, a product's aesthetics are a major determinant of its personality (Aaker, 1997). For example, round shapes, curvy lines, and more colors indicate femininity, while angular shapes, straight lines, and darker tones are often categorized as masculine (Van Tilburg, Lieven, Herrmann, and Townsend 2015).

With regard to voice-prints, research indicates people very easily and accurately perceive information about a speaker, such as its gender (Whiteside, 1998). The pitch of a voice very reliably signals an individual's gender, with female voices being higher pitched than males (Kreiman & Sidtis, 2011). However, pitch can be manipulated and firms can create a synthetic voice with a pitch that sounds female or male. Moreover, firms can choose to refer to their voices with gendered pronouns (he and she) and names (Apple's Siri, Amazon's Alexa), which we define as gender-framing. However, given the societal recognition of non-binary gender identities, it is not necessary for firms to limit their synthetic voices to a gender binary in either pitch or framing.

Prior work on vocal communication indicates that when one hears a low-pitch voice, they tend to assume the voice is male whereas when one hears a high-pitch voice, they assume the speaker is female. However, with the control afforded in creating a synthetic voice-print, firms can generate voices with pitches which may not be perceived as male- or female-pitched. An as yet developed alternative would be a neutrally pitched, and therefore gender-neutral, voice.

Moreover, firms can decide to simply frame these voices as gender-neutral, such as Google choosing to refer to their synthetic voice as simply the Google Assistant.

The goal of this research is to provide the initial entrée into understanding the effect of gender neutral-pitch and gender neutral-framing on consumer judgments. We focus on consumer perceptions of both warmth and competence. These judgments are important because they are considered universal dimensions of social perception (Fiske, Cuddy, & Glick, 2007) and have been shown to explain more than 80 % of the variance of one's dispositional judgments of others (Wojciszke, Bazinska, & Jaworski, 1998). Warmth reflects perceived intent, i.e., the likelihood that another means one help or harm. Competence reflects one's ability to carry out this intent and is often measured in dominance, confidence and intelligence.

Prior research on voice pitch does not make strong predictions for how one might respond to a gender-neutral voice. This work does show speakers with lower pitch are typically perceived as being more warm *and* more competent than speakers with higher voice pitch (Klofstad, Anderson, & Nowicki, 2015; McAleer, Todorov, & Belin, 2014; Tigue, Borak, O'Connor, Schandl, & Feinberg, 2012; Tsantani, Belin, Paterson, & McAleer, 2016). However, female voices are seen as warmer in vocal quality than men, while males are often seen as more competent (Ko, Judd and Stapel 2009; Oleszkiewicz et al.

2017). Thus, this research makes two contributions. This is the first research in marketing, or related fields such as psychology, to explore gender-neutral voices. This is made possible by new developments in technology which make the creation of synthetic voices possible for testing. Indeed we create our own gender- neutral voice as original stimuli. Second, this research provides the first data to a novel question, what is the effect of gender-neutral pitch and gender-framing of synthetic voices on perceptions of warmth and competence?

Creating A Gender-Neutral Synthetic Voice

For humans, the pitch of a voice, or how high or low it sounds, is determined by the biological structure of the throat (Baken, 1987; Tusing & Dillard, 2000). The anatomy of the vocal cords limits a person's ability to modulate their voice pitch, creating fundamental acoustic differences between the male and female voices, most notably in its pitch (Childers and Wu, 1991). To create a gender-neutral synthetic voice we enlisted the help of a professionally trained audio technician who recorded a human female and a human male speaking the same prepared statements, matched for timing so that all phrases were spoken at the same rate and volume.

Next, the pitch of the recordings was manipulated by software to measure and adjust the fundamental frequency (Praat v5.3.56, Boersma & Weenink, 2013). In line with recommended settings for pitch analysis, typical male pitch range is 75-200 Hertz (Hz), with the male recording having a fundamental frequency inside this range (Mmale = 85.38 Hz). Typical female pitch range is 100-300Hz, with the female recording having a pitch inside this range (Mfemale = 142.85 Hz, Baken, 1987; Tusing & Dillard, 2000). Therefore, both recordings had a fundamental frequency within the acceptable range for a male and female voice, respectively. Additionally, the pitch shift tool was used to adjust the pitch of each recording to be on the border of their natural range, but overlapping with the opposing sex range. These overlapping recordings were then combined to form an average, or genderless recording which matched the speed and volume of the male and female voices while also being in a pitch range ambiguous in terms of gender (Mneutral = 107.54 Hz). In a pre-test using 104 participants from an online panel (mTurk), the voices were tested to ensure they were accurately perceived as male, female, and gender neutral. Participants were randomly assigned to listen to one of the prepared recordings and then rate the voice in terms of its pitch on a 7-point scale (1 = Very Low Pitched; 7 = Very High Pitched).

Comparison of the means between voices indicates each recording was accurately perceived along the desired gender lines. The female voice was rated highest in pitch (Mfemale = 5.37), and was significantly greater than the neutral voice (Mneutral = 3.66), which was significantly higher in pitch than the male voice (Mmale = 3.01, $F(2, 132) = 19.86$, $p = < .001$, $\eta^2 p = .231$). Important to the current study, the gender neutral voice was not rated significantly different from the midpoint of the 7-point scale for pitch, indicating it was rated equally as male and female.

Study 1: Gender Framing Effect On Gender Neutral-Pitch Voices

The goal of this pre-registered study is to test the effect of gender framing on the perception of warmth and competence. This study

employed a single factor (Framing: Male vs. Female) between-subject design. The outcome variables of interest are participants' perception of warmth and competence.

Method

Participants. We recruited one hundred and eight US-based consumers from an online panel who owned at least one product with a synthetic voice (45% Female; $M_{age} = 36.8$, $SD = 11.6$) participated in exchange for a nominal payment.

Materials and Procedures. We informed participants they would answer questions about a digital assistant. All participants were then played 4 short snippets of a gender-neutral synthetic voice (107MHZ). The voice was described as the voice of a male or female digital assistant.

After listening to the voices, participants answered their agreement with how they described the voice (1 = Strongly Disagree, 7 = Strongly Agree) on dimensions of warmth (Sociable, Caring, Unfriendly (reverse-scored), Insensitive (reverse-scored), Warm; $\alpha = .85$) and competence (Capable, Skilled, Lazy (reverse-scored), Disorganized (reverse-scored), Competent, $\alpha = .78$). Additionally, participants indicated their perception of the voice's femininity (1 = Very Feminine, 7 =Very Masculine), speed (1 = Very slow speaking, 7 = Very fast speaking), volume (1 = Very Quiet, 7 = Very Loud), and pitch (1 = Very low pitched, 7 = Very high pitched).

Results

Manipulation Checks. Regardless of framing, participants rated the voice as similar in femininity ($t(104) = 1.18$, $p = .24$), speed ($t(104) = 1.49$, $p = .14$), volume ($t(104) = .22$, $p = .82$). Importantly, when we ask people to consider the pitch, effectiveness of the gender framing manipulation should alter the perception of the voice. If participants are following the manipulation, then the perception of a voice with a pitch that falls lower then then the expected female pitch range, and higher than the expected male-pitch range should be malleable and dependent upon the gender-framing. Expectedly, when we describe the voice as male, participants indicate that the pitch is high ($M = 4.46$, $SD = 1.34$, one-sample t-test against the midpoint of the scale, $t(51) = 2.52$, $p = .014$) and the female voice is described as low ($M = 3.35$, $SD = 1.60$, one-sample t-test against the midpoint of the scale, $t(51) = 2.95$, $p = .005$). This difference in pitch perception indicates the effectiveness of our gender-framing manipulation.

Warmth and Competence. A repeated-measure ANOVA with gender framing (male vs. female) on measures of warmth and competence revealed no interaction with gender framing and the measurement of warmth or competence ($F(1, 104) = 2.66$, $p = .11$). However there was a main effect of the within-subject rating of warmth and competence ($F(1, 104) = 26.28$, $p < .001$, as participants rated the voices as more competent ($M = 4.52$, $SD = 1.32$) than warm ($M = 3.93$, $SD = 1.53$). Moreover, there was a main effect of the between-subject gender framing ($F(1, 104)= 9.77$, $p = .002$), such that the male-frame was rated more positively ($M = 4.59$, $SE = .17$), than the female-frame ($M = 3.84$, $SE = .17$). Indeed, when comparing the gender-framing on each measure individually, a male-frame leads to a higher warmth rating ($M = 4.39$, $SD = 1.50$) than the female frame ($M = 3.45$, $SD = 1.42$, $t(104) = 3.328$, $p = 0.001$) , and the male-frame ($M = 4.80$, $SD = 1.27$) also leads to higher competence rating than the female frame ($M = 4.23$, $SD = 1.33$, $t(104) = 2.26$, $p = 0.026$). The male-framing of a gender neutral voice leads to more positive evaluations of both warmth and competence. Given consumers do alter their perceptions of the voice's warmth and competence, the next study aims to both replicate this effect, and test it against gender-neutral framing and no framing.

Study 2: Gender Framing Effect Replication And Extension

The goal of this study is to test the effect of gender framing on the perception of warmth and competence. Importantly, it considers if the effect from Study 1 was simply a function of the male-framing, and if this can be extended to other terms. We included a framing of "gender neutral" and no framing control to establish a baseline. To test this study employed a single factor (Framing: Male vs. Female vs. Gender-Neutral vs. Control) between-subject design. The outcome variables of interest are participants' perception of warmth and competence.

Method

Participants. We recruited two hundred and seven US-based consumers from an online panel who owned at least one product with a synthetic voice. (46% Female; $M_{age} = 37.1$, $SD = 11.4$) participated in exchange for a nominal payment.

Materials and Procedures. We again informed participants they would answer questions about a digital assistant. All participants were then played 4 short snippets of a gender-neutral pitched synthetic voice (107 MHZ). The voice was presented as a male or female or gender- neutral digital assistant, or simply as a digital assistant (control). After listening to the voices, participants answered their agreement with how they described the voice using the same measures from Study 1 on dimensions of warmth ($\alpha = .83$) and competence ($\alpha = .88$). Again, participants indicated their perception of the voice's gender (1 = Very Feminine, 7 =Very Masculine), pitch (this voice is low pitched, this voice is high pitched, 1 = Strongly Disagree, 7 = Strongly Agree), speed (1 = Very slow speaking, 7 = Very fast speaking) and volume (1 = Very Quiet, 7 = Very Loud).

Manipulation Checks. Regardless of framing, participants rated the voice as similar in femininity ($F(3, 202) = .88$, $p = .45$), speed ($F(3, 202) = .39$, $p = .76$), volume ($F(3, 202) = .68$, $p= .57$). Again, when we ask people to consider the pitch the gender framing manipulation alters this perception of the voice. When we describe the voice as male, participants indicate that the pitch is higher-pitched ($M = 3.77$, $SD = 1.82$) than when it is described as gender-neutral ($M = 3.12$, $SD = 1.53$, $t(101) = 1.86$, $p = 0.05$, not labeled ($M = 2.94$, $SD = 1.65$, $t(101) = 1.86$, $p =0.05$), or described as female ($M = 2.56$, $SD = 1.80$, $t(102) = 3.41$, $p < 0.001$). The perception of pitch for the female described voice is not statistically different from the control condition ($t(101) = 1.11$, $p = .27$), nor the gender-neutral condition ($t(101) = 1.70$, $p = .09$), and the control condition and gender-neutral conditions do not differ from each other ($t(100) = .57$, $p = .57$).

This finding gives us some insight that male (vs. female, gender-neutral or control) gender- framing may change the perception of voice-pitch.

Warmth and Competence. A repeated-measure ANOVA with gender framing (male, female, gender-neutral or control) on measures of warmth and competence revealed no interaction with gender framing and the measurement of warmth or competence ($F(3, 410) =.29$, $p = .83$). However there was a main effect of the within-subject rating of warmth and competence ($F(1, 410) = 23.64$, $p < .001$, as participants rated voices, regardless of framing as more competent ($M = 4.94$, $SD = 1.21$) than warm ($M = 3.96$, $SD = 1.39$). Moreover, there was a main effect of the between-subject gender framing ($F(3, 410) = 6.86$, $p < .001$), such that the male-frame was rated more positively ($M = 4.99$, $SD = 1.11$), than the female-frame ($M = 4.15$, $SD = 1.07$, $t(102) = 3.50$, $p < .001$), the gender-neutral framing ($M = 4.49$, $SD = 1.16$, $t(101) = 1.85$, $p = .06$), or the control framing ($M = 4.27$, $SD = 1.23$, $t(103) = 2.75$, $p = .007$), whereas the female, gender-neutral, and control framing are not statistically different from each other (ps >.12, see figure 3 for a decomposition of the effects between warmth and competence).

General Discussion And An Invitation To Replication And Extension

The two preceding studies offer several contributions as well as invitations for future work. First, these studies build on prior work showing that the voice we hear impacts our perceptions of the person speaking. However, these studies seek to expand the literature to include the role gender perception may play in the attributes associated with a product. We produce evidence that both the gender, indicated by pitch, as well as gender framing can play a role in the attributes which are applied to a voice. Additionally, we provide initial evidence for the effect of a non-binary gender voice and framing. The pervasiveness of gender stereotypes has been extensively documented in the psychology literature (Nass, Moon, Green, 1997). In this work, we uncover that male gender framing raises both warmth and competence judgments for a gender-neutral voice. This novel finding provides a starting point for a new stream of research.

However, this work still leaves many questions to be answered. Primarily, what mechanism explains this effect? Instead of offering a speculative candidate mechanism, we want to invite other researchers to replicate this work. Would the effect hold up with populations outside of the US, under more relaxed criteria, or in a real-world setting and not in the confines of an online experiment? While we begin the current exploration, we invite collaboration. To help facilitate this work, all of our manipulations and data are public (https://osf.io/jezp5/).

REFERENCES

Aaker, Jennifer L. (1997), "Dimensions of brand personality," *Journal of Marketing Research* 34, 3, 347-356.

Baken, R. J., and Robert F. Orlikoff (1987), "The effect of articulation on fundamental frequency in singers and speakers," *Journal of Voice,* 1, 1, 68-76.

Boersma, Paul, and David Weenink (2018), *Praat: Doing phonetics by computer [Computer program]. Version 6.0. 37*," Retrieved February 3, 2018.

Fiske, Susan T., Amy JC Cuddy, and Peter Glick (2007), "Universal dimensions of social cognition: Warmth and competence," *Trends in Cognitive Sciences* 11, 2, 77-83.

Klofstad, Casey A., Rindy C. Anderson, and Stephen Nowicki (2015), "Perceptions of competence, strength, and age influence voters to select leaders with lower-pitched voices," *PloS one* 10, 8.

Ko, Sei Jin, Charles M. Judd, and Diederik A. Stapel (2009), "Stereotyping based on voice in the presence of individuating information: Vocal femininity affects perceived competence but not warmth," *Personality and Social Psychology Bulletin,* 35, 2, 198-211.

Kreiman, Jody, and Diana Sidtis, *Foundations of voice studies: An interdisciplinary approach to voice production and perception*, John Wiley & Sons, 2011.

McAleer, Phil, Alexander Todorov, and Pascal Belin (2014), "How do you say 'Hello'? Personality impressions from brief novel voices," *PloS one,* 9, 3.

Nass, Clifford, Youngme Moon, and Nancy Green (1997), "Are machines gender neutral? Gender-stereotypic responses to computers with voices," *Journal of Applied Social Psychology,* 27, 10, 864-876.

Oleszkiewicz, Anna, Katarzyna Pisanski, Kinga Lachowicz-Tabaczek, and Agnieszka Sorokowska (2019), "Voice-based assessments of trustworthiness, competence, and warmth in blind and sighted adults," *Psychonomic bulletin & review,* 24, 3, 856-862.

Perez, Sarah (2019), "Report: Voice Assistants in use to triple to 8 billion by 2023," Retrieved from https://techcrunch.com/2019/02/12/report-voice-assistants-in-use-to-triple-to-8-billion-by-2023/, April 20, 2019.

Reeves, Byron, and Clifford Ivar Nass (1996), *The Media Equation: How People Treat Computers, Television, and New Media Like Real People and Places*, Cambridge university press.

Tigue, Cara C., Diana J. Borak, Jillian JM O'Connor, Charles Schandl, and David R. Feinberg (2012), "Voice pitch influences voting behavior," *Evolution and Human Behavior* 33, 3, 210-216.

Tsantani, Maria S., Pascal Belin, Helena M. Paterson, and Phil McAleer (2016), "Low vocal pitch preference drives first impressions irrespective of context in male voices but not in female voices," *Perception,* 45, 8, 946-963.

Tusing, Kyle James, and James Price Dillard (2000), "The sounds of dominance. Vocal precursors of perceived dominance during interpersonal influence," *Human Communication Research,* 26, 1, 148-171.

Van Tilburg, Miriam, Theo Lieven, Andreas Herrmann, and Claudia Townsend (2015, "Beyond "pink it and shrink it" perceived product gender, aesthetics, and product evaluation," *Psychology & Marketing*, 32, 4, 422-437.

Wojciszke, Bogdan, Roza Bazinska, and Marcin Jaworski (1998), "On the dominance of moral categories in impression formation," *Personality and Social Psychology Bulletin,* 24, 12, 1251-1263.

Holding on for a Hero: Effects of Heroes in Mitigating
Mortality Threats on Unhealthy Consumption

Aulona Ulqinaku, Leeds University Business School, UK
Gulen Sarial Abi, Bocconi University, Italy
Elaine Louise Kinsella, University of Limerick, Ireland

EXTENDED ABSTRACT

We provide a novel avenue for mitigating the unhealthy effects of mortality threats on consumption. We investigated the possibility that heroes help people cope with mortality salience. We specifically tested the role of heroes in mitigating mortality salience (MS) threats by testing their effects on intentional and real compensatory consumption.

Meaning is "the expected relationships or associations that human beings construct and impose on their worlds" (Heine, Proulx, & Vohs, 2006, p. 90). Meaning can be disrupted by incoming information and by experiences that violate people's beliefs and values (Proulx & Inzlicht, 2012). According to the meaning maintenance model (MMM; Heine et al., 2006), Terror Management Theory (TMT; Greenberg, Pyszczynski, & Solomon, 1986), and Protection Motivation Theory (PMT; Rogers, 1975), when people's sense of meaning is threatened, they attempt to reestablish their existing mental structures. Some strategies to reestablish existing mental structures include reinforcing social connections (Wildschut, Sedikides, Arndt, & Routledge, 2006), including membership in enduring structures such as religions and nations (Arndt, Cook, & Routledge, 2004); connecting the past with the present and the future (Sarial-Abi, Vohs, Hamilton, & Ulqinaku, 2017); participating in mundane routines (Heintzelman & King, 2018); purchasing nostalgic (Routledge et al., 2011) and vintage products (Sarial-Abi et al., 2017); engaging in conspicuous consumption (Lee & Shrum, 2012); and believing in supernatural agents such as angels, devils, jinns, ancestor spirits, and God (Jong, Halberstadt, & Bluemke, 2012; Kay, Gaucher, Napier, Callan, & Laurin, 2008).

Despite the importance of psychological threats and extant research on how individuals cope when they are psychologically threatened, previous research lacks an understanding of how heroes may be used to cope with psychological threats. While previous research in psychology suggests that heroes help individuals to cope with threats (Kinsella, Igou, & Ritchie, 2017), research in psychology lacks empirical evidence on how heroes help individuals to cope with threats. In this research, we propose that heroes help individuals to cope with threats by bolstering personal power (i.e., the power to act in autonomy and to control one's own resources; Van Dijke & Poppe, 2006).

Heroes and Meaning in Life

The concept of heroes has existed since ancient times and remains important in modern society. In a survey conducted in 25 countries, 66% of people reported having at least one hero in their lives (Kinsella, Ritchie, & Igou, 2015a). Heroes are important for redefining individuals' well-being in contemporary culture (Franco, Efthimiou, & Zimbardo, 2016), and they have psychological importance to humankind (Sullivan & Venter, 2005).

While heroes are common in people's everyday lives, they are not easy to conceptualize theoretically (Franco, Blau, & Zimbardo, 2011; Kinsella et al., 2015a). Recent research identified the prototypical features of heroes (e.g., brave, fearless, selfless, self-sacrificing, honest, strong, and having moral integrity; Kinsella et al., 2015a) and their key peripherals (e.g., powerful, risk-taker, fearless, caring, exceptional, and strong).

Heroes provide psychological resources to people (e.g., helping individuals with self-identification, Veen & College, 1994; affecting self-perceptions, Sullivan & Venter, 2005; and reducing death thought accessibility; McCabe, Carpenter, & Arndt, 2016).

Thinking about heroes helps individuals identify with them more, thus reducing death-related thoughts (McCabe et al., 2016). Heroes can enhance meaning both in the presence and absence of a meaning threat (Kinsella et al., 2017).

The present research extends previous work in this domain (e.g., Coughlan, Igou, van Tilburg, Kinsella, & Ritchie, 2017; Kinsella et al., 2017), by examining one mechanism through which heroes provide psychological resources to people. Specifically, we examine whether heroes can serve to bolster *personal power* (i.e., the power to act in autonomy and to control your own resources; Van Dijke & Poppe, 2006), thus enhancing meaning in life or helping reestablish it when one's sense of meaning is threatened.

Heroes, Power, and Meaning in Life

We suggest power plays an important role in the relationship between heroes and individuals' meaning in life. This relationship exists for two main reasons: (1) heroes are perceived as figures vested with power (Becker, 1973; Kinsella et al., 2015a; Lash, 1995) and (2) power is an important psychological factor. Sense of power is defined as the ability to achieve what the individual desires without being influenced (Galinsky, Magee, Gruenfeld, Whitson, & Liljenquist, 2008; Van Dijke & Poppe, 2006). It is a need to act for yourself, to control the environment, to overcome resistance, to reach goals, and to pursue autonomy (Van Dijke & Poppe, 2006). We want to differentiate this from social power, which is defined as the ability to make others behave in a way they would not otherwise behave (e.g., a CEO over the employees; Van Dijke & Poppe, 2006). Although these two types of power can coexist in life (Lammers, Stoker, & Stapel, 2009), personal power is related to autonomy over one's own actions and resources, and social power is more linked to control of other people's actions and resources.

An enhanced sense of power can protect individuals from threats (Anderson & Berdahl, 2002; Kay et al., 2008). Individuals with a higher sense of power demonstrate a lower tendency to feel threatened (Anderson & Berdahl, 2002); they are less bothered about what happens in their social environments because they perceive themselves to be independent and free from others (Lammers et al., 2009). Perceptions of power increase meaning in life (Anderson & Berdahl, 2002; Galinsky, Rucker, & Magee, 2015; Keltner, Gruenfeld, & Anderson, 2003; Rousseau & Garcia-Retamero, 2007). Accordingly, when one's sense of personal control is threatened, people start believing in someone or something else (e.g., God or an institution) perceived to be vested with much power.

We suggest heroes also have power that helps individuals to enhance meaning in life. What kind of power do heroes have to help individuals enhance meaning in life?

While heroes are vested with power (Becker, 1973; Kinsella et al., 2015a; Lash, 1995), the type of power heroes are vested with must be specified. Research suggests two types of power: social and personal (Lammers et al., 2009). Heroes have a high degree of autonomy, which is the main feature of personal power, and they em-

ploy their power for independence over their actions rather than to push others to do something (Lash, 1995). Applying this logic here, we propose the personal power of heroes can help people enhance meaning in their lives. Hence, we refer to personal power when we discuss sense of power.

How can heroes' power help individuals enhance their meaning in life? During an interaction with a hero, the individual feels a strong connection leading to vicariously experienced attributes. These vicarious attributes lead to a change in behavior (Holt & Thompson, 2004). Simply by being reminded of a hero, some aspects of the hero are transferred to individuals. For example, reminders of heroes in product packages bring to mind safety and protection related to the product on which the hero label is placed (Masters & Mishra, 2019). The protective traits of heroes can be extended to the product if a hero label is attached to it; hence, the product is vested with heroic traits (i.e., protectiveness and safety). Applying this logic here, if heroes have personal power, even a mere association with the hero would be sufficient to enhance individuals' sense of power, analogous to the findings of Goldstein and Hays (2011) where mere associations with a powerful person (e.g., a CEO) would enhance someone's sense of power.

Pilot Study

In an observational pilot study on Twitter, after several terrorist attacks that have occurred in 2016-2017 (N = 154,390 tweets) we noticed that in tweets that used the hashtag #hero, the MS rating (measured with LIWC2015) was lower (β = -.999, p <.001). These results provided preliminary evidence that reminder of heroes might be related to lower MS.

Study 1

In Study 1, we tested our prediction that hero reminders affect individuals' meaning in life by investigating how individuals who are (vs. are not) reminded of heroes need to search less (vs. more) for meaning in life. Fifty-two undergraduate students participated in a European university laboratory session in exchange for course credit. participants were first randomly assigned to either the hero reminder or the non-hero reminder condition (Kinsella et al., 2015a). Then participants were asked to specify three people they knew who shared the characteristics of the person described in the text and to briefly describe them. In the second part of the study, to measure the search for meaning in life, we used the Search for Meaning in Life scale (Steger et al., 2006).

Results

As expected, participants in the hero reminder condition scored lower in Search for Meaning in Life compared to those in the non-hero reminder condition (M_{Hero} = 4.75, SD_{Hero} = 1.20 vs. $M_{Non-Hero}$ = 5.36, $SD_{Non-Hero}$ = .89, t(50) = 2.10, p = .04, Cohen's d = 0.63, r = .30).

Study 2

In this study, we tested the prediction that hero reminders positively influence individuals' sense of power. One hundred and ten students (27 male) participated in a university laboratory session in exchange for course credit. First, they were randomly assigned to either the hero reminder or the non-hero reminder condition as in Study 1. Then participants were told the first part of the study was over and they would begin a second part, unrelated to the former one. We administered the 8-item Sense of Power scale adapted from Anderson and Galinsky (2006). After that, participants indicated age and gender.

Results and Discussion

Purpose in life. We predicted participants in the hero reminder condition would score higher on purpose in life than participants in the non-hero reminder condition would. As expected, purpose in life was higher in the hero reminder condition than it was in the non-hero reminder condition (M_{Hero} = 3.56, SD_{Hero} = .69 vs. $M_{Non-Hero}$ = 3.20, $SD_{Non-Hero}$ = .93, t(108) = 2.35, p = .02, Cohen's d = 0.45, r = .22).

Perceived sense of power. As predicted, participants in the hero reminder condition scored higher on perceived sense of power than those in the non-hero reminder condition did (M_{Hero} = 3.82, SD_{Hero} = 0.60 vs. $M_{Non-Hero}$ = 3.55, $SD_{Non-Hero}$ = 0.84, t(108) = 1.99, p = .049, Cohen's d = 0.38, r = .19).

Perceived sense of power as the underlying mechanism. We next tested whether a perceived sense of power mediated the effect of the hero reminder (vs. the non-hero reminder) condition on purpose in life. The results of PROCESS revealed a significant indirect effect via perceived sense of power (β = 0.12, 95% CI: [.01, .28]). The results supported our prediction for the mediating effect of the perceived sense of power on purpose in life.

Study 3a

In study 3, we demonstrated that reminder of heroes (vs. acquaintances) helps individuals mitigate compensatory consumption during MS. This study used a four cells design: 2 (MS, control) x 2 (hero, acquaintance), where participants first wrote about MS (vs. dental pain; Burke et al., 2010). Next, participants described a hero (vs. acquaintance). To measure compensatory consumption, we used unhealthy food consumption (Ferraro et al., 2005; Mandel & Smeesters, 2008). Hence, we asked participants to imagine having a bowl of M&Ms (unhealthy) and one of grapes (healthy) in front of them and to take as many as they wanted (our dependent variable was the number of grapes minus M&Ms hypothetically consumed As predicted, results revealed a marginal two-way interaction effect of meaning threat (threat, control) and heroism (hero, no-hero) and on compensatory consumption, (F(1, 196) = 3.002, p = .08). Supporting our prediction, participants who were exposed to the meaning threat condition showed lower values of healthy compensatory consumption (and hence higher unhealthy compensatory consumption) when they were not reminded of heroes (i.e., acquaintance reminder; $M_{Threat-Hero}$ = 22.38, $SD_{Threat-Hero}$ = 156.22 versus $M_{Threat-No-hero}$ = -86.32, $SD_{Threat-No-hero}$ = 280.74, F(1, 196) = 7. 47, p = .007, Cohen's d = .48, r = .23). As predicted, participants who were exposed to the non-threatening conditions did not differ on their compensatory consumption values across hero and acquaintance conditions, suggesting this way that heroes mitigate the effects of meaning threats on compensatory consumption (p = .774). Had the hero not mitigated for the meaning threats, we would have observed a significantly lower value in healthy compensatory consumption in the threatening condition. In fact, the difference between the healthy compensatory consumption of threatened compared to non-threatened participants not reminded of heroes was significant ($M_{No-Hero-Threat}$ = -86.32, $SD_{No-Hero-Threat}$ = 280.74 vs. $M_{No-Hero-Control}$ = 23.59, $SD_{No-Hero-Control}$ = 153.99, F(1, 196) = 7.55, p = .007, Cohen's d = 0.49, r = .24). No differences were observed between the hero and no-hero (i.e., acquaintance) conditions when participants were not exposed to meaning threats (p = .798).

Study 3b

Study 3b tests our predictions in real life, in the field, in a natural setting with high MS, collecting our data on the Day of the Dead (MS), and then 3/4 days later (control).

Ninety-six participants (50 male) participated in our field study on the 1st, 2nd, 5th, and 6th of November. After writing about the festivity – enhanced MS – (vs. nothing) participants wrote about their hero (vs. nothing). To thank them for participating in our study, we offered candies from a bowl, our dependent variable. As predicted, an ANOVA on the number of candies consumed revealed the predicted interaction ($F(1, 93) = 10.609$, $p =$

.002). Those who were in the MS condition consumed a greater number of candies when they were not reminded of their hero ($M_{MS-Hero} = 0.79$, $SD_{MS-Hero} = 0.98$ vs. $M_{MS-NoHero} = 1.74$, $SD_{MS-Nohero} = 1.38$, $F(1, 93) = 8.98$, $p = .004$, Cohen's $d = 0.80$, effect size = .37). Again, the number of candies consumed in threat versus control conditions among those reminded of heroes did not differ ($p = .138$), suggesting that heroes might mitigate compensatory consumption.

Conclusions

The concept of heroes offers several important psychological benefits to individuals reminded of them. Heroes represent the "ideal self-image" (Sullivan & Venter, 2010, p. 437), they evoke moral and socially acceptable behavior (Goethals & Allison, 2012), they help reestablish meaning in life (Coughlan et al., 2017; Kinsella et al., 2017), they give people a sense of purpose in life and hopefulness when experiencing threats (Kinsella, Ritchie, & Igou, 2016), and they provide psychological protection and moral guidance (Kinsella et al., 2015a, 2015b). The present research adds to the previous literature by demonstrating that heroes can also enhance the sense of power of individuals reminded of heroes. Moreover, we demonstrate that due to this increased sense of power, individuals can enhance meaning in life more effectively than they would otherwise and this can block unhealthy overconsumption. We hope this research will inspire further research on the effects of hero reminders on meaning in life, showing their effect on other types of meaning threats as well (e.g., social exclusion or rejection, identity threats, etc.). Moreover, we hope this research will expand the field of research on heroes, from psychology to consumer behavior.

REFERENCES

Aarts, H., Gollwitzer, P. M., & Hassin, R. R. (2004). Goal Contagion: Perceiving Is for Pursuing. *Journal of Personality and Social Psychology*, *87*(1), 23.

Anderson, C., & Berdahl, J. L. (2002). The Experience of Power: Examining the Effects of Power on Approach and Inhibition Tendencies. *Journal of Personality and Social Psychology*, *83*(6), 1362.

Anderson, C., & Galinsky, A. D. (2006). Power, optimism, and risk-taking. *European Journal of Social Psychology*, *36*(4), 511-536.

Arndt, J., Cook, A., & Routledge, C. (2004). The blueprint of terror management. *Handbook of Experimental Existential Psychology. The Guilford Press, New York, New York, USA*, 35-53.

Baumeister, R. F., & Vohs, K. D. (2002). The pursuit of meaningfulness in life. *Handbook of Positive Psychology*, *1*, 608-618.

Becker, E. (1973). *The Denial of Death*. New York: Free Press.

Becker, S. W., & Eagly, A. H. (2004). The Heroism of Women and Men. *American Psychologist*, *59*(3), 163.

Chen, F., Chen, R. P., & Yang, L. (2019). When Sadness Comes Alive, Will It Be Less Painful? The Effects of Anthropomorphic Thinking on Sadness Regulation and Consumption. *Journal of Consumer Psychology*.

Coughlan, G., Igou, E. R., van Tilburg, W. A., Kinsella, E. L., & Ritchie, T. D. (2017). On Boredom and Perceptions of Heroes: A Meaning-Regulation Approach to Heroism. *Journal of Humanistic Psychology*, 0022167817705281.

Crumbaugh, J. C., & Maholick, L. T. (1963). The case for Frankl's 'Will to meaning'. *Journal of Existential Psychiatry*, *4*(13), 43-48.

De Vos, S., Crouch, R., Quester, P., & Ilicic, J. (2017). Examining the Effectiveness of Fear Appeals in Prompting Help-Seeking: The Case of At-Risk Gamblers. *Psychology & Marketing*, *34*(6), 648-660.

Dillard, J. P., & Anderson, J. W. (2004). The role of fear in persuasion. *Psychology & Marketing*, *21*(11), 909-926.

Ferraro, R., Shiv, B., & Bettman, J. R. (2005). Let us eat and drink, for tomorrow we shall die: Effects of mortality salience and self-esteem on self-regulation in consumer choice. *Journal of Consumer Research*, *32*(1), 65-75.

Florian, V., & Mikulincer, M. (1997). Fear of death and the judgment of social transgressions: A multidimensional test of terror management theory. *Journal of Personality and Social Psychology*, *73*(2), 369.

Franco, Z. E., Blau, K., & Zimbardo, P. G. (2011). Heroism: A conceptual analysis and differentiation between heroic action and altruism. *Review of General Psychology*, *15*(2), 99.

Franco, Z. E., Efthimiou, O., & Zimbardo, P. G. (2016). Heroism and eudaimonia: Sublime actualization through the embodiment of virtue. In *Handbook of eudaimonic well-being*, 337-348. Springer, Cham.

Galinsky, A. D., Magee, J. C., Gruenfeld, D. H., Whitson, J. A., & Liljenquist, K. A. (2008). Power Reduces the Press of the Situation: Implications for Creativity, Conformity, and Dissonance. *Journal of Personality and Social Psychology*, *95*(6), 1450.

Galinsky, A. D., Rucker, D. D., & Magee, J. C. (2015). Power: Past findings, present considerations, and future directions. In M. Mikulincer, P. R. Shaver, J. A. Simpson, & J. F. Dovidio (Eds.), *APA handbooks in psychology®. APA Handbook of Personality and Social Psychology, 3,* 421–460.

Gill, T., & Lei, J. (2018). Counter-stereotypical products: Barriers to their adoption and strategies to overcome them. *Psychology & Marketing*, *35*(7), 493-510.

Goethals, G. R., & Allison, S. T. (2012). Making heroes: The construction of courage, competence, and virtue. In *Advances in experimental social psychology* (Vol. 46, pp. 183-235). Academic Press.

Goldstein, N. J., & Hays, N. A. (2011). Illusory Power Transference The Vicarious Experience of Power. *Administrative Science Quarterly*, *56*(4), 593-621.

Greenberg, J., Pyszczynski, T., & Solomon, S. (1986). The causes and consequences of a need for self-esteem: A terror management theory. In *Public self and private self* (pp. 189-212). Springer, New York, NY.

Heine, S. J., Proulx, T., & Vohs, K. D. (2006). The meaning maintenance model: On the coherence of social motivations. *Personality and Social Psychology Review*, *10*(2), 88-110.

Heintzelman, S. J., & King, L. A. (2018). Routines and Meaning in Life. *Personality and Social Psychology Bulletin*, doi: 0146167218795133.

Holt, D. B., & Thompson, C. J. (2004). Man-Of-Action Heroes: The Pursuit of Heroic Masculinity in Everyday Consumption. *Journal of Consumer Research*, *31*(2), 425-440.

Jong, J., Halberstadt, J., & Bluemke, M. (2012). Foxhole atheism, revisited: The effects of mortality salience on explicit and implicit religious belief. *Journal of Experimental Social Psychology*, *48*(5), 983-989.

Kasser, T., & Sheldon, K. M. (2000). Of wealth and death: Materialism, mortality salience, and consumption behavior. *Psychological Science*, *11*(4), 348-351.

Kay, A. C., Gaucher, D., Napier, J. L., Callan, M. J., & Laurin, K. (2008). God and the Government: Testing a Compensatory Control Mechanism for the Support of External Systems. *Journal of Personality and Social Psychology*, *95*(1), 18.

Keltner, D., Gruenfeld, D. H., & Anderson, C. (2003). Power, approach, and inhibition. *Psychological Review*, *110*(2), 265.

Kinsella, E. L., Igou, E. R., & Ritchie, T. D. (2017). Heroism and the Pursuit of a Meaningful Life. *Journal of Humanistic Psychology*, 0022167817701002.

Kinsella, E. L., Ritchie, T. D., & Igou, E. R. (2015a). Zeroing in on Heroes: A Prototype Analysis of Hero Features. *Journal of Personality and Social Psychology*, *108*(1), 114.

Kinsella, E. L., Ritchie, T. D., & Igou, E. R. (2015b). Lay Perspectives on the Social and Psychological Functions of Heroes. *Frontiers in Psychology*, *6*.

Kinsella, E. L., Ritchie, T. D., & Igou, E. R. (2016). A Brief History of Lay and Academic Perspectives. *Handbook of heroism and heroic leadership*, 19.

Lammers, J., Stoker, J. I., & Stapel, D. A. (2009). Differentiating Social and Personal Power: Opposite Effects on Stereotyping, but Parallel Effects on Behavioral Approach Tendencies. *Psychological Science*, *20*(12), 1543-1548.

Landau, M. J., Solomon, S., Greenberg, J., Cohen, F., Pyszczynski, T., Arndt, J., ... & Cook, A. (2004). Deliver us from evil: The effects of mortality salience and reminders of 9/11 on support for President George W. Bush. *Personality and Social Psychology Bulletin*, *30*(9), 1136-1150.

Larson, L. R., & Denton, L. T. (2014). eWOM Watchdogs: Ego-Threatening Product Domains and the Policing of Positive Online Reviews. *Psychology & Marketing*, *31*(9), 801-811.

Lash, J. (1995). *The hero: Manhood and power*. Thames and Hudson.

Lee, J., & Shrum, L. J. (2012). Conspicuous Consumption versus Charitable Behavior in Response to Social Exclusion: A Differential Needs Explanation. *Journal of Consumer Research*, *39*(3), 530-544.

Mandel, N., Rucker, D. D., Levav, J., & Galinsky, A. D. (2017). The compensatory consumer behavior model: How self-discrepancies drive consumer behavior. *Journal of Consumer Psychology*, *27*(1), 133-146.

Masters, T., & Mishra, A. (2019). The Influence of Hero and Villain Labels on the Perception of Vice and Virtue Products. *Journal of Consumer Psychology*.

McCabe, S., Carpenter, R. W., & Arndt, J. (2016). The role of mortality awareness in hero identification. *Self and Identity*, *15*(6), 707-726.

Pennebaker, J. W., Boyd, R. L., Jordan, K., & Blackburn, K. (2015). *The development and psychometric properties of LIWC2015*.

Proulx, T., & Inzlicht, M. (2012). The five "A"s of meaning maintenance: Finding meaning in the theories of sense-making. *Psychological Inquiry*, *23*(4), 317-335.

Rogers, R. W. (1975). A protection motivation theory of fear appeals and attitude change1. *The Journal of Psychology*, *91*(1), 93-114.

Rossi, F., & Rubera, G. (2018). Measuring Competition for Attention in Social Media: Nwsl Players on Twitter. Retrieved from: papers.ssrn.com

Rousseau, D. L., & Garcia-Retamero, R. (2007). Identity, power, and threat perception: A cross-national experimental study. *Journal of Conflict Resolution*, *51*(5), 744- 771.

Routledge, C., Arndt, J., Wildschut, T., Sedikides, C., Hart, C. M., Juhl, J., & Schlotz, W. (2011). The Past makes the Present Meaningful: Nostalgia as an Existential Resource. *Journal of Personality and Social Psychology*, *101*(3), 638.

Sarial-Abi, G., Vohs, K. D., Hamilton, R., & Ulqinaku, A. (2017). Stitching time: Vintage consumption connects the past, present, and future. *Journal of Consumer Psychology*, *27*(2), 182-194.

Steele, C. M., & Aronson, J. (1995). Stereotype threat and the intellectual test performance of African Americans. *Journal of Personality and Social Psychology*, *69*(5), 797.

Steger, M. F., Frazier, P., Oishi, S., & Kaler, M. (2006). The Meaning in Life Questionnaire: Assessing the Presence of and Search for Meaning in Life. *Journal of Counseling Psychology*, *53*(1), 80.

Sullivan, M. P., & Venter, A. (2005). The Hero Within: Inclusion of Heroes Into The Self. *Self and Identity*, *4*(2), 101-111.

Sullivan, M. P., & Venter, A. (2010). Defining Heroes Through Deductive And Inductive Investigations. *The Journal of Social Psychology*, *150*(5), 471-484.

Thomas, V. L., Saenger, C., & Bock, D. E. (2017). Do you want to talk about it? When word of mouth alleviates the psychological discomfort of self-threat. *Psychology & Marketing*, *34*(9), 894-903.

Tripathy, J. P. (2013). Secondary data analysis: ethical issues and challenges. *Iranian Journal of Public Health*, *42*(12), 1478.

Van Dijke, M., & Poppe, M. (2006). Striving for Personal Power as a Basis for Social Power Dynamics. *European Journal of Social Psychology*, *36*(4), 537-556.

Veen, S. V., & College, C. (1994). The Consumption of Heroes and the Hero of Hierarchy of Effects. *Advances in Consumer Research*, *21*(1), 332-336.

Wauters, B., Brengman, M., & Mahama, F. (2014). The impact of pleasure-evoking colors on the effectiveness of threat (fear) appeals. *Psychology & Marketing*, *31*(12), 1051-1063.

Wildschut, T., Sedikides, C., Arndt, J., & Routledge, C. (2006). Nostalgia: Content, Triggers, Functions. *Journal of Personality and Social Psychology*, *91*(5), 975.

Market Radicalization: Exploring Reversed Co-optation in Far-Right Consumer Culture

Sofia Ulver, Lund University, Sweden
Tina Askanius, Malmö University, Sweden

EXTENDED ABSTRACT

With the global rise of populist right politics (Berman 2019; Krastev and Holmes 2019; Masood and Nasir 2020) consumer researchers have begun to pay more attention to consumer resistance leaning on far right ideologies (e.g. Cambefort and Pecot 2019; Castelló and Mihelj 2018; Luedicke, Thompson and Giesler 2010; Ulver and Laurell *forthcoming*). In tandem, a commercialization of extremist far-right consumer culture has nourished through an aesthetic mobilization of sophisticated marketing. Brands like German *Thor Steinar*, Ukrainian *Svastone*, Russian *White Rex*, Swedish *DFS*, Italian *CasaPound*, Kiev-based *MilitantZone*, and American *OfficialProudBoys*, have managed to successfully absorb the aesthetic branding techniques of mainstream brands and sell thier goods at sophisticated websites through ambiguously coded iconography. This market movement accompanies a larger shift where the embodied far-right has successively gravitated away from skin-head life style markers such as shaved heads, bomber jackets and military boots in favor of new, more ambiguous and subtle markers of belonging along with new and more lifestylish modes of community-building and strategic communication online. Not only do these brands mark affinity for the already converted, but according to research in cultural sociology they work systematically to normalize extreme right ideologies and recruit new young people by way of consumer culture (Miller-Idriss 2017). In this research, we aim to contribute to consumer culture theory (CCT) (Arnould & Thompson 2005) by shedding light on how a political movement mobilizes material goods to begin to radicalize consumers into extreme political activism. To better understand how market actors contribute to political radicalization of consumers, we explore these new forms of commercialization and aesthetization of extreme right movements online.

In consumer culture theory (CCT) (Arnould and Thompson 2005) researchers on consumer activism and resistance have long debated whether ideologically motivated consumption and market actors' political stances actually do have aimed political consequences (e.g. Gopaldas 2014; Thompson & Coskuner-Balli 2007ab; Thompson & Kumar 2018; Kozinets 2002) or instead lead to neoliberal *de*-politicization of citizens into mere consumers (e.g. Bertilsson 2015; Brunk, Giesler & Hartmann 2018; Giesler & Veresiu 2014; Holt 2002; Veresiu & Giesler 2018). The heart of the issue in these articles is the either destructive or potentially constructive relationship between consumption and capitalist ideology, where the critics argue that market expressed involvement in political issues is a co-opting, false veneer to cover their capitalist profit motives, and in the end only distracts from actual political activism. However, in our case of far-right commercialization, the heart of the issue is reversed; here the market actors use a capitalist market veneer to normalize and de-stigmatize their political past (Miller-Idriss 2017) to ultimately effectuate extreme political activism. Moreover, at this stage we focus on the market techniques of radicalization rather than on the consumers *per se*.

We position the phenomenon of far-right commercialization at the intersection of abovementioned body of literature in CCT on ideology and activism, and theoretical insights on radicalization, social movements, iconography and materiality/material culture in cultural and political sociology dovetailing on three major "turns:" (1) the *iconic turn* (Bartmanski & Alexander 2012), (2) the *material turn* (Miller 2010), and (3) the *affective turn* (Ahmed 2014).

To identify aesthetically radicalizing techniques in line with these turns, we use *visual methodologies* (Doerr 2017; Miller-Idriss 2019; Rose 2016) at a small selection of far-right webshops in Europe and the United States. These brands were selected based on searches for far-right brands through the media analysis tool *Retriever*. In line with Miller-Idriss' (2017) findings in far-right consumer culture, we analyze projected political branding techniques, coded symbols and iconography, and pay detailed attention to how the websites and their merchandise are explicitly or implicity laced with extremist, anti-Semitic, Islamophobic, homophobic and misogynist messages and symbols.

Our results indicate a flourishing commercialization of the far-right, by help of two main dimensions of simultaneous branding techniques; (1)*de-historicizing the past*, and (2) *politicizing the present*. In turn, these techniques include materialized techniques such as; using soft environments, situating models in contemporary lifestyle milieus to de-historicize, and combining argument with emotion, and using dark humour to politicize.

We situate our findings in the broader social, economic and political context and see the case of commercial far-right websites as *one* expression in a series of current efforts of re-branding/normalizing (Askanius 2020) and aestheticizing far-right ideology (see e.g. Kølvraa and Forchtner 2019) in ways that help normalize and banalize their underlying ideology and desensitize audiences to extremist messages. More specifically, besides contributing to CCT by empirically highlighting the nascent movement of far-right consumer culture, this research contributes conceptually to the stream on consumer activism (e.g. Gopaldas 2014; Kozinets and Handelman 2004; Sandlin and Callahan 2009) with insights on market-mediated political radicalization. In contrast to the previous main research focus on progressive, liberal, anti-capitalist movements conceptualizing consumerism as their adversary, we demonstrate how market actors actively give fodder to political extremism by aestheticizing their platform and offers in ways that distract consumers from the stigmatized past and at the same time amplify their political imperative. Furthermore, in contrast to research insights on the de-politicizing consequences of market actors' political involvement (e.g. Veresiu & Giesler 2018) we find that these actors rather politicize than *de*-politicize their consumers. Judging from our visual analysis of the far-rights' market space and offers, and in line with Miller-Idriss' (2017) insights on german youth, consumers may very well start out by "only" being attracted to the elaborate style, fairly unaware of the political messages behind, to then gradually be drawn into the extremist culture not only as consumers, but also as political activists.

Based on our findings and the status of extant research on political consumption and marketing, we encourage future research to further explore growing political radicalization (at all extremes) of consumers and market actors. Limitations with this present research is the lack of consumers as research objects, hence, we especially encourage longitudinal research which takes into account the interplay between market actors and consumers to better understand how this market-mediated radicalization actually plays out over time.

REFERENCES

Ahmed, Sara (2014) *The Cultural Politics of Emotions,* Edinburgh: Edinburgh University Press.

Arnould, Eric J., and Craig J Thompson (2005) "Reflections Twenty Years of Research." *Journal of Consumer Research* 31 (4): 868–882. https://doi.org/10.1086/426626.

Askanius, T (2020) "'I Just Want to Be the Friendly Face of National Socialism, I Want to Be Part of Its Normalisation': The Turn to Civil Discourse and a 'Nazism-Light' in the Online Media Practices of the Nordic Resistance Movement." *Nordicom Review*, no. Special issue on Uncivility, Racism and Populism.

Bartmanski, Dominik, Alexander, Jeffrey C. and Bernhard Giesen (eds.) (2012) *Iconic Power: Materiality and Meaning in Social Life,* London: Palgrave Macmillan.

Berman, Sheri (2019) *Democracy and Dictatorship in Europe-From the Ancien Régime To the Present Day,* Oxford, UK: Oxford University Press.

Bertilsson, Jon (2015) "The Cynicism of Consumer Morality," *Consumption, Markets & Culture,* 18(5), 447-467.

Brunk, Katja H., Markus Giesler, and Benjamin J. Hartmann (2017), "Creating a Consumable Past: How Memory Making Shapes Marketization," *Journal of Consumer Research*, 44 (3), 1325–1342.

Cambefort, Marine and Fabien Pecot (2019). "Theorizing rightist anti-consumption" *Marketing Theory*, 1470593119895792. https://doi.org/10.1177/1470593119895792.

Castelló, Enric, and Sabina Mihelj (2018). "Selling and consuming the nation: Understanding consumer nationalism." *Journal of Consumer Culture*, *18*(4), 558–576.

Doerr, Nicole (2017) "Bridging Language Barriers, Bonding against Immigrants: A Visual Case Study of Transnational Network Publics Created by Far-Right Activists in Europe." *Discourse and Society*. https://doi.org/10.1177/0957926516676689.

Giesler, Markus, and Ela Veresiu (2014), "Creating the Responsible Consumer: Moralistic Governance Regimes and Consumer Subjectivity," *Journal of Consumer Research*, 41 (3), 840–857.

Gopaldas, Ahir (2014) ""Marketplace Sentiments," *Journal of Consumer Research,* 14(4), 995-1014.

Holt, Douglas B. (2002), "Why Do Brands Cause Trouble? A Dialectical Theory of Consumer Culture and Branding," *Journal of Consumer Research*, 29 (1), 70–90.

Kølvraa, Christoffer, and Bernhard Forchtner (2019) "Cultural Imaginaries of the Extreme Right: An Introduction." *Patterns of Prejudice* 53 (3): 227–35. https://doi.org/10.1080/0031322X.2019.1609275.

Kozinets, Robert V. (2002), "Can Consumers Escape the Market?" *Journal of Consumer Research*, 29 (1), 20–38.

Kozinets, Robert V., and Jay M. Handelman (2004), "Adversaries of Consumption: Consumer Movements, Activism and Ideology," *Journal of Consumer Research*, 31 (3), 691–704.

Krastev, Ivan and Stephen Holmes (2019) *The Light that Failed: A Reckoning*, UK: Allan Lane.

Luedicke, Marius K., Thompson Craig J., and Markus Giesler (2010), "Consumer Identity Work as Moral Protagonism: How Myth and Ideology Animate a Brand-Mediated Moral Conflict," *Journal of Consumer Research*, 36 (6), 1016–1032.

Masood, Ayesha and Muhammad Azfar Nisar (2020) "Speaking out: A postcolonnial critique of the academic discourse on far-right populism," *Organization,* 27(1), 162-173.

Miller-Idriss, Cynthia. (2017) The Extreme Gone Mainstream. Commercialization and Far Right Youth Culture in Germany. Princeton and Oxford: Princeton University Press.

———. 2019. "What Makes a Symbol Far Right? Co-Opted and Missed Meanings in Far-Right Iconography." In *Post-Digital Cultures of the Far Right Online Actions and Offline Consequences in Europe and the US*, 123–36. Bielefeld: Transcript Verlag.

Miller, Daniel (2010) *Stuff*. Cambridge, UK: Polity Press.

Rose, Gillian (2016) *Visual Methodologies: An Introduction to Researching with Visual Materials*, London, UK: Sage.

Sandlin, Jennifer A., and Jamie L. Callahan (2009), "Deviance, Dissonance, and Détournement: Culture Jammers Use of Emotion in Consumer Resistance," *Journal of Consumer Culture*, 1 (March), 79–116.

Thompson, Craig J., and Gokcen Coskuner-Balli (2007a), "Countervailing Market Responses to Corporate Co-optation and the Ideological Recruitment of Consumption Communities," *Journal of Consumer Research*, 34 (2), 135–52.

Thompson, Craig J., and Gokcen Coskuner-Balli (2007b), "Enchanting Ethical Consumerism: The Case of Community Supported Agriculture," *Journal of Consumer Culture*, 7 (3), 275–303.

Thompson, Craig, and Ankita Kumar (2018), "Beyond Consumer Responsibilization: Slow Food's actually existing neoliberalism," *Journal of Consumer Culture*, 0 (0), 1–20.

Ulver, Sofia and Christofer Laurell (*forthcoming*) "Political Ideology in Consumer Resistance: Analyzing Far-Right Opposition to Multicultural Marketing," *Journal of Public Policy & Marketing.*

Veresiu, Ela, and Marcus Giesler (2018), "Beyond Acculturation: Multiculturalism and the Institutional Shaping of an Ethnic Consumer Subject," *Journal of Consumer Research*, 45 (3), 553–570.

More Eggs in the Same Basket:
How Shopping Online Reduces Variety Seeking in Purchases

Julie Verstraeten, Ghent University, Belgium
Anneleen Van Kerckhove, Ghent University, Belgium
Jing Lei, University of Melbourne, Australia
Ye Zhao, Schulich Business School, Canada

EXTENDED ABSTRACT

In 2018, digital grocery sales in the US reached 23.9 billion dollars and these figures are bound to amount to 53.9 billion dollars in 2023. By 2022, 70 percent of US shoppers are expected to regularly shop for groceries online (eMarketer 2018; 2019). Other than the convenience factor (e.g., Chiang and Dholakia 2003; Wolfinbarger and Gilly 2001), a key reason why consumers shop online is that it allows them to choose from a wider, more varied assortment (The Food Industry Association 2018). Yet, it is unclear whether consumers actually reap the rewards of these (seemingly) wider assortments and seek more variety when shopping online versus offline.

In fact, despite its practical relevance, to date only little is known on how the composition of consumers' shopping baskets differs online and offline. Extant literature on how consumers shop online versus offline has examined the impact of shopping channel on consumers' price-sensitivity (Chu, Chintagunta and Cebollada 2008), reactions to price promotions (Degeratu et al. 2001), brand loyalty (Danaher, Wilson and Davis 2003), preference for package sizes (Andrews and Currim 2004), size of the basket and typical features of the purchased products such as product weight, size, and healthiness (Chu, Chintagunta, and Cebollada 2008; Pozzi 2013; Huyghe et al. 2017). Despite this research, literature remains silent on the variety of the items in consumers' shopping baskets online and offline. The current research addresses this question and investigates whether—and if so, why—the shopping channel through which consumers purchase groceries (i.e., online vs. offline) affects the variety of items in their shopping basket.

Variety seeking, as an important behavioral factor in formulating marketing strategies (e.g., Ratner and Kahn 2002; Seetharaman and Che 2009) has been researched extensively in the literature. In this research, we define variety seeking at the product level, measuring the number of unique products purchased in an online versus offline shopping basket. We hypothesize shopping baskets composed offline to exhibit more variety—that is, to contain more unique category items relative to the total number of category items—compared to shopping baskets composed online.

To build this proposition, we rely on the differential product presentation mode as a marked difference between online and offline shopping channels. Products are real and physically present in an offline store, whereas they are typically represented in visual forms such as pictures in online stores. We propose that, in comparison to the visual presentation of products in online shopping, the tangible and concrete presentation of products in an offline context (Huyghe et al. 2017) is likely to lead to a higher level of *anticipated satiation* (i.e., the extent to which a food is expected to deliver fullness; Brunstrom, 2011, Wilkinson et al, 2012). Past research has shown that expected satiation is significantly affected by the sensory characteristics of a food item such as viscosity and texture (e.g., Martin et al. 2015; McCrickerd et al. 2012) and its physical attributes (e.g., size, calorie density, Brunstrom and Rogers 2012). Importantly, this anticipated satiation can occur *prior to* the consumption, as consumers can rely on their past experience with a food item to estimate the degree of fullness that this food is likely to deliver (Keenan, Brunstrom, and Ferriday 2015). Research also shows that consumers may experience anticipated satiation if they simply simulate the consumption in their mind. For example, merely evaluating a food item repeatedly can result in satiation through mental simulation of the consumption (Larson, Redden, and Elder 2013). In the context of our research, we expect that the offline (versus online) presentation of a food item is more vivid and more likely to engender spontaneous mental simulation of the consumption, resulting a higher degree of anticipated satiation. Consumers feeling satiated are more likely to look for varieties in their purchase to maintain a desired level of stimulation.

Studies

In a first study we compared the online and offline purchases of 4,000 *mixed-channel customers*, who shopped online in some occasions and offline in others over a period of 6 months (from January until July 2018). To be considered as a *mixed-channel* customer, the percentage of a customer's online shopping trips needed to range between 25 and 75 percent. We focus on mixed-channel shoppers as this allows a better test of shopping channel effects (as in Huyghe et al. 2017, Chu et al. 2010, and Chu, Chintagunta, and Cebollada 2008) than a comparison of single channel shoppers (e.g., shoppers who only shop online or offline), as the latter comparison does not account for many of the inherent differences between the two groups of customers.

For this study we collaborated with a large Western-European retailer who operates both online and offline for many years and carries the same assortment in both channels. Specifically, this retailer offers a *click-and-collect service*, allowing customers to order their groceries online but pay and pick-up the groceries in one of the retailer's offline stores; the retailer does not provide a delivery at home service.

As shopping baskets generally contain more products online than offline (e.g., Chu, Chintagunta, and Cebollada 2008; Pozzi 2013) probably a result of convenience factor, we calculated the variety in a shopping basket as the total number of unique food items to the total number of food products purchased in a category (Levav and Zhu 2009). Every UPC (universal product code) is being counted as a unique item so that variety is calculated at the product level (e.g., a product with a new flavor within the same category is considered as a unique product). For instance, if on a given shopping trip a customer bought one raspberry and one strawberry yogurt, the degree of variety in this category would equal 2/2 or the maximum possible variety. The dataset encompasses multiple receipts per customers as we received all receipts of all selected customers over a time period of 6 months. Therefore, we run multilevel models to analyze these data as in previous studies (e.g., Chu, Chintagunta, and Cebollada 2008; Chu et al. 2010; Huyghe et al. 2017). In addition, we installed a cut-off of €500 on shopping baskets' total value, as basket values exceeding this cut-off likely do not reflect 'regular' household grocery shopping.

In line with our hypothesis, customers' shopping baskets were less varied when purchases were ordered online ($M_{Ratio\ online}$ = .52, SD = .20) compared to when they were bought offline ($M_{Ratio\ offline}$ = .62, SD = .25; $F(1, 37219.35)$ = 2441.20; $p <.001$). Furthermore, we

show the robustness of this effect by looking at the effect at (1) different levels of total spending and for (2) twenty-four different food categories (see Summarizing Results Table – Panel B and Panel C). With the exception of "alcoholic beverages" and "weight loss products and supplements" for which there were no differences in the variety chosen for online and offline purchases, our result show that the proposed effect of shopping channel holds for both the tempting and unhealthy product categories (e.g., cookies, candies, chips and salty snacks) and the less tempting, healthier categories (e.g., fruit and vegetables, fruit juices, bread, meat and flour products). It suggests that the tendency of variety seeking is higher offline than online. In an online shopping context, when purchasing from a product category, shoppers are likely to select multiple of the same items rather than spreading their choices across the available choice options. Nevertheless, real online and offline stores differ in many aspects, besides their presentation mode. For example, mixed-channel shoppers might have different motivations for shopping online versus offline, which may be reflected in their shopping baskets. If presentation mode contributes to the observed difference in variety seeking online versus offline, then a similar difference should be detected in a lab environment, where only the presentation mode differs.

The goal of **Study 2** was to replicate this effect in a controlled laboratory environment. Hereto, we set up a between-subjects design with two conditions (shopping channel: online vs. offline). For this study, we recruited 110 master students from a large Western-European University (38 men, M_{age} = 21.75 year) whom participated in return for partial course credit.

In this study, we told participants that we were interested in developing the ideal salty snack mix. In both the online and offline conditions, we presented them with five typical salty snacks and told them that they could compile their ideal snack mix. In total, they could fill five slots, one by one, with their preferred salty snack. In other words, they could choose five times the same salty snack if they wanted to. In the *online* condition, participants where shown five pictures, one for each of the available salty snacks, and were five times instructed to select one. After each choice, the same five pictures were shown along with the preceding choices they had made. In the *offline* condition, five boxes of each of the five salty snack mixes were placed in front of the participant. Participants could fill a five-compartment box by consecutively selecting five snacks and pouring them – one at a time – into the compartments.

We measured variety using the number of unique snacks each participant had chosen. The results support our hypothesis that participants' salted snack mix was less varied when it was composed online (M_{Online} = 3.80, SD = .91) compared to when it was composed offline ($M_{Offline}$ = 4.10, SD = .78; t(108) = 1.75; p = .08).

In **Study 3** we aim to replicate the results of Study 2. Moreover, we will test whether the effect replicates across *vice* and *virtue* assortments (Wertenbroch 1998; Milkman, Rogers and Bazerman 2010), as past research shows that the effect of presentation mode may differ between vice and virtue food products (Loewenstein 1996).

Seventy-seven participants (29 men, M_{age} = 25.86 year) whom were recruited through the Consumer Panel of a large European university, participated in this study in return for a small monetary compensation. Participants were randomly assigned to the online versus offline condition, which served as a between-subjects factor in this study. Participants were either consecutively exposed to four online assortments, each comprising six products, or were exposed to the same snack assortments depicted on a shelf in the lab. Of the four product assortments, we composed two *vice* assortments (e.g., candies, candy bars) and two *virtue* assortments (e.g., fruits and vegetables and cereal biscuits). In both conditions, participants selected six snack items from each assortment. It was explicitly indicated that they could select the same item multiple times.

Similar to Study 2, we calculated the number of unique snacks that each participant had chosen as the dependent variable in a multilevel model that accounts as each participant provided four datapoints. In line with our predictions, participants' choices were less varied when they were made online than when they were made offline (M_{Online} = 2.96, SD = 1.05 and $M_{Offline}$ = 3.40, SD = .98; F(1,75) = 7.89; p = .006). Importantly, when looking at the variation in participants' choices in the tempting (M_{Online} = 3.03, SD = 1.17 and $M_{Offline}$ = 3.58, SD = .93; F(1,75) = 7.86; p = .006) and non-tempting (M_{Online} = 2.89, SD = .92 and $M_{Offline}$ = 3.22, SD = 1.00; F(1,75) = 3.38; p = .07) assortments separately, the effect replicates.

In **Study 4**, we aim to replicate the finding while making participants' choices consequential. Hereto, we told participants that they had a 10% chance to receive the products they chose in this study two weeks after participation. This design also made sure that the products were available with a similar delay in both conditions ruling out differences in *order lead time* online and offline as an alternative account for the observed effect of shopping channel (Milkman, Rogers and Bazerman 2010).

In total, 75 participants (27 men, M_{age} = 23.69 year) from the Consumer Panel of a large European university participated this study in return for a small monetary compensation. We again manipulated whether participants made choices online versus offline and instructed participants to select snacks from the assortment in line with their preferences. All participants read this same scenario and were then asked to choose seven snacks from the available assortment. In the *online* condition, the snack assortment was displayed to the participants on the following page in the survey. For the *offline* condition, we constructed the snack assortment on a retail shelf in the consumer lab and participants were asked to look at this assortment and to indicate their choices on a separate paper, while seated in front of the assortment. The assortment consisted of 22 different snacks with both healthy and unhealthy snacks.

As in the previous studies, we calculated the number of unique snacks each participant had chosen. In line with our main hypothesis, participants' choices were less varied when they made their choices online compared to when they made choices offline (M_{Online} = 5.00, SD = 1.23 and $M_{Offline}$ = 5.60, SD = 1.30; t(73) = 2.00; p = .05).

General Discussion

In sum, this research demonstrates that consumers' food choices and purchases are less varied online than offline. We show that the effect holds for both tempting and non-tempting food products (Study 3) and rule out *order lead time* (Study 4) as an alternative account for the observed effect of shopping channel (Milkman, Rogers and Bazerman 2010).

This research responds to a recent call for research that compares consumers' purchases online and offline (Sevilla, Lu, and Khan 2019) and, as such, contributes to the stream of research comparing both shopping channels (e.g., Degeratu et al. 2001; Danaher et al. 2003; Chu, Chintagunta and Cebollada 2008; Chu et al. 2010;; Huyghe et al. 2017). Importantly, unlike many other studies that compared online versus offline customers using a between-subject design, in this research we analyzed mixed-channel customers— customers that purchased in both the online and offline stores of the same retailer. This is crucial as a between-subject comparison is difficult to rule out many of the potential confounds resulted from the inherent differences between customers who shop online and those shopping offline.

We propose that the shopping channel difference in variety seeking is the result of a difference in anticipated satiation online versus offline. Past research shows that vivid product presentations trigger more intense product desire and higher levels of temptation (Loewenstein 1996; Huyghe et al. 2017). We show, somewhat counterintuitively, that vivid product presentations (in offline stores) are not only more tempting, they also lead consumers to anticipate a more rapid decay in future consumption enjoyment and thus include more varieties in their purchases.

Our findings also provide important practical implications for retailers and product and brand managers which might help to improve their decision-making on their online and offline marketing and promotion strategies. Indeed, nowadays retailers strive to extend their offer online as well as offline to attract and please customers. Yet, the present findings suggest that consumers do not actually reap the variety they choose to have online; instead they do make more varied choices in brick-and-mortar stores.

REFERENCES

Andrews, R. L., and I. S. Currim (2004), "Behavioral Differences Between Consumers Attracted to Shopping Online versus Traditional Supermarkets: Implications for Enterprise Design and Marketing Strategy," *International Journal of Internet Marketing and Advertising*, 1 (1), 38–61.

Baumgartner, H., and J. B. E. Steenkamp (1996), "Exploratory Consumer Buying Behavior: Conceptualization and Measurement," *International Journal of Research in Marketing*, 13 (2), 121–137.

Brunstrom, J. M. (2011), "The Control of Meal Size in Human Subjects: A Role For Expected Satiety, Expected Satiation and Premeal Planning," *Proceedings of the Nutrition Society*, 70 (2), 155–161.

Brunstrom, J. M., and P. J. Rogers (2009), "How Many Calories Are on Our Plate? Expected Fullness, Not Liking, Determines Meal-Size Selection," *Obesity*, 17 (10), 1884–1890.

Chiang, K. P., and R. R. Dholakia (2003), "Factors Driving Consumer Intention to Shop Online: An Empirical Investigation," *Journal of Consumer Psychology*, 13 (1), 177–183.

Chu, J., M. Arce-Urrizba, J.-J. Cebollada-Calvo and P. K. Chintagunta (2010), "An Empirical Analysis of Shopping Behavior Across Online and Offline Channels for Grocery Products: The Moderating Effects of Household and Product Characteristics," *Journal of Interactive Marketing*, 24 (4), 251–268.

Chu, J., P. K. Chintagunta and J. Cebollada (2008), "A Comparison of Within-Household Price Sensitivity Across Online and Offline Channels," *Marketing Science*, 27 (2), 283–99.

Cornil, Y. (2017), "Mind over Stomach: A Review of the Cognitive Drivers of Food Satiation," *Journal of the Association for Consumer Research*, 2 (4), 419–429.

Danaher, P. J., I. W. Wilson, and R. A. Davis (2003), "A Comparison of Online and Offline Consumer Brand Loyalty," *Marketing Science*, 22 (4), 461–476.

Degeratu, A. M., A. Rangaswamy and J. Wu (2000), "Consumer Choice Behavior in Online and Traditional Supermarkets: The Effects of Brand Name, Price, and Other Search Attributes," *International Journal of Research in Marketing*, 17 (1), 55–78.

eMarketer (2019), "Five Charts; The State of Online Groceries," available at https://www.emarketer.com/content/five-charts-the-state-of-online-groceries

eMarketer (2018), "Online Grocery Shopping is Reaching a Tipping Point," available at https://www.emarketer.com/content/online-grocery-shopping-is-reaching-a-tipping-point

Huyghe, E., J. Verstraeten, M. Geuens, and A. Van Kerckhove (2017), "Clicks as a Healthy Alternative to Bricks: How Online Grocery Shopping Reduces Vice Purchases.," *Journal of Marketing Research*, 54 (1), 61–74.

Keenan, G. S., J. M. Brunstrom, and D. Ferriday (2015), "Effects of Meal Variety on Expected Satiation: Evidence for a 'Perceived Volume Heuristic,'" *Appetite*, 89, 10–15.

Larson, J. S., J. P. Redden, and R. S. Elder (2014), "Satiation From Sensory Simulation: Evaluating Foods Decreases Enjoyment of Similar Foods," *Journal of Consumer Psychology*, 24 (2), 188–194.

Levav, J., and R. Zhu (2009), "Seeking Freedom Through Variety," *Journal of Consumer Research*, 36 (4), 600–610.

Loewenstein, G. F. (1996), "Out of Control: Visceral Influences on Behavior," *Organizational Behavior and Human Decision Processes*, 65 (3), 272–92.

Martin, A. A., L. R. Hamill, S. Davies, P. J. Rogers, and J. M. Brunstrom (2015). Energy-Dense Snacks Can Have the Same Expected Satiation as Sugar-Containing Beverages," *Appetite*, 95, 81–88.

McCrickerd, K., L. Chambers, J. M. Brunstrom, and M. R. Yeomans (2012), "Subtle Changes in the Flavour and Texture of a Drink Enhance Expectations of Satiety," *Flavour*, 1 (1), 20.

Milkman, K. L., T. Rogers, and M. H. Bazerman (2010), "I'll Have the Ice Cream Soon and the Vegetables Later: A Study of Online Grocery Purchases and Order Lead Time," *Marketing Letters*, 21 (1), 17–35.

Pozzi, A. (2013), "E-Commerce as a Stockpiling Technology: Implications for Consumer Savings," *International Journal of Industrial Organization*, 31 (6), 677–689.

Ratner, R. K., and B. E. Kahn (2002), "The Impact of Private Versus Public Consumption on Variety-Seeking Behavior. *Journal of Consumer Research*, 29 (2), 246–257.

Read, D., and G. Loewenstein (1995), "Diversification Bias: Explaining the Discrepancy in Variety Seeking Between Combined and Separated Choices," *Journal of Experimental Psychology: Applied*, 1 (1), 34.

Seetharaman, P. B., and H. Che (2009), "Price Competition in Markets with Consumer v-Variety Seeking," *Marketing Science*, 28 (3), 516–525.

Sevilla, J., Lu, J., and B. E. Kahn (2019), "Variety Seeking, Satiation, and Maximizing Enjoyment over Time," *Journal of Consumer Psychology*, 29 (1), 89–103.

The Food Industry Association (2018), "U.S. Grocery Shoppers Trends 2018: How Technology is Changing Grocery Shopping From the Consumer Perspective," available at https://www.fmi.org/docs/default-source/webinars/trends-2018-webinar-3-final94d6250324aa67249237ff0000c12749.pdf?sfvrsn=547c426e_0

Wertenbroch, K. (1998), "Consumption Self-Control by Rationing Purchase Quantities of Virtue and Vice," *Marketing Science*, 17 (4), 317–337.

Wilkinson, L.L, E. C. Hinton, S. H. Fay, D. Ferriday, P. J. Rogers, J. M. Brunstrom (2012), "Computer-Based Assessments of Expected Satiety Predict Behavioural Measures of Portion-Size Selection and Food Intake," *Appetite*, 59 (3), 933–938.

Wolfinbarger, M., and M. C. Gilly (2001), "Shopping Online For Freedom, Control, and Fun," *California Management Review*, 43 (2), 34–55.

Sociomaterial Performativity of the Surveillant Assemblage on Healthcare Platforms

Handan Vicdan, Emlyon Business School, France

EXTENDED ABSTRACT

This conceptual paper proposes a sociomaterial lens for understanding how surveillance functions and produces outcomes in platform organizations, and draws attention to this performative process of knowledge generation in healthcare. Platform organizations enable distant and asynchronous monitoring of people as assemblages of data (Zwick and Denegri-Knott, 2009). With this surveillant assemblage, purposes and hierarchies of begin to shift from one-sided power disparities (Foucault, 1979) to more complex surveillance networks (Haggerty and Ericson, 2000) because those who were once under surveillance, and thereby disciplined, now enact surveillance themselves. Questions emerge concerning how platform organizations constitute a surveillant assemblage that challenge the existing practices and power relations for medical knowledge constitution. Conventional theories of surveillance do not suffice to describe the complexity of the contours and effects of surveillance phenomena observed in the datafication of everyday life, as the effects of and responses to surveillance are much more complex than resistance and compliance (Brivot and Gendron, 2011). Hence a need to move beyond a dichotomous and reactive view of surveillance (Visser et al., 2017), and focus on how patients, the surveilled, can enact surveillance is warranted; a perspective often missing in surveillance literature (Visser et al., 2017).

With the emergence of participatory medicine, Web 2.0 technologies transform the ways patients manage their health by tracking health data in real-time and enabling big data generation. Hierarchies of knowledge production become leveled with increased access to medical knowledge (Rier and Indyk, 2006). Questions emerge concerning how platform organizations constitute a surveillant assemblage of humans and technology, and its outcomes, which challenge the existing practices and power relations for knowledge production. Sociomateriality is a useful lens for exploring the materiality and performativity (Jones, 2014) of surveillant assemblages and their outcomes as enacted in the practices and relations of human and nonhuman actors (Callon, 2008; Orlikowski and Scott, 2015). The inextricably related material, digital and social outcomes of surveillance in knowledge constitution (Barad, 2003; Orlikowski, 2007; Orlikowski and Scott, 2008) yield both material and social effects, which draws attention to the performativity of surveillance technologies, a key concept related to sociomateriality (Jones, 2014).

Sociomaterial lens in information systems and organizational research emphasizes the relationality and the constitutive entanglement of humans and technology (Barad, 2003; Orlikowski, 2007, 2010; Orlikowski and Scott, 2008, 2015) that enact performances via their practices (Barad, 2003), which is rarely studied (Gond et al., 2015) yet is critical for studying the constitution of knowledge as a sociomaterial practice (Barad, 2003; Orlikowski, 2007; Orlikowski and Scott, 2008). With advancement in digital technologies, wearable devices, and tracking tools, scholars may study the performativity of different sociomaterial arrangements and their consequences for a more distinct sociomaterial theorizing and understanding the change of power dynamics in these arrangements (Cecez-Kecmanovic, 2014). Furthermore, studies in marketing and consumer research focus on performativity by exploring how marketing tools and models shape markets (Kjellberg and Helgesson, 2006; Mason et al., 2015) as well as how consumer-enacted performativities (Martin and Schouten, 2014; Scaroboto, 2015) shape markets. However, less attention is given to the constitutive entanglement of humans and technologies (Orlikowski and Scott, 2008; Kjellberg and Helgesson, 2006) that enact performances (Barad, 2003) at micro/meso/macro levels, and how these outcomes reshape existing practices and transform power dynamics among market actors (Cecez-Kecmanovic et al., 2014; Orlikowski and Scott, 2015).

The emergence of alternative healthcare platforms (e.g., PatientsLikeMe, trackmystack, myhealthteams, 23andme, raremark) for medical knowledge generation is a good example to study the different performances and their related sociomaterial outcomes at micro/meso/macro levels. Surveillant assemblage on these platforms operates via different levels and involvement of multiple actors, human (e.g., patients, physicians, caregivers, platform operatives, pharmaceuticals, researchers, and state) and non-human (e.g., genetic reports, symptom tracking tools, mood maps, doctor visit sheets, disease rating scales, disease outcome measures). At the micro and meso levels, patient practices are configured by surveillance technologies and exist through material artefacts (e.g., doctor visit sheets produced on platforms and used in clinical settings, symptom trackers to track patient well-being), and their outcomes yield material (e.g., application of new treatments, patient self-tracked data influence his and others' bodily experiences), and social (tracking tools organize relations among patients and new forms of interaction between patients and doctors in clinical settings) effects. Patients use tracking tools to gain a deeper sense of self and others (Moore and Robinson, 2015) - a potential of surveillance and its reflexive nature (Iedema and Rhodes, 2010). Self-tracking is the result of a dynamic sociomaterial arrangement (Bode and Christensen, 2016). Digital tracking tools predict patient diagnostic/prognostic data as patients quantify and visualize their data, and shape their management of care and relations in material and social terms (Callon, 2008; Orlikowski and Scott, 2008). Outcome measures shared with other patients and healthcare stakeholders make surveillance more relational than ever. They improve communication on patient care with diverse stakeholders in clinical settings, influence patient embodied practices and organizing relations to others accordingly, prevent hospitalization or wrong treatments, hence producing both social and material outcomes in and beyond the platform. Institutional actors (pharmaceuticals) also track patient data, recruit patients for clinical trials, track drug effectiveness and side effects, and partner with patients for improving self-tracking tools. At the macro level, patient practices such as directly reporting drug side effects to government agencies using surveillance technologies further shape state pharmacovigilance of pharmaceuticals, and patient generated medical research via surveillance technologies inform scientific medical research. Hence, multiple performativities of the surveillant assemblage demonstrate the potential for shaping the practices of its actors, organizations and their markets (Callon, 2008; Orlikowski and Scott, 2008).

Sociomaterial performativity of a surveillant assemblage also draws attention to the performative struggles (Callon, 2007) or counterperformativities (Mackenzie, 2007) in the era of datafication. Micro/meso counterperformativities include the exclusion of illiterate patients in the surveillant assemblage. Platforms may also create a "technology of the self" via self-tracking, which may lead to manipulation of data by users. Data (il)literacy is also an important performative struggle, as it may obstruct decisions concerning patient care and scientific knowledge production, as well as power dynamics. Future research should work on to explore the impact of these counter-performativities in alternative markets.

REFERENCES

Barad, Karen (2003), "Posthumanist Performativity: Toward an Understanding of How Matter Comes to Matter," *Journal of Women in Culture and Society,* 28(3), 801-831.

Barad, Karen (2007), *Meeting the Universe Halfway: Quantum Physics and the Entanglement of Matter and Meaning.* Durham, NC: Duke University Press.

Bode, Matthias and Dorthe B. Kristensen (2016), Digital Doppelgander Within: A Study on Self-tracking and the Quantified Self-movement," In Canniford, Robin and Domen Bajde (eds.) *Assembling; Consumption: Researching Actors, Networks and Markets*. (pp. 119-135). New York, NY: Routledge.

Boyd, Danah and Kate Crawford (2012), "Critical Questions for Big Data. Povocations for a Cultural, Technological, and Scholarly Phenomenon," *Information, Communication & Society* 15(5), 662–679.

Brivot, Marion and Yves Gendron (2011), "Beyond Panopticism: On the Ramifications of Surveillance in a Contemporary Professional Setting," *Accounting, Organizations and Society,* 36, 135–155.

Callon, Michel (2008), "Economic Markets and the Rise of Interactive Agencements: From Prosthetic Agencies to Habilitated Agencies," In Pinch T and Swedberg R (eds) *Living in a Material World: Economic Sociology Meets Science and Technology Studies.* Cambridge: MIT Press, pp. 29–56.

Cecez-Kecmanovic, Dubravka, Robert D. Galliers, Ola Henfridsson, Sue Newell, and Richard Vidgen. (2014), "The Sociomateriality of Information Systems: Current Status, Future Directions," *MIS Quarterly,* 38 (3), 809–830.

Foucault, Michel (1979), *Discipline and punish: The birth of the prison* (A. Sheridan Trans.) New York: Vintage Books.

Gond, Jean Pascal, Laure Cabantous, Nancy Harding and Mark Learmonth (2015), "What Do We Mean by Performativity in Organization and Management Studies? The Uses and Abuses of Performativity," *International Journal of Management Reviews,* 18(4), 440-463.

Haggerty, Kevin D. and Richard V. Ericson (2000), "The Surveillant Assemblage," *British Journal of Sociology,* 51(4), 605−622.

Iedema, Rick and Carl Rhodes (2010), "The Undecided Space of Ethics in Organizational Surveillance," *Organization Studies,* 31(2), 199−217.

Jones, Matthew (2014), "A Matter of Life and Death: Exploring Conceptualizations of Sociomateriality in the Context of Critical Care," *MIS Quarterly*, 38 (3), 895-925.

Kjellberg, Hans and Claes-Fredrik Helgesson (2006), "Multiple Versions of Markets: Multiplicity and Performativity in Market Practice," *Industrial Marketing Management,* 35 (7), 839−55.

MacKenzie, Donald (2007), "Is Economics Performative? Option Theory and the Construction of Derivatives Markets," In *Do Economists Make Markets? On the Performativity of Economics,* (pp. 54–86). Princeton, NJ: Princeton University Press.

Mason, Katy, Hans Kjellberg and Johan Hagberg (2015), "Exploring the Performativity of

Marketing: Theories, Practices, and Devices," *Journal of Marketing Management,* 31 (1–2), 1–15.

Moore, Phoebe and Andrew Robinson (2015), "The Quantified Self: What Counts in the Neoliberal Workplace," *New Media & Society,* 18(11), 2774–2792.

Orlikowski, Wanda J. (2007), "Sociomaterial Practices: Exploring Technology at Work," *Organization Studies,* 28(09), 1435–1448.

Orlikowski, Wanda J. and Susan V. Scott (2008), "Sociomateriality: Challenging the Separation of Technology, Work and Organization," *The Academy of Management Annals,* 2(1), 433−474.

Orlikowski, Wanda J. and Susan V. Scott (2015), "The Algorithm and the Crowd. Considering the Materiality of Service Innovation," *MIS Quarterly,* 39(1), 201−216.

Rier, David A. and Debbie Indyk (2006), "The Rationale of Interorganizational Linkages to Connect Multiple Sites of Expertise, Knowledge Production, and Knowledge Transfer," *Social Work in Health Care,* 42(3−4), 8−27.

Scaraboto, Daiane (2015), "Selling, Sharing, and Everything in Between: The Hybrid Economies of Collaborative Networks," *Journal of Consumer Research,* 42, 152−176.

Visser, Laura M., Inge Bleijenbergh, Yvonne Benschop and Allard van Riel (2017), "Prying Eyes: A Dramaturgical Approach to Professional Surveillance," *Journal of Management Studies.* doi: 10.1111/joms.12283

Zwick, Detlew and Janice Denegri-Knott (2009), "Manufacturing Customers: The Database as New Means of Production," *Journal of Consumer Culture,* 9(2), 221−247.

Your Need Doesn't Appeal to Me: How Social Class Shapes Charitable Giving Across Causes

Yan Vieites, FGV-EBAPE, Brazil
Rafael Goldszmidt, FGV-EBAPE, Brazil
Eduardo B. Andrade, FGV-EBAPE, Brazil

EXTENDED ABSTRACT

Two recent tragedies received worldwide attention: the Cyclone Idai and the Notre-Dame Cathedral fire. While the former ranks as one of the deadliest tropical cyclones on record, the latter, though tragic for its cultural significance, did not affect people's access to pressing needs. Yet, members of the elite donated approximately ten times more to the rebuilding of the Notre-Dame Cathedral than to the victims of the cyclone (Martin 2019; Walsh 2019). Although celebrated by some, the enormous amounts donated to the Notre-Dame Cathedral have also triggered a massive public backlash (Sullivan 2019). At the center of the criticism was the question: which social causes are worthy of philanthropy for the rich? In this research, we shall demonstrate how a basic psychological process (i.e., sensitivity to need) may help explain this intriguing question.

Individual experiences have been shown to largely shape donation preferences (Radley and Kennedy 1995). Small and Simonsohn (2008), for instance, showed that past experiences with a friend's misfortune increases sympathy towards other victims from the same plight. However, since social class often shapes personal experiences in a relatively homogeneous way (Kraus et al. 2012), it may well mold people's relative sensitivity to particular sets of misfortunes and thereby influence their prosocial choices.

Given that lower-class individuals are embedded in contexts of generalized scarcity (Piff et al. 2012), we reasoned that they would present a greater sensitivity to the degree of need of social causes relative to their higher-class counterparts. Implicit in this reasoning is the idea that going from scarcity to abundance changes not only the amount of resources one has to give, but also the dimensions consumers are more sensitive to during the donation process. Among the poor, scarcity-based experiences should increase the donor's sensitivity to need. As a result, they should be more inclined to donate to more pressing causes (e.g., helping the homeless find shelter) than to relatively less pressing ones (e.g., promoting cultural activities). Among the wealthy, abundance-based experiences should reduce the donor's sensitivity to need and enhance the weight of other factors (e.g., social signaling; Sargeant and Woodliffe 2007). We test this possibility across 5 field studies with residents from extremely poor and wealthy areas of Brazil.

In study 1, participants received five R$2.00 bills in return for their participation. Upon completion of a filler questionnaire, respondents learned that research assistants were collecting resources for two campaigns, one to help the homeless find shelter (a pretested pressing need) and the other to help promote cultural activities (a pretested non-pressing need). Participants were then given two envelopes containing a pictorial depiction of each cause and instructed to deposit the money they were willing to donate (including any) in the designated envelope. As expected, higher-class consumers donated less than their lower-class counterparts to a cause concerned with the homeless but donated more when the cause concerned cultural activities.

Study 2 uses another combination of causes (food and culture) and provides initial process evidence. This study relies on the same procedure as study 1 except that half of the participants received an envelope containing a neutral pictorial appeal, whereas the other half received an envelope containing a visceral graphic appeal. If findings from study 1 are indeed explained by a sensitivity gap, then presenting the causes in a way that makes the degree of necessity emotionally/viscerally salient to *all* participants would make both higher- and lower-class consumers more likely to donate to the most pressing cause. That was indeed the case. When assigned to the neutral condition, higher-class participants donated more to culture than food, whereas the opposite held true for their lower-class counterparts. However, when assigned to the visceral condition, both groups became more charitable to the food-related cause.

Study 3 replicated the procedure of study 2 in a hypothetical scenario and asked participants to indicate not only the social cause they would contribute more money, but also the reason why they chose to donate more to one cause or the other (degree of need, affinity, or other motive). Beyond replicating findings from study 2, results also showed that the effect of the viscerality manipulation on patterns of giving was explained by the increase in the sensitivity to need among the wealthy in the visceral (vs. neutral) condition.

Study 4 relies on a distinct approach to examine the mechanism. Participants were offered the opportunity to donate to one of two causes in a hypothetical scenario. For half of the participants, the tradeoff hinged upon shelter and sports, whereas for the other half the options were safety and sports. A pretest showed that lower-class consumers experience much higher scarcity in the access to shelter than their higher-class counterparts, but both groups share similar scarcity experiences in terms of safety. Since our rationale predicts that higher scarcity experiences prompt a higher sensitivity to need, we reasoned that lower-class participants would donate more to the most pressing cause than their higher-class peers when the pair of available causes were shelter and sports but not when the pair of causes were safety and sports. This prediction was fully supported.

Our final study adopts a framing strategy to provide further evidence for the proposed mechanism. Participants were offered the opportunity to donate to a shelter-related cause and/or a sports-related cause in a hypothetical scenario. Whereas for half of the participants, the shelter-related appeal emphasized the benefits inherently connected to having access to adequate shelter (e.g., well-being), for the other half the appeal centered on the idea that reducing homelessness might help promote safety in the city. As expected, emphasizing the safety-related benefits of helping homeless people increased sensitivity to need, and thereby donation amounts, among the higher-class more than among the lower-class.

This research offers two main contributions. First, we move beyond the question of who behaves more prosocially to assess when and why members of contrasting socioeconomic backgrounds act the most on behalf of others. Second, we extend the finding that personal experiences shape sympathy towards specific causes by showing how it can reflect a group-based phenomenon.

REFERENCES

Kraus, Michael W., Paul K. Piff, Rodolfo Mendoza-Denton, Michelle L. Rheinschmidt, and Dacher Keltner (2012), "Social Class, Solipsism, and Contextualism: How the Rich Are Different from the Poor," *Psychological Review*, 119(3), 546–72.

Martin, Iain (2019), "French Billionaires Pledge $670 Million to Restore Notre Dame," *Forbes*, https://www.forbes.com/sites/iainmartin/2019/04/16/french-billionaires-pledge-340-million-to-restore-notre-dame/#1f769b156087.

Piff, Paul K., Daniel M. Stancato, Andres G. Martinez, Michael W. Kraus, and Dacher Keltner (2012), "Class, Chaos, and the Construction of Community," *Journal of Personality and Social Psychology*, 103(6), 949–62.

Radley, Alan and Marie Kennedy (1995), "Charitable Giving by Individuals: A Study of Attitudes and Practice," *Human Relations*, 48(6), 685–709.

Sargeant, Adrian and Lucy Woodliffe (2007), "Gift Giving: An Interdisciplinary Review," *International Journal of Nonprofit and Voluntary Sector Marketing*.

Small, Deborah A. and Uri Simonsohn (2008), "Friends of Victims: Personal Experience and Prosocial Behavior," *Journal of Consumer Research*, 35(3), 532–42.

Sullivan, Paul (2019), "Notre-Dame Donation Backlash Raises Debate: What's Worthy of Philanthropy?," *The New York Times*, https://www.nytimes.com/2019/04/26/your-money/notre-dame-donation-backlash-philanthropy.html.

Walsh, Declan (2019), "Mozambique Cyclone Wiped Out the Nation's Food. Now Aid Is in Short Supply," *The New York Times*, https://www.nytimes.com/2019/04/20/world/africa/mozambique-cyclone.html.

Social Media as an Empowering Tool for Mothers:
Evidence from India and the United States

Akshaya Vijayalakshmi, Indian Institute of Management Ahmedabad, India
Meng-Hsien (Jenny) Lin, California State University Monterey Bay, USA

EXTENDED ABSTRACT

A mother's autonomous status has a substantial influence on a child's educational attainment (Korupp, Ganzeboom and Lippe 2002), survival (Fantahun et al. 2007), and health condition (Senarath and Gunawardena 2009). However, scant research has been done to investigate the impact of mothers on their children's educational spending. Research in economics and psychology addressing this topic suggests that a mother's autonomous status is a critical determinant of investment made for their children's future (Mencher 1988). In this paper, we (a) consider the impact of a mother's level of empowerment on educational issues, (b) explain how access and use of social media influences a mother's empowerment and thus children's outcomes (Figure 1) and (c) test our hypotheses with mothers in both India and the United States.

Study 1- Mother's Empowerment In India

Educational spending was measured by summing up the expenditures on education (₹) for the oldest child between the ages of 11 and 17. The expenses include tuition, school fees, books, transportation to school, other school materials, and test preparatory services. According to Zimmerman (1995), to fully understand empowerment, both forms of empowerment, intrapersonal empowerment, and interactional components, should be considered. We used a developed scale to capture this (Liu 2016). We recorded mother's use of social media on Yes, Sometimes or No. Other relevant background control variables were captured, including the self (wife) and husband's income, the number of children, work status of the mother, and wife and husband's education level.

The average age of the 301 respondents was 38.5 years (SD = 6.23). Majority of the children (78.7%) were enrolled in a private school. Forty-two percent of the surveyed women stated that WhatsApp was their primary social media option. About 70% of the WhatsApp users are a part of their child's school group or other educational related online communities, and 34% of these women reported either "always" or "mostly" use WhatsApp for this purpose.

A confirmatory factor analysis (CFA) was conducted with a bootstrap resampling procedure with 2000 samples and 95% bias-corrected confidence interval. Our model presented a good fit ($\chi 2$ (26) = 53.11, p < .05; CFI = .98; RMSEA = .06, NFI = .96; Hu and Bentler 1999; Jöreskog and Sörbom 1993). The results suggest that less social media use had a significantly reduced effect on the latent variable, interactional empowerment (-.48; p < .05), but not intrapersonal empowerment. Children's school grades decreased (.96; p < .05; reverse-scored) as their mother's intrapersonal empowerment levels increased, and they also spent less on educational expenditures (-.99; p < .05). Meanwhile, higher levels of interactional empowerment significantly increased educational expenditures (.21; p < .05) while not significantly affecting their child's school grades. There were no indirect effects of media use. The control variable school type had a significant effect on expenditure, while the gender of the child had a significant impact on grades.

Study 2- Mother's Empowerment In The United States

To understand how the use of social media impacts empowerment in the US, we captured active or passive usage of Facebook, Instagram, Twitter or other social media sites (Li 2016). Educational expenditure was captured using the question- "Please consider the following educational expenses: tuition, private tutoring, books, and other school materials, test prep services, transportation to school" on a scale with 1 = < $250 to 9 = $2000+ with increments of $250. An individual's social needs, recognition needs, and cognitive needs were also captured to understand the motivation of seeking social media (Leung 2009) and children's grades in school. Out of the 182 participants, 98% of the mothers owned a smartphone, and all participants had access to some form of social media. Ninety percent of the participants used social media regularly, while others used social media occasionally.

Our CFA model had a good fit ($\chi 2$ (40) = 66.66, p < .05; CFI = .94; RMSEA = .06, NFI = .86). The results suggest that the mother's active social media use had a significant effect on the latent variable, intrapersonal empowerment (.26; p < .05), but not interactional empowerment, as we had expected. Our results show that passive social media use had a significant and positive effect on the latent variable, interactional empowerment (.17; p < .05). Increased intrapersonal empowerment reduced their child's school grades (.73; p < .05; reverse-scored) while interactional empowerment increased educational expenditures (1.81; p < .05). We also find that recognition (.28; p < .05) and social needs (.36; p < .05) significantly impact active social media use while cognitive needs (.36; p < .05) leads to passive media use.

Discussion

By having a mere presence on social media (via passive use) helps women develop interpersonal relations and propel collective action (related to interactional empowerment). These outcomes positively influence children's future since with increase in interactional empowerment, more expenditures are spent related to children's education. Also, it is worth noting that cognitive needs drive passive use of social media, possibly relying on social media as a critical source of information. However, mothers relying on active use of social media without the relational bonds (created through interactional empowerment), may negatively result in (a) reduced expenditures on children's education in India, and (b) their children performing more poorly in school (lower school grades), which was revealed in both in India and US. Our paper is informed by traditional marketing theories of consumer and media socialization and psychological theories of empowerment and places the family, especially the mother and her media use, central to a child's welfare.

REFERENCES

Fantahun, Mesganaw, Yemane Berhane, Stig Wall, Peter Byass, and Ulf Högberg (2007), "Women's Involvement in Household Decision-making and Strengthening Social Capital—Crucial Factors for Child Survival in Ethiopia," *Acta Pædiatrica*, 96, 582-9.

Hu, L. T., and Bentler, P. M. (1999). Cutoff criteria for fit indexes in covariance structure analysis: conventional criteria versus new alternatives. *Structural Equation Modeling: A Multidisciplinary Journal* 6(1), 1–55. doi: 10.1080/10705519909540118

Jöreskog, K. G., and Sörbom, D. (1993). *LISREL VIII: User's reference guide*. Mooresville, IN: Scientific Software.

Korupp, Sylvia E., Harry B. Ganzeboom, and Tanja Van Der Lippe (2002), "Do Mothers Matter? A Comparison of Models of the Influence of Mothers' and Fathers' Educational and Occupational Status on Children's Educational Attainment," *Quality and Quantity*, 36 (1), 17-42.

Leung, Louis (2009), "User-generated Content on the Internet: An Examination of Gratifications, Civic Engagement and Psychological Empowerment," *New Media & Society*, 11 (8), 1327-47.

Li, Zongchao (2016), "Psychological Empowerment on Social Media: Who are the Empowered Users?" *Public Relations Review*, 42 (1), 49-59.

Mencher, Joan (1988), "Women's work and poverty: Women's contribution to household maintenance in South India," *A home divided: Women and income in the Third World*, 99-119.

Senarath, Upul and Nalika Sepali Gunawardena (2009), "Women's Autonomy in Decision Making for Health Care in South Asia," *Asia Pacific Journal of Public Health*, 21 (2), 137–43.

Zimmerman, Marc A. (1995), "Psychological Empowerment: Issues and Illustrations," *American Journal of Community Psychology*, 23 (5), 581-99.

The Interplay of Religious Discrimination/Segregation with Consumption and Production Activities

Akshaya Vijayalakshmi, Indian Institute of Management Ahmedabad, Ahmedabad, India
Nitisha Tomar, University of Wisconsin-Madison, Madison, USA
Ankur Kapoor, Indian Institute of Management Udaipur, Udaipur, India

EXTENDED ABSTRACT

This research focuses on the interplay of consumption and production practices with religious discrimination/segregation. Although works of Izberk-Bilgin (2012) and Sandikci and Ger (2010) consider religion as an ideological tool for consumers' identity projects, we analyze a context where a pernicious, discriminating structural order prevents the use of religion as an ideological tool. Instead, the neoliberal market discourses are implicated, which, ironically leads to reproduction of discrimination. We situate this work in prior research on marketplace exclusion (Scaraboto and Fischer 2012), redlining (D'Rozario and Williams 2005), spatial exclusion (Castilhos 2019), and stigmatization (Sandikci and Ger 2009). Our central research questions are: (a) How does religious discrimination shape consumption and production practices of the discriminated? (b) How do these consumption and production practices, in turn, influence segregation and discrimination?

The study is set in Ahmedabad (India), which has history of several interreligious conflicts, and majority of its population lives in religiously homogeneous neighborhoods (Field et al. 2009). As the context deals with aspects of distinction (between Hindus and Muslims) and spatial segregation, Bourdieu's 'thinking tools,' such as capital, doxa, interest, and symbolic violence, and Wacquant's analyses of territorial stigmatization, are useful in analyzing the data (Grenfell 2014; Wacquant, Slater and Pereira 2014).

Data. Using QGIS application, public/private amenities were mapped onto each of 48 wards of Ahmedabad (Figure 1). This mapping helped us analyze the peripheralization that extends beyond the well-researched residential segregation - to that of access to mainstream marketplaces. We also interviewed 16 Muslims who have been living in Ahmedabad since the 2000s. Participants provided in-depth details on the marketplace discrimination experienced in their everyday lives - segregated housing, schooling, employment, bank loans, and public facilities. Furthermore, the authors gained a richer understanding by participating in several inter-community events, thus traveling to otherwise invisible parts of the city. The analyses followed a hermeneutic approach (Thompson 1997) by identifying themes within and between interviews and connecting these themes with theory.

Findings. Marketing is suggested to favor the in-group through marketing mix, store location, delivery modes, etc. (Bennett et al. 2016). The GIS map and interviews illuminate redlining (paucity of retail stores, restaurants, and banks) in Muslim majority areas, leading to significant differences in amenities between Hindu and Muslim majority areas. Participants also mentioned being underserved by public or private schools and paying higher prices for electricity. Markets become a tool for expressing the religious doxa and reproducing field positions through spatial segregation (Bourdieu 1986, Wacquant et al. 2014). Such structuring influences production/consumption opportunities of the dominated. Interestingly, such a process not only leads to inferior outcomes for Muslim consumers, but also hurts businesses that accommodate inefficiency/losses to maintain social legitimacy (by not serving Muslim dominant areas). Thus, markets forego ideals of profit maximization and customer satisfaction to align with discriminating structural forces.

To redress their dominated positions, stigmatized Muslim producers rely on neoliberal logics of entrepreneurship, individual effort, and market-mediated solutions for overcoming discrimination. "Forced entrepreneurs" (in the words of a participant) emerge as they develop alternative markets for schools, supermarkets, and real estate, among others. Participants worked in their 'interest' to improve their field positions by relying on 'market doxa' to redress the inferior position imposed through 'religious doxa'. Thus markets, and not religion, provide necessary ideological and material resources to subvert structural discrimination.

We find that even if our informants had the economic means to out-migrate, they found it difficult, if not impossible. Barriers to mobility were either institutionally sanctioned or culturally legitimized (prohibition of meat consumption in many residential localities). A participant running a food business could not expand his business as he was denied a larger commercial space in Hindu majority area. Likewise, participants mention about not being granted loans easily because they live in 'negative areas', along with issues in school admissions. Bourdieu (1986) argues that the value of one form of capital lies in its ease of conversion to other forms of capital. We find that location (physical capital) inhibits the conversion of economic capital into symbolic capital. This non-conversion of capital 'freezes' the position of the dominated in the field, thus aggravating distinction and symbolic violence.

Success stories of a few entrepreneurs provided inspiration to rely on one's effort to overcome discrimination. This valorization and internalization of market logic (individuality, self-reliance) made participants feel responsible for their condition. Thus, market logic promoted the consideration of structural and arbitrary as natural and self-inflicted, thereby precluding any collective action against systemic disadvantages. In doing so, market logic becomes complicit in reproducing discrimination by replacing collective efforts towards structural change with individual efforts towards personal change.

The struggle of the participants to redress the stigmatization resulted in entrepreneurial initiatives enveloped in an "identity dance" (Weinberger 2015) of selective fore-/back-grounding of religious markers. Some Muslim entrepreneurs navigated inter-communal boundaries by keeping non-Muslim names for their businesses (e.g., Ruby/Best-Mart) to "pass for normal" (Goffman 1963). Unlike Crockett and Wallendorf (2004), some entrepreneurs assigned Muslim names to their businesses (e.g. Bismillah) to reinforce collective Muslim identity, but only when catering to a Muslim clientele.

Discussion. Our work contributes to theory in the following ways. First, we uncover how lack of legitimate physical capital inhibits the conversion of economic capital into symbolic capital. Thus, we address the limited attention Bourdieu (1986) accords to physical space. Second, we uncover the dual role of markets, in the way they help survive discrimination by enabling means of living but foreclose opportunities of collective action and structural changes, through individualization and responsibilization. By foreclosing collective action, the market's neoliberal ethos appears to reproduce distinction and segregation.

Our work also informs contexts wherein spatial segregation is institutionally or culturally legitimized (refugee camps, gated communities, redlining, etc.). Often, it is believed that market logic will

eventually resolve underlying segregation/discrimination. We found that without efforts through other collective means, the market may aggravate the conditions it is meant to alleviate. We attempt to uncover the complex interplay between marketplace activities of individuals and structural aspects of discrimination/segregation, thus informing theory and public discourse on these issues.

REFERENCES

Bourdieu, P. (1986). The forms of capital. In J. G. Richardson (Ed.), Handbook of theory and research for the sociology of education (241–258). New York, NY: Greenwood Press.

Castilhos, R.B. (2019). Branded places and marketplace exclusion. *Consumption Markets & Culture*, 22(5-6), 582-597.

Crockett, D. and Wallendorf, M. (2004). The role of normative political ideology in consumer behavior. *Journal of Consumer Research*, 31(3), 511-528.

D'Rozario, D. and Williams, J.D. (2005). Retail redlining: Definition, theory, typology, and measurement. *Journal of Macromarketing*, 25(2), 175-186.

Field, E., Levinson, M., Pande, R., & Visaria, S. (2008). Segregation, rent control, and riots: The economics of religious conflict in an Indian city. *American Economic Review*, 98(2), 505-10.

Grenfell, M.J. (2014). *Pierre Bourdieu: Key Concepts*. Routledge.

Izberk-Bilgin, E., (2012). Infidel brands: unveiling alternative meanings of global brands at the nexus of globalization, consumer culture, and Islamism. *Journal of Consumer Research*, 39(4), 663-687.

Saatcioglu, B. and Ozanne, J.L. (2013). Moral habitus and status negotiation in a marginalized working-class neighborhood. *Journal of Consumer Research*, 40(4), 692-710.

Sandikci, Ö., & Ger, G. (2009). Veiling in style: how does a stigmatized practice become fashionable?. *Journal of Consumer Research*, 37(1), 15-36.

Scaraboto, D., & Fischer, E. (2012). Frustrated fatshionistas: An institutional theory perspective on consumer quests for greater choice in mainstream markets. *Journal of Consumer Research*, 39(6), 1234-1257.

Wacquant, L., Slater, T. and Pereira, V.B. (2014). Territorial stigmatization in action. *Environment and Planning A*, 46(6), 1270-1280.

Weinberger, M.F., (2015). Dominant consumption rituals and intragroup boundary work: How non-celebrants manage conflicting relational and identity goals. *Journal of Consumer Research*, 42(3), 378-400.

Weinberger, M.F., & Crockett, D. (2018). Critical reflections on consumer identity. In E. J. Arnould & C. J. Thompson (Eds.), *Consumer culture theory* (62-84). UK: SAGE Publications.

Frequent Consumption of the Sharing Services

Racheal Louis Vincent, Sunway University, Malaysia
Sanjaya Singh Gaur, New York University, USA

EXTENDED ABSTRACT

Introduction

The concept of the sharing economy is more than just a buzz-word. By 2025, the sharing economy is expected to be valued at *$335 billion* (Kindergan 2015). The term 'shared services' in our study is with regards to the services provided in the sharing economy such as ride-sharing (e.g., Uber and Lyft), accommodation sharing (e.g., Airbnb and Couchsurfing), task-sharing (e.g., Taskrabbit and Airtasker), closet-sharing (e.g., Rent the Runway and Style Lend) and many more. These types of services are labelled as 'shared services' because they provide access without ownership (Eckhardt et al. 2019, Kumar, Lahiri, and Dogan 2018).

With the support of digital and mobile technology, these shared services apps (mobile applications) offer consumers an easier access to a variety of on-demand goods, services and underutilized assets for monetary gains. We know that consumers will repeat their service usage if they find that the company provides some sort of value (intrinsic and/or extrinsic) to them. For example, Uber reported their "Monthly Active Platform Consumers" (MAPCs) of 91 million in the fourth quarter of 2018. These are users who were found to take at least one ride on Uber or buy at least one meal on Uber Eats (Salinas and Feiner 2019). For explaining individual's frequent usage of such shared services, we posit that the difficulty (or ease) of use and the overall experience of using shared services plays a major role in influencing their usage behavior.

To date, little is known about individual's shared services frequent usage behavior. The focus of the extant literature seems to be more inclined towards the motivations and barriers for using shared services and overlooks the importance of understanding individual's frequent usage behavior of these services. Past scholarly work done on understanding of human behavior seem to emphasize on the intention-behavior relationship (Ajzen 1991, Godin and Kok 1996, Sheeran and Orbell 1998, 2000b, Warshaw and Davis 1985, Sheeran and Orbell 2000a) and have yet to consider actual frequent usage behavior. The more frequent and recent an individual's usage behavior (Bagozzi and Dholakia 2002), the more likely he/she will repeat their usage behavior again in the future.

With regards to adoption of technology, many studies have primarily focused on perceived ease of use (PEOU) (Fagan, Neill, and Wooldridge 2008, Luarn and Lin 2005, Saadé and Bahli 2005, Venkatesh 1999, Gefen, Karahanna, and Straub 2003, Hansen, Saridakis, and Benson 2018) and limited studies have considered perceived difficulty of use (PDOU) in terms of understanding consumer's usage behavior (Trafimow et al. 2002, Barnard et al. 2013, Venkatesh 2000). However, in actual reality, it is the perceived difficulty of use (PDOU) that influences frequent usage of the adopted services. This is because we postulate that it is much easier for individuals to express their difficulty in using shared services rather than the ease in using these services. Besides, it was found that consumers showed higher intentions to purchase when they had favorable past purchasing experiences (Weisberg, Te'eni, and Arman 2011). Thus, we also examine the role of the experience in making consumers use the same services frequently.

Based on the above backdrop, the aim of our research is to understand individual's consumption of shared services particularly their frequent usage behavior, and the role of perceived difficulty of use (PDOU) and their experience of using shared services. Therefore, to address these research gaps, our study is guided by four research questions. These questions are: What influences people to frequently consume shared services? How the perception of difficulty in using the shared services affects frequent usage behavior? What is the role of past experience in consumption of shared services? How social norms affect intention to participate or not to participate in the sharing economy?

Conceptual Framework

According to Ajzen and Fishbein (2005), human behavior is guided by attitudes and therefore, attitudinal theories are needed to understand and explain individual's consumption of shared services. Our research framework draws advances from attitudinal theories explaining individuals' frequent usage behavior together with extant knowledge of shared consumption. We grounded our research framework on Theory of Trying (TT) by Bagozzi and Warshaw (1990) and Extended Model of Goal-Directed Behavior (EMGB) by Perugini and Corner (2000) together with frequent usage behavior, perceived difficulty of use (PDOU) and experience of using shared services to explain individual's shared services behavior. Applying one theory to the domain of the other has potential to generate novel insights. According to Mayer and Sparrowe (2013) in order for integration to be successful, it is important for a clearly articulated link between the theory and the new domain to be present as it allows for productive dialogue. We propose an integration of both mentioned theories as they complement each other. TT's three determinants: attitude toward success, attitude toward failure and attitude toward the process also known as the pre-factual attitudes allow a better understanding of individual's shared services frequent user behavior when integrated with EMGB. Individuals using shared service may experience impediments and that could drastically affect their shared services usage frequency. On the other hand, EMGB is said to have outperformed the TPB and has shown substantial predictive power (Perugini and Corner 2000, Lee et al. 2012). To the best of our knowledge, this is a first empirical study to integrate two attitudinal theories: Theory of Trying (TT) and Extended Model of Goal-Directed Behavior (EMGB) to further explain individual's frequent usage of shared services.

Method

Data for the study were collected using a mall-intercept survey using structured questionnaire. Measures for all the variables used in this study were drawn from well-established literature and were modified to suit the present study. Out of *500* respondents participated in the mall-intercept survey, *393* responses were found to be usable. Partial Least Squares based Structural Equation Modelling (PLS-SEM) was used to test all the hypotheses in the conceptual framework. The SmartPLS 3.0 software was used for the testing of both measurement model and structural model. PLS based SEM technique was used mainly because it provides a useful estimate for a complex framework with many constructs and many indicators (Chin 1998, Hair et al. 2011, Ringle, Sarstedt, and Straub 2012). Moreover, Hair et al. (2011), Hair et al. (2014), Henseler, Ringle, and Sinkovics (2009), highlighted that PLS-SEM has been widely used in marketing research and also been used in many top-tier and other leading journal publications.

Discussion

Our findings offer new insights for understanding individual's consumption of shared services particularly their frequent usage behavior, the role of perceived difficulty of use (PDOU) and experience of using shared services. Consequently, our research augments the Theory of Trying (TT) and Extended Model of Goal-Directed Behavior (EMGB) in several ways. Empirical findings of the study prove to show the proposed framework of the study developed by integration of theories was successful in explaining individual's shared services frequent behavior.

Pre-factual attitudes towards success (feelings towards success, expectation of success and evaluation of success), attitude towards failure (feelings towards failure), attitude towards the process (feelings towards process) were found to influence individual's attitude towards using shared services. Similarly, we found attitude towards use, subjective norms and group norms significantly influence individual's desire for using shared services. Desire to use shared services and perceived behavioural control were found to influence individual's intention for using shared services. Besides that, we also found intention to use and subjective norms significantly influence individual's frequent usage of shared services. Perceived difficulty of use (PDOU) on the other hand, was found to be negatively associated with individual's frequent usage behaviour of shared services and experience of using shared services was found to be negatively associated with PDOU.

Conclusions

As mentioned earlier, the primary objective of this study was to understand individual's consumption of shared services particularly their frequent usage behavior, and the role of perceived difficulty of use (PDOU) and experience of using shared services. Our findings show that individual's pre-factual thought process influences their attitudes towards using the sharing services. How individual's feel, expect, evaluate success or failure and their overall thought process of using shared services highly depends on the sharing service providers'. Moreover, perceived difficulty of use (PDOU) and experience of using shared services were found to play an important role in terms of influencing individual's frequent consumption of the sharing services.

There are three main contributions of our study from the perspective of academia. The first contribution is in terms of the explanation for the frequent consumption (usage) of shared services. Second contribution is in terms of the inclusion of perceived difficulty of use (PDOU) variable in the existing behavioral models which have primarily considered perceived ease of use (PEOU). The third contribution comes from explaining the role of experience of using shared services in the frequent usage behavior.

This study also provides several practical implications for the key stakeholder of the shared economy, such as shared service providers (operators). It is imperative for the sharing service providers to create a positive brand experience and minimize service failures. This is vital because experience of using shared services not only affects individual's perceived difficulty of use (PDOU) but also their frequent usage behavior.

It is important for the sharing service providers to educate consumers on using the features of their mobile apps such as by including step-by step video of use in the app itself especially for the older consumers who often have anxiety towards technology adoption. The findings of our study are indeed valuable not only for future scholars who are keen to study similar technology adoption but also provide useful guidelines for the sharing economy practitioners.

REFERENCES

Ajzen, I. 1991. "The Theory of Planned Behavior." *Organizational Behavior and Human Decision Processes* 50:179-211.

Ajzen, Icek , and Martin Fishbein. 2005. The Influence of Attitudes on Behavior. In *The Handbook of Attitudes*.

Bagozzi, Richard P, and Utpal M Dholakia. 2002. "Intentional social action in virtual communities." *Journal of Interactive Marketing* 16 (2):2-21.

Bagozzi, Richard P, and Paul R Warshaw. 1990. "Trying to Consume." *Journal of Consumer Research* 17 (2):127-140.

Barnard, Yvonne, Mike D. Bradley, Frances Hodgson, and Ashley D. Lloyd. 2013. "Learning To Use New Technologies By Older Adults: Perceived Difficulties, Experimentation Behaviour and Usability." *Computers in Human Behavior* 29 (4):1715-1724.

Chin, W. W. 1998. "The Partial Least Squares Approach to Structural Equation Modeling." In *Modern Methods for Business Research*, edited by G. A Marcoulides, 295-336. Lawrence Erlbaum Associates.

Eckhardt, Giana M., Mark B. Houston, Baojun Jiang, Cait Lamberton, Aric Rindfleisch, and Georgios Zervas. 2019. "Marketing in the Sharing Economy." *Journal of Marketing* 83 (5):5-27.

Fagan, Mary Helen , Stern Neill, and Barbara Ross Wooldridge. 2008. "Exploring the Intention to Use Computers: An Empirical Investigation of the Role of Intrinsic Motivation, Extrinsic Motivation, and Perceived Ease of Use." *Journal of Computer Information Systems* 48 (3):31-37.

Gefen, David , Elena Karahanna, and Detmar W. Straub. 2003. "Trust and TAM in Online Shopping: An Integrated Model." *MIS Quarterly* 27 (1):51-90.

Godin, G, and G Kok. 1996. "The Theory of Planned Behavior: A Review of Its Applications to Health-Related Behaviors." *American Journal of Health Promotion* 11 (2):87-98.

Hair, Joe F. Jr, Marko Sarstedt, Lucas Hopkins, and Volker G Kuppelwieser. 2014. "Partial Least Squares Structural Equation Modeling (PLS-SEM)." *European Business Review* 26 (2):106-121.

Hair, Joe F. Jr, Marko Sarstedt, Christian M Ringle, and Jeannette A Mena. 2011. "An Assessment of The Use of Partial Least Squares Structural Equation Modeling in Marketing Research." *Journal of the Academy of Marketing Science* 40 (3):414-433.

Hansen, Jared M. , George Saridakis, and Vladlena Benson. 2018. "Risk, Trust, and the Interaction of Perceived Ease of Use and Behavioral Control in Predicting Consumers' Use of Social Media for Transactions." *Computers in Human Behavior* 80:197-206.

Henseler, Jörg, Christian M Ringle, and Rudolf R Sinkovics. 2009. "The Use of Partial Least Squares Path Modeling in International Marketing." *Advances in International Marketing* 20:277–319.

Kindergan, Ashley. 2015. Credit Suisse: By 2025, Companies could Rake In $335 Billion a Year From People 'Sharing'. Accessed October 7, 2016.

Kumar, V., Avishek Lahiri, and Orhan Bahadir Dogan. 2018. "A Strategic Framework for A Profitable Business Model in The Sharing Economy." *Industrial Marketing Management* 69:147-160.

Lee, H Song, L Bendle, M Kim, and H Han. 2012. "The Impact of Non-Pharmaceutical Interventions For 2009 H1N1 Influenza on Travel Intentions: A Model of Goal-Directed Behavior." *Tourism Management* 33 (1):89-99.

Luarn, Pin, and Hsin-Hui Lin. 2005. "Toward an Understanding Of The Behavioral Intention To Use Mobile Banking." *Computers in Human Behavior* 21 (6):873-891.

Mayer, Kyle J., and Raymond T. Sparrowe. 2013. "Integrating Theories in AMJ Articles." *Academy of Management Journal* 56 (4):917-922.

Perugini, M, and M Corner. 2000. "Predicting and Understanding Behavioral Volitions: The Interplay Between Goals and Behaviors." *European Journal of Social Psychology* 30:705-731.

Ringle, C. M, M Sarstedt, and D Straub. 2012. "A Critical Look at the Use of PLS-SEM." *MIS Quarterly* 36 (1):iii-xiv.

Saadé, Raafat, and Bouchaib Bahli. 2005. "The Impact of Cognitive Absorption on Perceived Usefulness and Perceived Ease of Use in On-Line Learning: An Extension of The Technology Acceptance Model." *Information & Management* 42 (2):317-327.

Salinas, Sara , and Lauren Feiner. 2019. Uber Releases Its Long-Awaited Ipo Filing. Accessed January 13, 2020.

Sheeran, P, and S Orbell. 1998. "Do Intentions Predict Condom Use? Meta-Analysis and Examination of Six Moderator Variables." *British Journal of Social Psychology,* 37 (2):231-250.

Sheeran, P, and S Orbell. 2000a. "Self-Schemas and The Theory of Planned Behaviour." *European Journal of Social Psychology* 30 (4):533-550.

Sheeran, P, and S Orbell. 2000b. "Using Implementation Intentions to Increase Attendance for Cervical Cancer Screening." *Health Psychology Review* 19 (3):283-298.

Trafimow, David, Paschal Sheeran, Mark Conner, and Krystina A. Finlay. 2002. "Evidence That Perceived Behavioural Control is a Multidimensional Construct: Perceived Control and Perceived Difficulty." *British Journal of Social Psychology* 41 (1):101-121.

Venkatesh, V. 2000. "Determinants of Perceived Ease of Use: Integrating Control, Intrinsic Motivation, And Emotion into the Technology Acceptance Model." *Information Systems Research* 11 (4):342-365.

Venkatesh, Viswanath. 1999. "Creation of Favorable User Perceptions: Exploring The Role of Intrinsic Motivation." *MIS Quarterly* 23 (2):239-260.

Warshaw, P, and F Davis. 1985. "Disentangling Behavioral Intention and Behavioral Expectation." *Journal of Experimental Social Psychology* 21 (3):213-228.

Weisberg, Jacob, Dov Te'eni, and Limor Arman. 2011. "Past Purchase and Intention to Purchase in E-Commerce." *Internet Research* 21 (1):82-96.

Deriving Mental Energy from Task Completion

Xiang Wang, University of Florida, USA
Chris Janiszewski, University of Florida, USA
Yanmei Zheng, University of Hawaii, USA
Juliano Laran, University of Miami, USA
Wonseok Jang, Sungkyunkwan University, South Korea

EXTENDED ABSTRACT

People often complain that they have plenty to do, but not enough time to do it. Yet, time is not the only resource that limits daily productivity. People also have limited mental energy. Approximately 20% of Western adults experience mental fatigue on a regular basis (Lerdal et al., 2005; Pawlikowska et al., 1994). Despite the importance of mental energy, and the fact that many daily tasks are naturally depleting, consumer research on how to replenish mental energy is limited.

Mental energy is defined as *momentary feelings* of alertness that supports the ability to remain focused on and complete ongoing *cognitive* tasks (O'Connor 2006; Ryan and Frederick 1997). Existing research investigates the *exogenous* source of energy replenishment (i.e., a source that is independent of the energy-consuming task) such as taking a rest (Helton and Russell 2017) and engaging in intrinsically interesting activities (e.g., leisure activities) (Reis et al., 2000). We suggest an *endogenous* source of energy replenishment – the completion of a goal-directed task – and propose that energy replenishment at task completion depends on the value of task rewards. People's energy level increases compared to *pre-completion* levels when completing high-reward tasks, but not low-reward tasks. We argue that task completion is the time when people obtain and reflect upon task rewards (Gollwitzer 2012; Heckhausen and Gollwitzer 1987), which creates mental energy. As suppression of one's needs, or regulation of the behavior that meets one's needs, consumes mental energy (Baumeister et al. 1998; Vohs and Faber 2007), it is possible that satisfying one's needs (e.g., rewards) boosts mental energy.

We further suggest two moderators of the effect of reward value on energy replenishment: task effort and task focus (reward vs. mere completion). Reward is a consequence of cognitive control during goal pursuit, which is subjectively costly and influences people's responses toward the rewards (Botvinick and Braver 2015; Inzlicht et al. 2018). When task effort is high, task completion should generate mental energy only when reward value is high because the investment of energy was worthwhile. When effort is low, energy replenishment should be less sensitive to reward value and will occur at the completion of both high-reward and low-reward tasks because both tasks were worthwhile given the minimal investment of effort.

Finally, we propose that there are two sources of the reward experienced at completion: the act of completing the task itself and the rewards associated with completing the task. If this is true, mental energy replenishment should be a function of reward value when people focus on the rewards associated with task completion; when people focus on the mere act of task completion, mental energy should be replenished as long as the task is completed, regardless of task reward.

Study 1 demonstrated that mental energy is replenished upon completion of a high-reward task, but not a low-reward task. The task involved finding the best deals (i.e., lowest price) for five products. Task reward was manipulated by whether or not participants learned that they would get a $0.1 bonus for each best deal they found. Participants reported higher mental energy post-completion than pre-completion (i.e., before searching for the 5th product) when reward value was high ($p<.001$) but not when reward value was low ($p=.88$; interaction: $p=.011$). Felt achievement and competence did not differ across conditions.

Study 2 showed behavioral implications of energy replenishment – persistence in a subsequent task. Participants completed the same deal-finding task, except that task completion was manipulated between-subjects by whether or not telling participants that the deal-finding task was completed after they finished the 5th deal-finding task. Then all participants were directed to a book-evaluation task where they could choose to quit at any time. Task persistence was measured by the number of books participants evaluated before they quit. Participants who were informed of task completion evaluated more books than those who were not when reward value was high ($p=.031$) but not when reward value was low ($p=.31$; interaction: $p=.025$).

Study 3 tested moderation by task effort. The task involved learning good sources of six micro-nutrients among five groups of food. Within each group, participants saw six food items and their nutrition facts and needed to identify items that were good sources of each nutrient. Nutrition facts of different foods were listed in % daily value *per serving* that can be directly compared (low-effort) or *in different serving sizes* that required additional calculation (high-effort). The food was either easy to find in grocery stores (e.g., watermelon, blueberries; high-reward) or not (e.g., Kiwano, Loquat; low-reward). In the high-effort condition, mental energy was higher post-completion than pre-completion (i.e., before working on the 5th group) in the high-reward task ($p=.001$) but not in the low-reward task ($p=.914$; interaction: $p=.016$). In the low effort condition, however, mental energy was replenished regardless of reward value (main effect of completion: $p=.043$; interaction: $p=.561$). Study 3 also ruled out alternative explanations of positive affect, felt achievement, and competence.

Study 4 tested moderation by task focus. Participants were asked to 5 hand-written ship logs into digital texts. Reward value was manipulated by framing the task as helping scientists input important historical data (high-reward) or as digitizing logs that were not very useful (low-reward). Task focus was manipulated by adding visual cues that emphasized task completion (an arrow pointing to an icon signaling the end of the task), or not adding such cues, so that task reward was more salient (similar to prior studies). In the reward-focus condition, mental energy was higher post-completion than pre-completion in the high-reward task ($p=.011$) but not in the low-reward task ($p=.511$; interaction: $p=.023$). However, in the completion-focus condition, mental energy was replenished regardless of reward value (main effect of completion: $p=.058$; interaction: $p=.536$).

Our findings suggest that mental energy can be replenished in accordance with the reward experienced at task completion. This energy replenishment strategy could be conceptualized as an evolutionary advantage, as it is an endogenous source that sustains the completion of a sequence of tasks. These insights suggest the need for a broader conceptualization of the generation of mental energy.

REFERENCES

Baumeister, Roy F., Ellen Bratslavsky, Mark Muraven, and Dianne M. Tice (1998), "Ego Depletion: Is the Active Self a Limited Resource?" *Journal of Personality and Social Psychology*, 74 (May), 1252-65.

Botvinick, Matthew, and Todd Braver (2015), "Motivation and Cognitive Control: From Behavior to Neural Mechanism," *Annual Review of Psychology*, 66 (January), 83-113.

Gollwitzer, Peter (2012), "Mindset Theory of Action Phases." in *Handbook of theories of social psychology*, P. A. M. Van Lange, A. W. Kruglanski, & E. T. Higgins (Eds.), Thousand Oaks, CA: Sage Publications Ltd, 526-45.

Heckhausen, Heinz, and Peter M. Gollwitzer (1987), "Thought Contents and Cognitive Functioning in Motivational versus Volitional States of Mind," *Motivation and Emotion*, 11 (2), 101-20.

Helton, William S. and Paul N. Russell (2017), "Rest is Still Best: The Role of the Qualitative and Quantitative Load of Interruptions on Vigilance," *Human Factors*, 59 (February), 91-100.

Inzlicht, Michael, Amitai Shenhav, and Christopher Y. Olivola (2018), "The Effort Paradox: Effort is Both Costly and Valued," *Trends in Cognitive Sciences*, 22 (4), 337-349.

Lerdal, Anners, Astrid K. Wahl, Tone Rustoen, Berit R. Hanestad, and Torbjorn Moum (2005), "Fatigue in the General Population: A Translation and Test of the Psychometric Properties of the Norwegian Version of the Fatigue Severity Scale," *Scandinavian Journal of Public Health*, 33 (2), 123-30.

O'Connor, Patrick J. (2006), "Mental Energy: Developing a Model for Examining Nutrition-Related Claims," *Nutrition Reviews*, 64 (7), S2.

Pawlikowska T., T. Chalder, S. R. Hirsch, P. Wallace, D. J. Wright, and S. C. Wessely (1994), "Population based Study of Fatigue and Psychological Distress," *British Journal of Medicine*, 308 (March), 763–6.

Reis, Harry T., Kennon M. Sheldon, Shelly L. Gable, Joseph Roscoe, and Richard M. Ryan (2000), "Daily Well-Being: The Role of Autonomy, Competence, and Relatedness," *Personality and Social Psychology Bulletin*, 26 (4), 419-35.

Ryan, Richard M. and Christina Frederick (1997), "On Energy, Personality, and Health: Subjective Vitality as a Dynamic Reflection of Well-being," *Journal of Personality*, 65 (September), 529-65.

Vohs, Kathleen D., and Ronald J. Faber (2007), "Spent Resources: Self-Regulatory Resource Availability Affects Impulse Buying." *Journal of Consumer Research*, 33 (March), 537-47.

The Looking-Glass Self: Low Self-Concept Clarity Increases Appearance Management

Jiaqian (Jane) Wang, Kellogg School of Management, Northwestern University, USA
Yiqi Yu, Guanghua School of Management, Peking University, China

EXTENDED ABSTRACT

Recent years have witnessed the rapid expansion of beauty industries. Yet, limited research has shed light on when and why consumers are motivated to manage their appearance. The current research examines how self-concept clarity, a structural feature of self-concept, shapes appearance management.

Self-Concept clarity is defined as the possession of "clearly defined, temporally stable, and internally consistent self-views" (Campbell et al. 1996). Maintaining a clear self-concept is an essential psychological need and can guide how consumers behave. Thus, when lacking self-concept clarity, consumers strive to understand who they are and what to do. Because social standards and evaluations can serve as a reference (Cooley 1902), low self-concept clarity increases consumers' sensitivity to social information. Indeed, when experiencing low self-concept clarity, consumers are more likely to engage in social comparisons, adopt social standards and ideals, and conform to others' expectations to seek social approval (e.g. Mittal 2015). These behaviors manifest the tendency to view the self as embedded in social contexts, which is termed as public self-consciousness (Fenigstein, Scheier and Buss 1975). It triggers the self-presentation motive which drives consumers to build and exhibit a positive self-image to others (Schlenker and Weigold 1990). To the extent that physical attractiveness is one of the most observable, explicit factors in social judgment (Freeman and Ambaby 2011), consumers with strong public self-consciousness tend to be highly involved in appearance management to obtain social approvals.

Taken together, we predict that low-concept clarity increases appearance management by heightening public self-consciousness. This effect will be attenuated when appearance management entails negative self-presentational value (i.e. brings unfavorable social judgments).

Five studies using a survey, archival data, and experiments tested these propositions. Study 1 (N = 300; Mturk) showed that dispositional low self-concept clarity was associated with more frequent appearance management behaviors (e.g. tanning; B = .117, $p < .001$) and stronger preferences for three appearance-improving products (ps < .001).

Study 2 (N = 113; Chinese college students) used a two-condition (self-concept clarity: low vs. high), between-subject design to test the causal effect of self-concept clarity on interest in getting information regarding appearance management. We also explored the role of global self-esteem. Results showed that low self-concept clarity increased interest in learning more about appearance management (M_{low} = 6.00, SD = 1.02 vs. M_{high} = 5.46, SD = 1.22; $F(1,112)$ = 6.43, p = .013, d = .48) without affecting self-esteem (M_{low} = 4.58, SD = 1.01 vs. M_{high} = 4.74, SD = .97; $F(1,112)$ = .73, p = .394, d = .16). Also, the effect of self-concept clarity on appearance management held when controlling for global self-esteem (p = .011), suggesting that self-esteem was not a likely mediator.

We then investigated the underlying mechanisms of the effect. Using a secondary data set (the Midlife in the United States survey), Study 3 examined the link between low self-concept clarity, public self-consciousness, and appearance management. Regression results showed that dispositional low self-concept clarity was associated with greater public self-consciousness (N = 2651; B = .608, SE = .033; $p < .001$). Among female respondents who indicated how much they worried about being less attractive (N = 1413), we found that low self-concept clarity predicted greater concerns about physical attractiveness (B = .143, SE = .022; $p < .001$). More importantly, mediation analysis using SPSS PROCESS macro Model 4 revealed that the indirect effect of public self-consciousness did not contain zero (95% CI = [.04, .07]), suggesting that public self-consciousness mediated the association between low self-concept clarity and concerns about physical attractiveness.

Next, Study 4 (N = 219; Mturk) causally tested the mediating role of public self-consciousness. We manipulated self-concept clarity using a typing task which ostensibly assessed typing speed and accuracy. Participants typed in six sentences describing high or low self-concept clarity word by word. After completing the manipulation check and measures on public self-consciousness, participants read an introduction to cosmetic procedures and indicated their interest in cosmetic procedures (Henderson-King and Henderson-King 2005). Then, they responded to items on private self-consciousness and global self-esteem. As predicted, low self-concept clarity led to greater interest in cosmetic procedures (M_{low} = 2.47, SD = 1.82 vs. M_{high} = 2.06, SD = 1.54; p = .072, d = .24). Mediation analysis using PROCESS macro Model 4 suggested that this effect was mediated by heightened public self-consciousness (indirect effect: 95% CI = [.01, .31]) but not global self-esteem (95% CI = [–.12, .05]) or private self-consciousness (95% CI = [–.12, .08]).

Finally, Study 5 (N = 394; Mturk) employed a process-by-moderation approach to further test the proposed mechanism. Participants were randomly assigned to one of four conditions in a 2 (self-concept clarity: low vs. high) × 2 (self-presentational value: positive vs. negative), between-subject design. Participants first completed a writing task which manipulated self-concept clarity. Then, those in the positive (negative) self-presentational value group read about how Botox could lead to "more compliments" ("being judged as inauthentic"). Next, participants indicated their interest in Botox. Results revealed a significant main effect of self-concept clarity ($F(1, 390)$ = 4.35, p = .038, η_p^2 = .011), no main effect of self-presentational value ($F(1, 390)$ = .95, p = .329, η_p^2 =.002), and a significant interaction ($F(1, 390)$ = 5.84, p = .016, η_p^2 = .015). A planned contrast suggested that when Botox led to positive social evaluations, participants in the low self-concept clarity condition showed greater interest in Botox (M_{low} = 2.62, SD = 1.98 vs. M_{high} = 1.85, SD = 1.61; p = .002). However, when negative social evaluations were highlighted, self-concept clarity had no effect (M_{low} = 2.04, SD = 1.61 vs. M_{high} = 2.09, SD = 1.62; p = .810).

Theoretically, the current work extends research on self-concept, public self-consciousness, and appearance management. Practically, our findings suggest that beauty industries could benefit from combating stereotypes and stigma associated with beauty striving. Moreover, to tackle consumers' beauty obsession, it is vital to eliminate the overemphasis on physical attractiveness and promote more inclusive and diverse beauty in society.

REFERENCES

Campbell, Jennifer D., Paul D. Trapnell, Steven J. Heine, Ilana M. Katz, Loraine F. Lavallee, and Darrin R. Lehman (1996), "Self–Concept Clarity: Measurement, Personality Correlates, and Cultural Boundaries," *Journal of Personality and Social Psychology*, 70 (1), 141–56.

Cooley, Charles Horton (1902), *Human Nature and the Social Order*, NY: Scribner.

Fenigstein, Allan, Michael F. Scheier, and Arnold H. Buss (1975), "Public and Private Self–Consciousness: Assessment and Theory," *Journal of Consulting and Clinical Psychology*, 43 (4), 522–27.

Freeman, Jonathan B. and Nalini Ambady (2011), "A Dynamic Interactive Theory of Person Construal," *Psychological Review*, 118 (2), 247–79.

Henderson-King, D., & Henderson-King, E. (2005). Acceptance of cosmetic surgery: Scale development and validation. *Body image*, 2(2), 137-149.

Mittal, Banwari (2015), "Self–Concept Clarity: Exploring Its Role in Consumer Behavior," *Journal of Economic Psychology*, 46, 98–110.

Schlenker, Barry R. and Michael F. Weigold (1990), "Self–Consciousness and Self–Presentation: Being Autonomous versus Appearing Autonomous," *Journal of Personality and Social Psychology,* 59 (4), 820–28.

Loss Aversion: The Impact of Uncertainty on Experiential Product Preference

Lili Wang, Zhejiang University, China
Xuan Zhang, Zhejiang University, China
Wei Lyu, Shanghai Jiao Tong University, China

EXTEND ABSTRACT

Individuals experience uncertain at a high frequency for all ages. It seems that people make almost all of the key decisions with various kinds of uncertainty, such as investment and life planning. Uncertainty has a great influence on consumers' emotion, judgement, decision making and behavior. How does uncertainty influence consumers' product preference, particularly for experiential vs. material preference?

Uncertainty increases reliance on emotional attachment when making decisions (Faraji-Rad and Pham 2017), repetition behavior for uncertain reward (Shen, Hsee and Talloen 2019), resource investment (Shen, Fishbach and Hsee 2015), and motivations to maintain a stable self-concept (Savary and Dahr 2019). Building on these findings, we propose that uncertainty leads to a loss of psychological ownership by impairing belonging, self-identity and self-efficacy (Elstak et al., 2015; Pierce et al., 2001). Compared to material product, experiential product provides shorter longevity (Tully, Hershfield, and Meyvis 2015; Weidman and Dunn 2016), lower identity association (Dommer and Swaminathan 2013; Morewedge and Giblin 2015; Weiss and Johar 2013, 2016) and is unalterable (Rosenzweig and Gilovich 2012). Thus, to some extent, experiential product would have lower psychological ownership than material product. Therefore, for experiential vs. material product preference under uncertainty, there might be two competitive accounts:

1) From loss aversion perspective, sense of uncertainty should reduce experiential (vs. material) product preference to avoid further loss of psychological ownership.

2) For complementary consumption perspective, sense of uncertainty might increase material (vs. experiential) product preference to restore lost psychological ownership.

Across five studies, we attempt to examine how sense of uncertainty influences experiential vs. material product preference and which account driven this effect.

Study 1 examined the relationships between participants' general sense of uncertainty and experiential (vs. material) product preference. Students (N = 260) completed different kinds of insecurity (Wittkowski 2001) as a proxy of uncertainty perception. Then, experiential product preference (Ryan, Paulina and Ravi 2012). Results showed that general sense of uncertainty was negatively related to preference for experiential product (b = -.29 (.09), $t(258)$ = -3.18, p = .002). Study 2 tested the main effect of uncertainty on experiential (vs. material) product preference. Participants (N = 226) firstly completed the certainty manipulation task (Faraji-Rad and Pham 2017). Then participants read descriptions of experiential or material grills (Tully and Sharma 2018) depended on which condition they were in and then evaluated the grill. A 2 (state) x 2 (product type) ANOVA revealed predicted significant interaction between state and product type ($F(1, 222)$ = 4.38, p = .037, η_p^2 = .02). When the product was experiential-oriented, compared to certainty condition (M = 5.56, SD = 1.49), uncertainty lead to a marginally more negative attitude toward the outdoor grill (M = 5.10, SD = 1.29, $t(222)$ = 1.89, p = .060, d = .33). However, when the product was material-oriented, product evaluation did not differ between certainty (M = 5.43, SD = 1.29) and uncertainty condition (M = 5.69, SD = 1.07, $t(222)$ = 1.07, p = .287, d = .22). These findings provide direct evidence that uncertainty decreases experiential product preference rather than increases material product preference.

To further confirm this effect is driven by uncertainty' aversion effect rather than certainty's complementary effect, the next study added a pure control condition to further examine these two competitive accounts and tested the mediating role of psychological ownership. Participants (N = 308) were randomly assigned to one of the three certainty manipulation conditions and then made a choice from a laptop and a travel. After that, they completed the psychological ownership measure. Results showed that participants in uncertainty condition (M = 44.33%) were marginally less likely to choose travel than participants in certainty-condition (M = 57.43%; b = -. 53 (.29), z = 1.84; p = .066) and in control condition (M = 61.26%, b = .69 (.28), z = 2.43; p = .015). There was no significant difference between certainty (57.43%) and control condition (61.26%, b = -.16 (.28), z = 0.57; p = .570). In addition, the impact of uncertainty on experiential product aversion is driven by relative sense of psychological ownership from experiential vs. material product. We ran two process model and in support of our hypothesis, relative perceived psychological ownership mediated the effect of sense of uncertainty on experiential product preference.

Study 4 investigated the moderator of perceived psychological ownership. Participants (N = 290) completed certainty manipulation, gift choice and perceived relative psychological ownership. Results showed a significant interaction between state and relative psychological ownership (b = .33(.17), z = 1.96, p = .051). Floodlight analysis showed that those perceived experiential product had lower psychological ownership compared to material product (relative psychological ownership score of 2.86 or lower) were more likely avoid to choose travel as the gift under uncertainty condition. Once perceived relative psychological ownership of experiential product increases, this negative effect would disappear.

Study 5 directly manipulated psychological ownership in a real choice context. Students (N = 231) completed certainty manipulation task, psychological ownership manipulation task, and then made a real choice between an umbrella (material product) and motive ticket (experiential product, pretested). Logistic regression showed a marginally significant interaction between state and relative perceived psychological ownership (b = 1.05(.54), z = 1.93, p = .054, η_p^2 = .02). Decomposing this interaction showed in the control condition, participants were less likely to choose a film ticket as a bonus when they were uncertain (34.55%) than when they were certain (M = 50.85%; z = -1.75, p = .081). However, in the high psychological ownership condition, participants showed no preference difference for the film ticket and the umbrella when they were certain (33.33%) and when they were uncertain (M = 42.11%; z = .98, p = .328).

Taken together, these studies provide consistent and convincing evidence that sense of uncertainty leads people to less prefer experiential product because experiential product is associated with lower psychological ownership compared to material product.

REFERENCES

Atasoy, Ozgun, and Carey K. Morewedge (2018), "Digital Goods Are Valued Less Than Physical Goods," *Journal of Consumer Research*, 44(6), 1343-1357.

Caprariello, Peter A. and Harry T. Reis (2013), "To Do, to Have, or to Share? Valuing Experiences Over Material Possessions Depends on the Involvement of Others," *Journal of Personality and Social Psychology*, 104(2), 199-215.

Carter, Travis J. and Thomas Gilovich (2010), "The Relative Relativity of Material and Experiential Purchases," *Journal of Personality and Social Psychology*, 98(1), 146–159.

Collins, Nancy L. and Stephen J. Read (1990), "Adult Attachment, Working Models, and Relationship Quality in Dating Couples," *Journal of Personality and Social Psychology*, 58 (4), 644–663.

Cunningham, Shelia J., David J. Turk, Lynda M. Macdonald, and C. Neil Macrae (2008), "Yours or Mine? Ownership and Memory," *Consciousness and Cognition*, 17 (1), 312–318.

Dommer, Sarah L. and Vanitha Swaminathan (2013), "Explaining the Endowment Effect Through Ownership: The Role of Identity, Gender, and Self-Threat," *Journal of Consumer Research*, 39(5), 1034–1050.

Elstak, Mirdita N. , Mamta Bhatt, Cees B. M Van Riel, et al. (2015), "Organizational Identification during a Merger: The Role of Self-Enhancement and Uncertainty Reduction Motives during a Major Organizational Change," *Journal of Management Studies*, 52(1), 32-62.

Faraji-Rad, Ali, and Michel Tuan Pham (2017), "Uncertainty Increases the Reliance on Affect in Decisions," *Journal of Consumer Research*, 44(1), 1-21.

Fenigstein, Allen, Michael F. Sheier, and Arnold H. Buss (1975), "Public and Private Self-Consciousness: Assessment and Theory," *Journal of Consulting and Clinical Psychology*, 43(4), 522–27.

Gallo, Inigo, Lily Jampol, Alberto Rampullo, and Thomas Gilovich (2018), "Surprise! The Positive Impact of Uncertainty on the Evaluation of Experiential Purchases," *ACR North American Advances*.

Gao, Leilei, S. Christian Wheeler, and Baba Shiv (2009), "The 'Shaken Self': Product Choices as a Means of Restoring Self-View Confidence," *Journal of Consumer Research*, 36(1), 29–38.

Gilovich, Thomas, and Inigo Gallo (2020), "Consumers' Pursuit of Material and Experiential Purchases: A Review", *Consumer Psychology Review*, 3(1), 20-33.

Hogg, Michael A. (2007), "Uncertainty–Identity Theory," *Advances in Experimental Social Psychology*, 39, 69–126.

Howell, Ryan T., and Graham Hill (2009), "The Mediators of Experiential Purchases: Determining the Impact of Psychological Needs Satisfaction and Social Comparison," *The Journal of Positive Psychology*, 4(6), 511-522.

Howell, Ryan T., Paulina Pchelin, and Ravi Iyer (2012), "The Preference for Experiences Over Possessions: Measurement and Construct Validation of the Experiential Buying Tendency Scale," *The Journal of Positive Psychology*, 7(1), 57-71.

Kagan, Jerome (1972), "Motives and Development," *Journal of Personality and Social Psychology*, 22(1), 51–66.

Kahneman, Daniel, Jack L. Knetsch, and Richard H. Thaler (1990), "Experimental Tests of the Endowment Effect and the Coase Theorem," *Journal of political Economy*, 98(6), 1325-1348.

Laurin, Kristin, Aaron C. Kay, and David A. Moscovitch (2008), "On the Belief in God: Towards an Understanding of the Emotional Substrates of Compensatory Control," *Journal of Experimental Social Psychology*, 44 (6), 1559–1562.

McGregor, Ian, Mark P. Zanna, John G. Holmes, and Steven J. Spencer (2001), "Compensatory Conviction in the Face of Personal Uncertainty: Going to Extremes and Being Oneself," *Journal of Personality and Social Psychology*, 80(3), 472–488.

Mittal, Chiraag, and Vladas Griskevicius (2014), "Sense of Control Under Uncertainty Depends on People's Childhood Environment: A Life History Theory Approach," *Journal of Personality and Social Psychology*, 107(4), 621-637.

Mittal, Sarah, Sommer Kapitan, and David H. Silvera (2019), "Go big or go home: Risk seeking for experiential choices," *Journal of Consumer Behaviour*, 18(2), 97-108.

Morewedge, Carey K. and Colleen E. Giblin (2015), "Explanations of the Endowment Effect: An Integrative Review," *Trends in Cognitive Sciences*, 19(6), 339-48.

Oleson, Kathryn C., Kirsten M. Poehlmann, John H. Yost, Molly E. Lynch, and Robert M. Arkin (2000), "Subjective Over Achievement: Individual Differences in Self-Doubt and Concern with Performance," *Journal of Personality*, 68 (3), 491–524.

Paundra, Joshua, Laurens Rook, Jan Van Dalen, and Wolfgan Ketter (2017), "Preferences for Car Sharing Services: Effects of Instrumental Attributes and Psychological Ownership," *Journal of Environmental Psychology*, 53, 121-130.

Pierce, Jon L., Tatiana Kostova, and Kurt T. Dirks (2001), "Toward A Theory of Psychological Ownership in Organizations," *Academy of Management Review*, 26, 298–310.

Reb, Jochen, and Terry Connolly (2007), "Possession, Feelings of Ownership and the Endowment Effect," *Judgment and Decision Making*, 2(2), 107-114.

Rosenzweig, Emily and Thomas Gilovich (2012), "Buyer's Remorse or Missed Opportunity?" *Journal of Personality and Social Psychology*, 102(2), 215–223.

Rucker, Derek D. and Adam D. Galinsky (2009), "Conspicuous Consumption versus Utilitarian Ideals: How Different Levels of Power Shape Consumer Behavior," *Journal of Experimental Social Psychology*, 45(3), 549–555.

Savary, Jennifer, and Ravi Dhar (2020), "The Uncertain Self: How Self-Concept Structure Affects Subscription Choice," *Journal of Consumer Research*, 46(5), 887-903.

Shen, Luxi, Ayelet Fishbach, and Christopher K. Hsee (2015), "The Motivating-Uncertainty Effect: Uncertainty Increases Resource Investment in the Process of Reward Pursuit," *Journal of Consumer Research*, 41(5), 1301-1315.

Shen, Luxi, Christopher K. Hsee, and Joachim H. Talloen (2019), "The Fun and Function of Uncertainty: Uncertain Incentives Reinforce Repetition Decisions," *Journal of Consumer Research*, 46(1), 69-81.

Shu, Suzanne B. and Joann Peck (2011), "Psychological Ownership and Affective Reaction: Emotional Attachment Process Variables and the Endowment Effect," *Journal of Consumer Psychology*, 21(4), 439–452.

Tully, Stephanie M. and Eesha Sharma (2018), "Context-Dependent Drivers of Discretionary Debt Decisions: Explaining Willingness to Borrow for Experiential Purchases," *Journal of Consumer Research*, 44(5), 960-973.

Tully, Stephanie M., Hal E. Hershfield, and Tom Meyvis (2015), "Seeking lasting enjoyment with limited money: Financial constraints increase preference for material goods over experiences," *Journal of Consumer Research*, 42(1), 59-75.

van den Bos, Kees (2009), "Making Sense of Life: The Existential Self Trying to Deal with Personal Uncertainty," *Psychological Inquiry*, 20(4), 197–217.

Weiss, Liad and Gita V. Johar (2013), "Egocentric Categorization and Product Judgment: Seeing Your Traits in What You Own (and Their Opposite in What You Don't)," *Journal of Consumer Research*, 40(1), 185–201.

——— (2016), "Products as Self-Evaluation Standards: When Owned and Unowned Products Have Opposite Effects on Self-Judgment," *Journal of Consumer Research*, 42(6), 915–930.

Whillans, Ashley V., Aaron C. Weidman, and Elizabeth W. Dunn (2016), "Valuing Time Over Money Is Associated With Greater Happiness," *Social Psychological and Personality Science*, 7(3), 213-222.

Wittkowski, Joachim (2001), "The Construction of the Multidimensional Orientation toward Dying and Death Inventory," *Death Studies*, 25(6), 479–495.

Time Machine to the Future The Potentials and Risks of Using Virtual Reality to Stimulate Saving Behavior

Andrea Weihrauch, University of Amsterdam, Netherlands
Tobias Schlager, HEC Lausanne, Switzerland

EXTENDED ABSTRACT

Every consumer faces the risk to experience (unexpected) negative life event (i.e., job loss, divorce). Such negative events often come with financial consequences, and can significantly affect the financial situation of consumers (McKay and Kempson 2003). The best way to (financially) prepare would be to create a "safety buffer". However, evidence suggest that many consumers are financially unprepared (Macrae et al. 2017; Peetz and Buehler 2009). One of the main reasons for this "lack of preparation" is that they are unable or unmotivated to imagine their future (Gilbert and Ebert 2002).

One strategy to help consumers to prepare for negative life events is to expose them to simulations of the future. Loewenstein (1996) theorized that a vivid impression of a future situation can substantially affect people's current behavior. Exposing consumers to a simulation of a future event should enable them to better imagine its occurrence, and may eventually motivate them to (financially) prepare for that event. Traditionally, firms used videos to simulate those events. However, the development of new technologies provides different opportunities to immerse people. There are many examples for VR use to simulate negative life events (i.e., an UK insurance company exposes consumers to a house fire to encourage the purchase of an insurance).

Initial evidence suggests that Virtual Reality (VR) can indeed effectively simulate future events and encourage people to adapt their behavior. For instance, Hershfield et al. (2011) showed that exposing people to an age-progressed avatar of their future selves in VR increases their willingness to save money for retirement.

While such findings shed a positive light on the ability of using VR simulations to motivate and enable saving behavior, using VR could have downsides: Not only is creating VR stimuli costly, but the high level of immersion such simulations produce could lead to some unexpected risks. Increased immersion entails that the experience is more confronting. For instance, experiencing an extremely realistic simulation of being laid off, is likely perceived to be painful and uncomfortable. Imaging a very negative life event might trigger cognitive defenses (Miceli and Castelfranchi 1998), with the result that consumers underestimate the likelihood of the event or deny its impact (Parfit 1984; Taylor 1991). Thoughts such as "this would never happen to me" could in the worst case even be demotivating.

This leads us to the following three hypotheses:

Hypothesis 1:   *Exposure to more immersive simulations (VR vs. video) of negative future events decreases saving motivation.*

Hypothesis 2:   *Exposure to more immersive simulations (VR vs. video) of negative future events triggers cognitive defenses, which in turn lead to a decrease in saving motivation.*

Hypothesis 3:   *Framing the negative life event as more positive can attenuate the negative effect of immersion on saving motivation.*

We conducted a series of stimuli pretests and two laboratory experiments to examine whether and how using VR to simulate life events affects saving behavior. Together with a professional VR company and an actor with many years of industry experience, we designed a simulation of a negative live event, namely the temporarily loss of employment. We used this negative life event as it 1) has the strongest negative impact on consumers financial situation (compared to e.g., parenthood, divorce, or bereavement), 2) is a negative life event that many consumers experience at some point in their life, 3) can occur in different stages of one's life. During the simulation, consumers "walked" into an office, took a seat across from their boss, and were informed that their work contract would be changed, and that they would experience a significant decrease in income for a six-month period.

In study 1, we exposed participants (n = 237, 48.1% female, M_{age} = 19.98) to that stimulus in high immersion (VR) and low immersion video (video). We assessed their self-reported saving motivation, and an incentive-conform measure of saving behavior. We also tested an intervention to provide some evidence of the suggested process of activated cognitive defenses, and included a negatively-framed version of the life event, as well as a positively-framed version.

In study 2 (n = 333, 52.9% female, M_{age} = 20.18), we replicated the procedure of Study 1 and further included an additional condition: a negative scenario (both in video and VR) with an intervention aimed to remove possible cognitive defenses. As argued, participants likely use arguments such as "this will never happen to me". To mitigate this, we asked participants after exposure to the negative scenario to provide one or more reasons why such a temporary unemployment is likely to occur to them.

Our results show that the prevailing notion "the more immersion is always better" might not always be true. For negative life event, less immersive technologies than VR (such as video simulations) can be more efficient to stimulate saving behavior. The underlying reason is that a too realistic simulation of a negative event triggers cognitive defenses in consumers. Should the use of VR still be considered, accompanying the simulation with a task to remove these cognitive defenses is advised to attenuate the negative effect of immersion on saving motivation. This seems to be a more effective strategy than framing the negative event as more positive.

This manuscript makes important contributions to 1) the literature examining the potential of VR to change consumer behavior; 2) research aiming to better (financially) prepare consumers for their future; 3) research on positive versus negative information, and 4) literature on cognitive defenses. In sum, it supports the growing literature on the intersection of financial, technological and behavioral sciences.

The insights of our studies should inform both companies and public policy makers, and ultimately consumers. Our results provide concrete guidelines in designing the best instrument to better prepare customers for the financial implications of (negative) life events.

REFERENCES

Gilbert, D. T. and J.E. Ebert (2002), "Decisions and revisions: The affective forecasting of changeable outcomes," *Journal of personality and social psychology*, *82*(4), 503.

Hershfield, H. E. (2011), "Future self-continuity: How conceptions of the future self -transform intertemporal choice," *Annals of the New York Academy of Sciences*, *1235*(1), 30-43.

Hershfield, H. E., D.G. Goldstein, W.F. Sharpe, J. Fox, L. Yeykelis, L.L., Carstensen, and J.N. Bailenson (2011), "Increasing saving behavior through age-progressed renderings of the future self," *Journal of Marketing Research*, *48*(SPL), 23-37.

Loewenstein, G. (1996), "Out of Control: Visceral Influences on Behavior," *Organizational Behavior and Human Decision Processes*, *65*(3), 272–92.

Macrae, C. N., J.P. Mitchell, M. Golubickis, N.S. Ho, R. Sherlock, R., Parlongo, O.C.M. Simpson, and B.M Christian (2017), "Saving for your future self: The role of imaginary experiences," *Self and Identity*, *16*(4), 384-98.

McKay, S. and E. Kempson (2003), *Savings and life events*. Leeds: Corporate Document Services.

Miceli, M. and C. Castelfranchi (1998), "How to silence one's conscience: Cognitive defenses against the feeling of guilt," *Journal for the Theory of Social Behaviour*, *28*(3), 287-318.

Parfit, D. (1984). *Reasons and persons*. Oxford: Clarendon Press.

Peetz, J. and R. Buehler (2009), "Is there a budget fallacy? The role of savings goals in the prediction of personal spending," *Personality and Social Psychology Bulletin*, *35*(12), 1579-91.

Taylor, S.E. (1991), "Asymmetrical effects of positive and negative events: the mobilization-minimization hypothesis," *Psychological bulletin*, *110*(1), 67.

The Environmental Consequences of People's Moods: Positive Moods and Disposal Behavior

Sarah Whitley, University of Georgia, USA
Remi Trudel, Boston University, USA
Weston Baxter, Imperial College London, UK

EXTENDED ABSTRACT

Recycling presents a real way to combat climate change, but can something as simple as your mood influence your likelihood to recycle? We suggest that positive moods increase one's likelihood to recycle with behavioral evidence observed both in the lab and on an aggregate level in the community.

Every day people are faced with disposal decisions: whether to keep, trash, or recycle an object. The US EPA concludes that recycling provides a real way to help address climate change. Unfortunately, much of what ends up in landfills could have been recycled (US EPA 2012). Prior research has shown a number of cognitive factors that influence one's decision to trash versus recycle (product form, Trudel and Argo 2013; identity-relevance, Trudel, Argo, and Meng et al. 2016a; proximity, Catlin and Wang 2013), but what about affective factors? Research has seldom explored affective influences on sustainable behaviors. Ad/image-induced negative emotions (sadness/guilt) from environmental campaigns have been shown to increase environmental concern (Schwartz and Loewenstein 2017; Sevillano, Aragonés, and Schultz 2007), other work has shown that people are waste averse and consume less resources to avoid negative emotions from wasting (Sun and Trudel 2017), but research has yet to explore the influence of incidental affect on disposal decisions. In this work, we examine whether affect, specifically mood, influences consumers' disposal decisions: the choice to trash vs. recycle an object.

Across four studies, we examine if and in what manner mood may influence recycling behavior. In our first two studies, using historical recycling collection data (i.e., community refuse pickup amounts), we test for evidence of a relationship between macroeconomic events that influence mood (e.g., sporting event outcomes, weather) and observed/measured recycling behavior. Next, we explore the causal direction of this hypothesized relationship in the lab by observing participants' decision to recycle versus trash a piece of scrap paper after being induced into a positive, negative, or neutral mood state. Lastly, we propose that one of the mechanisms driving the effect of mood on recycling behavior is consumers' ability to correctly categorize products at the point of disposal decision (i.e., deciding if the object should go into the recycle vs. trash bin), as positive moods engender more flexible cognitive categorizations (Isen and Daubman 1986).

STUDY 1

Recycling is a highly observable behavior in that it is quantified on both an individual and aggregate level. Consumers in charge of their own recycling collections deposit it at a recycling facility and pay fees according to the weight of the recycled content, while community

collections do this on an aggregate scale, keeping records of daily, weekly, and monthly recycled content. Provided this wide-scale quantification of recycling behavior, we first examined whether it is possible to observe a relationship between mood and observed recycling collection amounts. While it is not possible to measure each individual's mood when considering wide-scale community collection observations, there are certain types of events that can impact the general mood of a community. Prior research suggests that sporting event outcomes significantly impact mood (Edmans, Garcia, and

Norli 2007), and thus we examine the impact of sporting event outcomes on a community highly invested in the outcomes of a specific sport: college basketball. Using collegiate basketball game results as a proxy for mood, we examine the effect of historical basketball game outcomes on observed college campus recycling collections.

Method

We collected daily recycling collection amounts (lbs), spanning 2012-2016, from four U.S. universities whose men's basketball teams were ranked in the top 30 of the 2016 pre-season NCAA Division 1 Men's College Basketball Rankings. Looking at the first recycling collection date following each historical basketball game from 2012-2016, school-specific campus recycling collections were regressed on basketball game outcomes (wins vs. losses/ties) to test for any relationship between mood and recycling behavior.

Data and Variables. Each university had a different recycling collection schedule (e.g., Monday/Thursday, Tuesday/Friday, etc.), resulting in each collection date (i.e., the day recycling was collected from the bin and weighed by the city) representing the amount collected over a varied period of days. To create a dependent variable comparable across schools at the collection date level, we calculated the average daily recycling amount for each collection date by simply dividing the total weight (lbs) of recycling content collected on each school-specific collection date by the number of days content accumulated in the recycling bin (i.e., # of days since last collection date). This resulted in our dependent variable of average daily recycling (lbs/day) for each collection date. Our final dataset included 373 collection day observations.

Historical game outcomes (win, loss, tie) were matched to the first recycling collection date immediately following the date of the game. In some cases, more than one basketball game occurred before a single recycling collection date; to account for this, we calculated a "Majority Wins" independent variable characterizing whether the majority of games occurring before the collection date were wins (Majority Wins=1) or losses/neutral (Majority Wins=0).

Results and Discussion

We used a linear mixed effects model (ML estimation) with game wins (Majority Wins) as the fixed effect predictor and both school and season (i.e., 2012-2013) as random effects to analyze their association with daily average recycling. Basketball game wins were associated with a significant increase in average daily recycling (b=1,096.14, SE=523.25, t=2.10, p=.037), suggesting a positive correlation between mood and recycling behavior.

STUDY 2

We next sought to replicate the results of the prior study using another historical data analysis employing a different macro-level proxy for mood: weather. Weather has been shown to influence people's moods, with good weather bringing about positive moods and inclement weather prompting negative moods (Hirshleifer and Shumway 2003; Schwarz and Clore 1983). Using precipitation as a proxy for negative mood, we examine the effect of historical precipitation levels on neighborhood recycling collection amounts. Lastly, unlike Study 1, we were able to obtain data about trash collection

amounts from our source and thus incorporate the effects of trashing behavior in our analysis of recycling.

Method

One year (4/1/2015-3/31/2016) of daily curbside trash and recycling collection amounts (metric tons) were obtained for 14 neighborhoods in a London suburb, resulting in a total of 2,831 curbside collection date observations across 203 individual collection dates. These daily collection amounts were regressed upon daily precipitation (mm) data for the London area for the same dates.

Data and Variables. Since the neighborhoods operated according to different collection schedules (e.g., Monday/Thursday, Tuesday/Friday, etc.), in the same vein as Study 1, a dependent variable of average daily recycling (metric tons/day) was created to allow for comparisons across neighborhoods by collection date. We created an average daily trash (metric tons/day) variable in the same manner. Trash served as a covariate in our analysis to evaluate the independent effect of precipitation on recycling absent any effects from trash. Daily precipitation (mm) was averaged over the days contained within each collection period (i.e., period between prior collection date and current collection date – days over which content accumulated in the bin) and served as our independent variable of average daily precipitation (mm/day).

Results and Discussion

We used a linear mixed effects model (ML estimation) with average daily precipitation as a fixed effect predictor and neighborhood as a random effect. We also controlled for average daily trash collected, holiday occurrence, and collection pickup schedule (Monday/Thursday vs. Tuesday/Friday) by adding them as fixed effects in the model. Our analysis revealed that increases in precipitation (i.e., a proxy for increased negative mood) was associated with a significant decrease in the amount of recycled content collected (b=-.001, SE=.0003, t=-3.36, p=.001). This suggest that negative mood has a negative impact on recycling, supporting the same conclusion from Study 1 that mood is positively correlated with recycling (i.e., recycling moves in the same direction as mood).

While the covariate of average daily trash had a significant positive relationship with recycling (b=.214, SE=.006, t=34.88, p<.001), a separate analysis with trash as the dependent variable revealed that precipitation had a negative effect on average daily trash collected (b=.004, SE=.001, t=-4.75, p<.001). Together, these results suggest that the negative association of precipitation and recycling holds over and above precipitation's influence on trash collected.

Additionally, an analysis using standardized variables confirmed that the negative effect of precipitation on recycling (β=-.074) was greater in magnitude than that of precipitation on trash (β=-.064).

STUDY 3

While Studies 1 and 2 provide correlational evidence of the relationship between mood and recycling behavior in the real-world, in this study we use a controlled lab environment to show that mood directly causes changes in recycling. Additionally, it is not clear if the positive correlation between mood and recycling is due to positive moods increasing recycling or negative moods decreasing recycling. By adding a neutral mood condition, we can disentangle the effect of positive versus negative moods on recycling.

Method

Participants and design. Undergraduate participants (N=234) were randomly induced with either a positive (n=69), negative (n=74), or neutral (n=69) mood and their disposal behavior of a piece of scrap paper was recorded.

Procedure. Participants sat at a lab computer and were provided with a small piece of paper (3x1.5 inch) with a 3-digit code. This small paper was used because although paper is recyclable, small prices of paper have been shown in prior research to often be trashed rather than recycled (Trudel & Argo 2013), providing a refuse object that is capable of being either recycled or trashed and for which people show inherent variance in their disposal behavior. Depending on their assigned condition, participants were asked to read a positive, negative, or neutral online news article (Fishbach and Labroo 2007) and then asked to reflect on their own experiences and write a short news-like article detailing one of the saddest, happiest, or a typical day in their life, respectively. Upon finishing the mood manipulation task, participants were told to "dispose of their paper on the way out." Directly outside the lab were two disposal bins, labeled "Trash" and "Recycle." Data was collected at the end of the day by a research assistant who counted the number of pieces of paper in the trash versus recycling bins. The codes on each disposed paper was used to link participant disposal behavior with assigned condition.

Results and Discussion

Twenty-two participants left with the paper, leaving 212 observations (59.4% female; M_{age}=19.84 years). A binary logistic regression (Trash=0, Recycle=1) revealed that mood influenced recycling (χ^2(2)=9.83, p=.007). Participants recycled significantly more when in a positive mood (44.9%) than in a negative (25.7%; β=.86, p=.017) or neutral mood (21.7%; β=1.08, p=.004; See Figure). Disposal behavior between the negative and neutral mood conditions did not differ (β=.22, p=.581). These results provide causal support for the positive relationship between mood and recycling and suggest this effect is driven by a positive mood increasing recycling, rather than a negative mood discouraging recycling.

STUDY 4

Various affective, motivational, and cognitive mechanisms may underlie the observed effect of mood on recycling behavior. Since recycling and trashing are associated with positive and negative affect, respectively (Sun and Trudel 2017), people in positive moods may be more likely to recycle in order to maintain their positive mood state (Wegener and Petty 1994).

Additionally, as recycling is often a more effortful task than trashing, since positive moods have been shown to increase effort (Erez and Isen 2002; Fishbach and Labroo 2007), this suggests people with positive moods may be more likely to recycle. We suggest that despite these affective and motivational mechanisms, we believe part of the reason positive mood increases one's likelihood to recycle is cognitive. The decision to recycle, itself, is a cognitive one: when faced with an article of refuse, a consumer must decide to either recycle or trash the object.

However, consumers often erroneously categorize recyclable items as trash and throw them in the trash bin rather than the recycling bin (Trudel, Argo, and Meng 2016b). Positive moods lead to more flexible categorizations (Isen and Daubman 1986) and we suggest that consumers in positive moods will be more likely to categorize fringe exemplars (e.g., smashed cans, scrap paper; Trudel and Argo 2013) correctly as something to be recycled rather than trashed. In this study, we evaluate whether mood influences how consumers categorize fringe exemplars of recyclable products (i.e., scrap paper), as correct categorization should theoretically drive correct disposal.

Method

Participants and design. Undergraduate participants (N=166) were randomly induced with either a positive (n=56), negative (n=55), or neutral (n=55) mood and asked about their categorization of a piece of scrap paper.

Procedure. Analogous to Study 3, participants sat at a lab computer and were provided with a small piece of paper (3 x 1.5 in) with a 3-digit code before being induced with a positive, negative, or neutral mood. The same mood manipulation from Study 3 was used. Participants were then asked to focus on piece of paper and indicate "how much is the paper like trash?" (1=Not at all like Trash; 5 = Exactly like Trash), a measure used to investigate the categorization of recyclable material (Trudel et al. 2016b).

Results and Discussion

ANOVA results revealed differences in categorization between mood conditions ($F(2, 163) = 4.78$, $p = .010$). Specifically, participants in a positive mood ($M = 2.59$, $SD = 1.33$) were less likely to rate the scrap paper as typical of trash compared to participants in a negative mood ($M = 3.27$, $SD = 1.18$; $p = .003$) or neutral mood ($M = 3.04$, $SD = 1.02$, $p = .048$). There was no difference in categorization of the scrap paper between participants in the negative and neutral mood conditions ($p = .297$). Supporting our claim, these results show that people in positive moods are more integrative in their categorization and less likely to erroneously categorize a small piece of paper as trash. This proper categorization (as not trash) should theoretically lead to proper subsequent disposal (i.e., recycling), suggesting that positive moods should drive an increase in one's likelihood to recycle.

GENERAL DISCUSSION

Overall, we show that mood significantly impacts recycling behavior, both on an individual and aggregate level, with positive moods increasing recycling both among experimental induced moods and naturally occurring mood states from macro-level events. We find that positive moods make consumers more likely to recycle a recyclable object (Study 3), and believe this greater likelihood to properly recycle objects (rather than trash them) underlie the positive relationship between mood and recycled content observed in Studies 1 and 2 (i.e., recycled content can only increase by more recycling-capable content being placed in the bin). While affect regulation and motivational mechanisms may certainly play a role in the impact of positive moods on recycling, we suggest that reduced improper categorization of recyclable products as trash under a positive mood (Study 4) underlies the observed increase in recycling associated with positive mood.

This work adds to prior research noting the mixed effects of mood on traditional prosocial behaviors focused on helping others (e.g., donating, volunteering, helping with a task; Salovey and Rosenhan 1989; Carlson, Charlin, and Miller 1988), by exploring the impact of mood on a sustainable behavior (i.e., recycling), a decidedly both self- and other-helping behavior. Lastly, in addition to the more cognitive (Jenkins et al. 2003; Reschovsky and Stone 1994; White, MacDonnell, and Dahl 2011), social (Goldstein, Cialdini, and Griskevicius 2008) and convenience-based (Halvorsen 2008) antecedents of disposal decisions, we find that affect, specifically incidental mood influences one's decision to recycle.

REFERENCES

Carlson, M., Charlin, V., & Miller, N. (1988). Positive mood and helping behavior: a test of six hypotheses. *Journal of Personality and Social Psychology*, 55(2), 211-229.

Catlin, J. R., & Wang, Y. (2013). Recycling gone bad: when the option to recycle increases resource consumption. *Journal of Consumers Psychology*, 23(1), 122-127.

Edmans, A., Garcia, D., & Norli, O. (2007). Sports sentiment and stock returns. *The Journal of Finance,* 62(4), 1967-1998.

Erez, A., & Isen, A. M. (2002). The influence of positive affect on the components of expectancy motivation. *Journal of Applied Psychology*, 87(6), 1055-1067.

Fishbach, A., & Labroo, A. A. (2007). Be better or be merry: how mood affects self- control. *Journal of Personality and Social Psychology*, 93(2), 158-173.

Goldstein, N. J., Cialdini, R. B., & Griskevicius, V. (2008). A room with a viewpoint: using social norms to motivate environmental conservation in hotels. *Journal of Consumer Research*, 35(3), 472-482.

Halvorsen, B. (2008). Effects of norms and opportunity cost of time on household recycling. *Land Economics*, 84(3), 501-516.

Hirshleifer, D., & Shumway, T. (2003). Good day sunshine: stock returns and the weather. *The Journal of Finance*, 58(3), 1009-1032.

Isen, A. M., & Daubman, K. A. (1986). The influence of affect on categorization. *Journal of Personality and Social Psychology*, 47(6), 1206-1217.

Jenkins, R.R., Martinez, S.A., Palmer, K., & Podolsky, M. J. (2003). The determinants of household recycling: a material-specific analysis of recycling program features and unit pricing. *Journal of Environmental Economics and Management*, 45(2), 294-318.

Reschovsky, J. D., & Stone, S. E. (1994). Market incentives to encourage household waste recycling: paying for what you throw away. *Journal of Policy Analysis and Management*, 13(1), 120-139.

Salovey, P., & Rosenhan, D. L. (1989). Mood states and prosocial behavior. *Handbook of Social Psychophysiology*, 371-391.

Schwartz, D., & Loewenstein, G. (2017). The chill of the moment: emotions and proenvironmental behavior. *Journal of Public Policy & Marketing*, 36(2), 255-268.

Schwarz, N., & Clore, G. L. (1983). Mood, misattribution, and judgments of well-being: Informative and directive functions of affective states. *Journal of Personality and Social Psychology*, 45(3), 513-523.

Sevillano, V., Aragonés, J. I., & Schultz, P. W. (2007). Perspective taking, environmental concern, and the moderating role of dispositional empathy. *Environment and Behavior*, 39(5), 685-705.

Sun, M., & Trudel, R. (2017). The effect of recycling versus trashing on consumption: theory and experimental evidence. *Journal of Marketing Research*, 54(2), 293-305.

Trudel, R., & Argo, J. J. (2013). The effect of product size and form distortion on consumer recycling behavior. *Journal of Consumer Research*, 40(4), 632-643.

Trudel, R., Argo, J. J., & Meng, M. D. (2016a). The recycled self: consumers' disposal decisions of identity-linked products. *Journal of Consumer Research*, 43(2), 246-264.

Trudel, R., Argo, J. J., & Meng, M. D. (2016b). Trash or recycle? How product distortion leads to categorization error during disposal. *Environment and Behavior*, 48(7), 966-985.

US Environmental Protection Agency (2012). Municipal Solid Waste in the United States: 2012 Facts and Figures," https://archive.epa.gov/epawaste/nonhaz/municipal/web/pdf/2012_msw_fs.pdf.

Wegener, D. T., & Petty, R. E. (1994). Mood management across affective states: the hedonic contingency hypothesis. *Journal of Personality and Social Psychology*, 66(6), 1034-048.

White, K. M., MacDonnell, R., & Dahl, D.W. (2011). It's the mind-set that matters: the role of construal level and message framing in influencing consumer efficacy and conservation behaviors. *Journal of Marketing Research*, 48(3), 471-485.

Examining the Ongoing Process of 'Hegemonic Legitimacy' of Meat: a *Discursive* Institutional Perspective on Market Maintenance

Lucie Wiart, Université de Lille, France
Deirdre Shaw, University of Glasgow, Scotland, UK
Nil Özçaglar-Toulouse, Université de Lille, France

EXTENDED ABSTRACT

In marketing, the study of how markets evolve through different dynamics or logics has been well developed (Ertimur and Coskuner-Balli, 2015). In most of these studies, institutional perspectives have been adopted for examining processes of market legitimacy creation, evolution, and maintenance (see Humphreys and LaTour, 2013; Humphreys, 2010; Kates, 2004; Scaraboto and Fischer, 2012). However, the process of legitimacy maintenance has been neglected. Also, while the process of legitimacy across the three areas of market creation, evolution and maintenance has been conceptualized, the relationships between these processes have not been empirically examined. Such an omission is important as markets are not static, thus, we would expect movement between and within these concepts. Furthermore, market maintenance requires ongoing effort over time, suggesting a process of evolution which may require elements of market creation. Therefore, in highlighting the need to examine market maintenance we also highlight the need to examine the process of legitimacy as a whole to understand the role of market maintenance within this process not in isolation from it.

To achieve this we focus on discursive aspects of legitimacy to consider power relations and struggles (Vaara and al, 2006; Vaara and Tienari, 2008; Vaara and Monin, 2010; Johnson, 2017). Indeed, some research understands legitimacy as a process of *discursive struggle* through which discourses both attempt to either resist or reproduce and reinforce legitimacy (Laine and Vaara, 2017). We specifically draw on Critical Discourse Studies (CDS) considering discourse as a practice of constructing the social world and meanings (Fairclough and Wodak, 1997; Jorgensens and Phillips, 2002). From this perspective, the market could be considered as an entirely discursive formation: it provides concepts, objects, and subject positions (Fairclough, 1992; Phillips and Hardy, 1997). The three processes of market creation, evolution and maintenance would necessarily be linked to the discursive constructions of concepts, objects and subject positions. The context of discursive struggles over these three differing constructs will shed light on the market as dynamic across the processes of legitimacy. Such an approach will reveal how market as a discourse is (re)created and evolving and the resultant relationship and impact on market maintenance.

To examine these discursive processes, we focus on the context of meat consumption, which has a long history of critique (Spencer, 2000) right up to present day links between meat consumption and climate change (Springmann et al, 2018). Although consumers have been converting to vegan, vegetarian and flexitarian diets in increasing numbers, demand for meat is increasing globally (Godfray et al, 2018). In this paper we ask how a food source that has been challenged over a significant time period has managed to maintain its legitimacy.

We draw on a 'discourse-historical approach' (Wodak, 2001; Reisgl, 2018; Reisgl and Wodak, 2015) that puts emphasis on historical anchoring and how discourses are subject to diachronic change. We conducted a historical discourse analysis from 1944 to 2019, gathering media articles on meat consumption from two French newspapers. The specific perspective of Laclau and Mouffe (1985) regarding hegemony and discourses is used to analyze the data and for developing theoretical insights.

We outline our findings across three key time periods representing points of discursive struggle between opposing ideologies in relation to meat (non)consumption and resulting challenges to legitimacy maintenance:

1944-1980: Meat as an industrial product

During this period we observe the creation, evolution and maintenance of meat as a legitimate industrial farm product articulated by commodity and scientific signifiers. Counter-hegemonic resistance is lacking and economic discourse is dominant, indeed, meat consumption is considered vital to support economic development.

1980-2019: Safe to eat?

The period from 1980 represented a '*period of dislocation*' (Laclau and Mouffe, 1985*)* where two major events, namely, 'hormonal veal' (1980) and 'mad cow disease' (1996) resulted in legitimacy threats in relation to the conceptualization of farm animals as objectified and industrialized. To maintain market legitimacy we observe the creation of a new discourse of 'Happy Meat', countering animal suffering while maintaining the position of meat as a food source. Accordingly, the subject position of 'Compassionate Carnivore' is created affording a humane identity to meat consumers.

2000-2019: Climate crisis

The mainstreaming of discourse around climate change position overconsumption of meat as unsustainable and unhealthy. From this we observe the creation of 'flexitarian' as a new moral and dominant subject-position enabling the construction of a responsible identity. Here the market created 'meat substitutes', offering a 'fake meat' product. In doing so, the concept of farm animal is gradually disarticulated from the concept of meat, the new meat-substitute market completely erases the animal signifier. Through this new market, negative signifiers associated with farm animals and livestock sectors are, therefore, not co-opted, rather erased. Such a creation, maintains the position of 'meat' as food while shifting what the object of meat is in terms of what it comprises, either as plant based meat substitutes or lab meat grown from animal cells.

Our findings reveal that the process of legitimacy is dynamic across market creation, evolution and maintenance and that to maintain legitimacy requires engagement with creation and evolution in a non-linear circling between concepts. In this process we see discursive struggles forcing market creation and the evolution of meaning and relevance. Thus, to maintain hegemonic legitimacy necessities a continuously crafted discourse embedded within cultural and historical contexts, constantly arranging and recreating legitimacy through new articulations or reinforced processes of differentiation and chains of opposition.

We also develop a post-structural institutional understanding of individual resistance and agency toward a hegemonic market that could direct future research. Indeed where discourse is studied in research on market evolution, it is constructed by researchers as an instrument for actors to impact markets (see e.g., Giesler, 2012; Thompson, 2004; Kates, 2004; Press et al, 2014) or conceptualized as a reflector of underlying normative change (see Humphreys,

2010). This ignores the role of discourse as a vehicle for change in itself and as constitutive of social reality (Larsson, 2019). Here, we find that individual actors convey either dominant or alternative discourse through performing subject positions and could, therefore, be seen as instruments for market maintenance.

REFERENCES

Ben Slimane, K., Chaney, D., Humphreys, A. and Leca, B. (2019), Bringing institutional theory to marketing: Taking stock and future research directions, *Journal of Business Research*, 389-394

Ertimur, B., Coskuner-Balli, G. (2015) 'Navigating the Institutional Logics of Markets: Implications for Strategic Brand Management', *Journal of Marketing*, 79(2): 40–61.

Fairclough (N.) & Wodak (R.). 1997 Critical discourse analysis. In: van Dijk (T.). Discourse as Social Interaction. London: Sage.

Flowerdew, J. and Richardson, J.R, (2018), *The Routledge Handbook of Critical Discourse Studies*, Routledge, London and New York.

Giesler, M. (2012) 'How Doppelgänger Brand Images Influence the Market Creation Process: Longitudinal Insights from the Rise of Botox Cosmetic', *Journal of Marketing,* 76(November): 56–68

Godfray, C.J., Aveyard, P. Garnett, T., Hall, W. J., Key, T.J., Lorimer, J., Pierrehumbert, R.T., Scarborough, P., Springmann, M. and Jebb, S.A. (2018), Meat consumption, health and the environment, Science, 361: 6399

Humphreys, A. (2010). Semiotic Structure and the Legitimation of Consumption Practices: The Case of Casino Gambling, *Journal of Consumer Research*, 37(3)

Humphreys, A. and LaTour, K. (2013). Framing the game: Assessing the impact of cultural representations on consumer perceptions of legitimacy, *Journal of Consumer Research*, 40(4), 773-795

Johnson, G.D, Thomas, K.D et Grier, S.A (2017), When the burger becomes halal: a critical discourse analysis of privilege and marketplace inclusion, *Consumption Markets and Culture*

Jorgensens M. and Phillips, L, (2002), *Discourse analysis as Theory and Method*, Sage Publications, London

Kates, S. (2004), The Dynamics of Brand Legitimacy: An Interpretive Study in the Gay Men's Community, *Journal of Consumer Research*, 31-2, 455-464

Laclau, E. and Mouffe, C. (1985), *Hegemony and Socialist Strategy*, Verso, London

Reisigl, M. (2018), The *Discourse-Historical Approach*, in Flowerdew, J. and Richardson, J.R, (2018), The Routledge Handbook of Critical Discourse Studies, Routledge, London and New York.

Reisigl, M. and Wodak, R. (2016). *The discourse-historical approach*. In R. Wodak and M. Meyer (eds.), Methods of critical discourse studies, 3rd edn, 23–61. London, Thousand Oaks, CA, New Delhi: Sage.

Scaraboto, D. and E. Fischer (2013), Frustrated Fatshionistats: An Institutional Theory Perspective on Consumer Quests for Greater Choice in Mainstream Markets, *Journal of Consumer Research*, 39-6, 1234-1257

Spencer, C. (1993) *The Heretic's Feast, A history of vegetarianism*, Fourth Estate, London Springmann, M., Clark, M., Mason-D'Croz, D. et al. (2018) Options for keeping the food system within environmental limits. Nature 562, 519–525

Vaara, E., Tienari, J., & Laurila, J. (2006), Pulp and paper fiction: On the discursive legitimation of global industrial restructuring. *Organization Studies*, 27: 789–810.

Vaara, Eero, and Janne Tienari. (2008). "A Discursive Perspective on Legitimation Strategies in Multinational Corporations." *Academy of Management Review* 33 (4): 985–993.

Vaara, Eero. (2014), "Struggles over Legitimacy in the Eurozone Crisis: Discursive Legitimation Strategies and their Ideological Underpinnings." *Discourse & Society* 25 (4): 500–518.

Van Dijk, T. (1998). *Ideology: A multidisciplinary approach*. London: Sage

Counting Calories: How Calorie Perceptions and Estimates Diverge

Kaitlin Woolley, Cornell University, USA
Peggy Liu, University of Pittsburgh, USA

EXTENDED ABSTRACT

To manage calorie intake and achieve weight-related health goals, consumers often monitor calories expended and consumed (Campbell and Warren 2015; Jia et al. 2020). We identify a novel factor biasing calorie assessments and subsequent food choice: the estimation mode consumers use to evaluate calories burned during exercise or contained in a food portion.

We distinguish between two modes consumers use to estimate caloric consumption and expenditure—forming ordinal calorie estimates (i.e., "very few" to "very many" calories) versus forming absolute calorie estimates (i.e., numeric response). We propose that calorie estimates systematically diverge as a function of estimation mode, with important consequences for consumers' choices aimed at managing caloric intake. In addition, because both approaches are used interchangeably by researchers (Carels et al. 2006; Chernev, 2011; Liu et al. 2019), some conclusions based on prior findings may be moderated by estimation mode.

Type and Quantity as Inputs to Caloric Judgments

Calorie estimates are a function of both what a stimulus is in terms of its "type" (e.g., healthy vs. unhealthy food; easy vs. difficult exercise) and its "quantity" (e.g., food portion size; exercise duration). Prior research has found that information on type is "primary" in that it is processed before information on quantity (Liu et al. 2019).

We propose that consumers differentially rely on type versus quantity depending on whether they form ordinal or absolute estimates. First, we theorize that ordinal estimates involve categorical thinking driven by scale compatibility (Tversky et al. 1988; Fischer et al. 1999). That is, ordinal estimates anchor on type (more vs. less healthy food), and as this information is compatible with the ordinal estimate response scale (few vs. many calories), information on type is incorporated into their estimate (i.e., healthier food = fewer calories; less healthy food = more calories). After spontaneously considering type, we suggest that ordinal estimates then fail to adjust much for quantity. By contrast, we suggest that absolute estimates involve continuous thinking. Specifically, although type information is primary, this information is not compatible with the absolute estimate response scale (i.e., number of calories), and thus we suggest that forming absolute estimates prompts people to consider other information beyond type, leading them to incorporate quantity into their calorie estimate.

When Will Ordinal and Absolute Calorie Estimates Reverse?

If ordinal and absolute calorie estimates are differentially sensitive to type versus quantity information, these estimation modes should lead to calorie estimate reversals when type and quantity diverge. That is, estimates should diverge when considering calories burned by difficult, shorter (vs. easier, longer) workouts, or when considering calories contained in smaller, healthier food portions (vs. larger, less healthy portions). We test this theory across six studies (five pre-registered; see table 1a) by examining whether the effect of estimation mode (ordinal vs. absolute) diverges as a function of type/quantity.

Study 1 examined divergence in ordinal versus absolute estimates of calories burned for different exercises. Participants indicat-ed both ordinal estimates ("very few" to "a lot of" calories burned) or absolute estimates (numeric response). Ordinal estimates were greater for more intense, shorter exercises (e.g., 10-minutes of moderate biking) than for less intense, longer exercises (e.g., 30-minutes of slow biking) ($F(1, 395) = 52.75$, $p < .001$), which reversed when forming absolute estimates ($F(1, 395) = 5.18$, $p = .023$), despite equivalent objective calories burned across intensity/duration. Studies 2-6 examined this prediction within the food domain.

Study 2 assessed calories in a larger portion of healthier food (200-calorie almond snack plate) and a smaller portion of less healthy food (100-calorie chocolate covered almond snack plate). Participants indicated either ordinal estimates ("very few" to "many" calories) or absolute estimates (numeric response). Ordinal estimates of almonds (vs. chocolate covered almonds) were significantly lower ($t(121) = 6.50$, $p < .001$); this pattern attenuated for absolute estimates ($t(120) = .99$, $p = .325$). This divergence affected actual food choice: when choosing a snack plate with fewer calories to eat in the lab, more participants chose the larger portion of almonds when forming ordinal (vs. absolute) estimates (59.8% vs. 46.3%; $\chi^2(1, 243) = 4.48$, $p = .034$).

Study 3 replicated this effect and demonstrated consequences for consumer research by testing for moderation of an existing finding in the literature. First, we replicated a previous finding (study 2 in Chandon and Wansink 2007) that people forming absolute estimates estimate more calories in a Subway 12-inch turkey sub (larger, healthier) than in a McDonald's cheeseburger (smaller, less healthy) ($t(136) = 1.90$, $p = .059$). However, this pattern reversed when assessing ordinal calorie estimates, wherein people estimated fewer calories in the Subway's sandwich (vs. McDonald's cheeseburger) ($t(139) = -9.27$, $p < .001$).

Studies 4-6 demonstrate evidence for our underlying process. First, study 4 fully crossed type (almonds vs. chocolate covered almonds) and quantity (small vs. large portion), demonstrating that ordinal estimates are more sensitive to type ($F(1, 586) = 14.36$, $p < .001$), whereas absolute estimates are more sensitive to quantity ($F(1, 586) = 28.12$, $p < .001$).

Study 5 examined moderation within ordinal estimates by quantity primacy. Increasing the primacy of quantity information led those forming ordinal and absolute estimates to both estimate more calories in a larger portion of healthier food (vs. smaller portion of less healthy food). Lastly, study 6 examined moderation within absolute estimates by intuitive (vs. deliberative) mindset (e.g., Woolley and Risen 2018). Adopting an intuitive mindset (quick, immediate response) led those forming absolute and ordinal estimates to both estimate fewer calories in a larger portion of healthier food (vs. smaller portion of less healthy food).

Overall, six studies identified a novel bias in consumers' calorie estimates as a function of whether they made ordinal or absolute estimates. Depending on calorie estimate mode, we document predictable divergences between ordinal and absolute calorie estimates when evaluating stimuli that tradeoff on type and quantity. These findings are of consequence to consumers, as whether consumers use ordinal versus absolute estimates can affect their food choices, and for researchers, as the method of evaluating calories matters in terms of how consumers incorporate type and quantity.

REFERENCES

Campbell, Margaret C. and Caleb Warren (2015), "The Progress Bias in Goal Pursuit: When One Step Forward Seems Larger Than One Step Back," *Journal of Consumer Research*, 41 (5), 1316-31.

Carels, Robert A., Jessica Harper, and Krista Konrad (2006), "Qualitative Perceptions and Caloric Estimations of Healthy and Unhealthy Foods by Behavioral Weight Loss Participants," *Appetite*, 46 (2), 199-206.

CDC (2015), "Adult Obesity Facts," https://www.cdc.gov/obesity/data/adult.html.

Chaiken, Shelly and Yaacov Trope (1999), *Dual-Process Theories in Social Psychology*, New York: Guilford Press.

Chandon, Pierre and Brian Wansink (2007), "The Biasing Health Halos of Fast-Food Restaurant Health Claims: Lower Calorie Estimates and Higher Side-Dish Consumption Intentions," *Journal of Consumer Research*, 34 (3), 301-14.

Chernev, Alexander (2011), "The Dieter's Paradox," *Journal of Consumer Psychology*, 21 (2), 178-83.

Chernev, Alexander and Pierre Chandon (2011), "Calorie Estimation Biases in Consumer Choice," in *Leveraging Consumer Psychology for Effective Health Communication*, ed. Rajeev Batra, Punam A. Keller and Victor Strecher, Armonk, NY: M.E. Sharpe, 104-21.

Hayes, Andrew F. and Kristopher J. Preacher (2014), "Statistical Mediation Analysis with a Multicategorical Independent Variable," *British Journal of Mathematical and Statistical Psychology*, 67 (3), 451-70.

Hsee, Christopher K. (1996), "The Evaluability Hypothesis: An Explanation for Preference Reversals between Joint and Separate Evaluations of Alternatives," *Organizational Behavior and Human Decision Processes*, 67 (3), 247-57.

Jia, Miaolei Liam, Xiuping Li, and Aradhna Krishna (2020), "Contraction with Unpacking: When Unpacking Leads to Lower Calorie Budgets," *Journal of Consumer Research*, 46 (5), 853-70.

Kahneman, Daniel (2003), "A Psychological Perspective on Economics," *The American Economic Review*, 93 (2), 162-68.

Liu, Peggy J., Kelly L. Haws, Karen Scherr, Joseph P. Redden, James R. Bettman, and Gavan J. Fitzsimons (2019), "The Primacy of 'What' over 'How Much': How Type and Quantity Shape Healthiness Perceptions of Food Portions," *Management Science*, 65 (7), 3353-81.

Olshansky, S. Jay, Douglas J. Passaro, Ronald C. Hershow, Jennifer Layden, Bruce A. Carnes, Jacob Brody, Leonard Hayflick, Robert N. Butler, David B. Allison, and David S. Ludwig (2005), "A Potential Decline in Life Expectancy in the United States in the 21st Century," *New England Journal of Medicine*, 352 (11), 1138-45.

Sloman, Steven (2014), "Two Systems of Reasoning: An Update," in *Dual Process Theories of the Social Mind*, ed. Jeffrey W. Sherman, Bertram Gawronski and Yaacov Trope, New York: Guilford.

Say Cheese or Not?

Ruomeng Wu, Western Kentucky University, USA
Meng Liu, Independent Researcher
Ze Wang, University of Central Florida, USA
Ming-Shen Ho, Clemson University, USA

EXTENDED ABSTRACT

From Kraft's creation of "the smile noodle" to Herta's promotion of the "Herta makes a meal happy" campaign, smile is an essential marketing tactic for firms to better engage consumers. Indeed, smile is widely believed to activate positive emotions and generate favorable feedback in service and promotion contexts (e.g. Bugental 1986; Cheng, Mukhopadhyay, and Williams 2020; Mueser, Grau, Sussman, and Rosen 1984).

Smiles are not expressed in a vacuum. Consumers decode emotional expressions based on a set of emotion decoding rules in the communication context. While burgeoning research has explored how emotional expressions may elicit consumers' reactions in a variety of domains (Barger and Grandey 2006; Small and Verrochi 2009; Wang, Mao, Li, and Liu 2017), little is known about how the interplay of emotional expressions, displayer characteristics, and contextual factors collectively impact consumer inference. This research addresses this gap by highlighting the important roles of the displayer's social rank and consumers' decision time in consumers' interpretation of smiles.

Study 1 (N = 294) provides initial evidence of the proposed role of social rank in the interpretation of smiles. This study uses a 2 (smile type: slight vs. big) x 2 (rank: lower vs. higher) between-subjects design. To manipulate smile type, we showed participants a photo featuring a male employee's slight or big smile. To manipulate rank, the job position of the employee was either an office assistant or a manager. The rank manipulation was confirmed by a pretest with the same subject pool ($p = .02$). As expected, there was an interactive effect between smile type and rank ($F = 6.93$, $p = .01$), such that when the employee was an office assistant (lower rank), participants liked him more if he had a big rather than slight smile ($p = .04$). When the employee was a manager (higher rank), nevertheless, participants liked him less if he had a bigger smile ($p = .06$).

Study 2 (N = 229) replicates the proposed effects in an advertising context and extends the investigation to purchase intentions. We also investigate the moderating role of processing time. Consumers often make decisions under time pressure (Cristol and Sealey 1996; Dhar and Nowlis 1999). Consistent with the heuristic-systematic dual-processing model, consumers focus on fewer informational cues when they have limited time (Dhar and Nowlis 1999). When the processing time is shorter, we propose that consumers should focus on the overall communications and be less likely to process peripheral informational cues, such as social expectations for emotional displays.

This study has a 2 (smile type: slight vs. big) x 2 (rank: lower vs. higher) between-subjects design. Participants were shown one of four ads with a female displayer promoting a black tea. The female had either a big or a slight smile (confirmed by a manipulation check) and was titled as either doctor (pretested to have higher rank) or first name (pretested to have lower rank). We also measured processing time as a continuous variable by recording the time that participants spent on viewing the ad.

The three-way interaction effect (smile type x rank x processing time) on consumers' choice was significant (Wald's $\chi^2(1) = 5.11$, $p = .02$). Specifically, when participants spent longer time (1 SD above the mean) viewing the ad, they chose to buy the tea more often if the displayer addressed by her first name had a bigger smile ($p = .01$) but less often if the displayer addressed by her doctor title showed a bigger smile ($p = .03$). When participants spent less time (1 SD below the mean) viewing the ad, the smile type x rank interaction was not significant ($p = .66$). Additional analyses also revealed a significant three-way interaction (processing time x rank x smile) on consumers' purchase likelihood ($p = .04$). Similar patterns of results were observed.

Study 3 (N = 166) directly tests the mediation path and extends our investigation to emoji characters and brand rank. This study uses a 2 (smile type: slight vs. big) x 2 (rank: lower vs. higher) between-subjects design. We operationalize the rank by brand names and confirmed the effectiveness of this manipulation by pretests. Consistent with our main proposition, the analysis of liking as a function of rank and smile type yielded an interaction effect $(F = 10.02$, $p = .002)$. For the lower-rank brand, participants liked the design better if the emoji had a big smile ($p = .014$). For the higher-rank brand, participants liked the design more if the emoji had a slight smile ($p = .051$). More importantly, a mediation analysis (Model 8; Hayes 2013) directly supported our hypothesis about the mediating role of expectations for emotion displays concerning rank and smile type.

Study 4 (N = 214) extends our proposed effects to a field setting. This study has a 3 (smile type: slight vs. big vs. no smile) x 2 (rank: lower vs. higher) between-subjects design. Amazon Mechanic turkers were approached after they finished a paid task. We then pleaded them to participate in another task without extra payment. Following the same manipulations of smile type and rank in Study 3, we tracked the percentage of participants who accepted our request to finish the voluntary survey. In particular, when we introduced ourselves by a first name along with a big (vs. slight or no) smiley face at the end of the request description, participants had a higher compliance likelihood. However, when we introduced ourselves as a Ph.D. researcher, a slight smile led to a higher compliance rate (Wald's $\chi^2(1) = 6.64$, $p = .01$ for the interaction).

In conclusion, when a big (slight) smile is displayed matching the displayer's low (high) rank, consumers perceive a higher level of consistency with social expectations for emotion displays. Therefore, they like the displayer better and are more likely to purchase the associated product or service. As important evidence supporting this proposed conscious process, these results hold only when consumers have enough time to decode the emotional expression cues (smiles) in the communication process.

REFERENCES

Barger, Patricia B., and Alicia A. Grandey (2006). Service with a Smile and Encounter Satisfaction: Emotional Contagion and Appraisal Mechanisms. *Academy of Management Journal*, 49 (November), 1229-1238.

Bugental, Daphne Blunt (1986), "Unmasking the" Polite Smile" Situational and Personal Determinants of Managed Affect in Adult-Child Interaction," *Personality and Social Psychology Bulletin*, 12(March), 7-16.

Cheng, Yimin, Anirban Mukhopadhyay, and Patti Williams (2020), "Smiling Signals Intrinsic Motivation," *Journal of Consumer Research*, 46 (February), 915-935.

Cristol, Steven M., and Peter Sealey (1996), "Too much choice." *Marketing Management*, 5 (1), 14.

Dhar, Ravi, and Stephen M. Nowlis (1999), "The effect of time pressure on consumer choice deferral," *Journal of Consumer Research*, 25 (4), 369-84.

Hayes, Andrew F. (2013), *Introduction to Mediation, Moderation, and Conditional Process Analysis*, New York: Guildford.

Mueser, Kim T., Barry W. Grau, Steve Sussman, and Alexander J. Rosen (1984), "You're Oly as Pretty as You Feel: Facial Expression as a Determinant of Physical Attractiveness," *Journal of Personality and Social Psychology*, 46(2), 469-478.

Small, Deborah A., and Nicole M. Verrochi (2009), "The Face of Need: Facial Emotion Expression on Charity Advertisements," *Journal of Marketing Research*, 46 (December), 777-787.

Wang, Z., Mao, H., Li, Y. J., & Liu, F. (2017). Smile big or not? Effects of smile intensity on perceptions of warmth and competence. *Journal of Consumer Research*, 43 (February), 787-805.

The Effect of Product Evaluations on Consumer Recycling Behavior

Vivian (Jieru) Xie, Virginia Tech, USA
Rajesh Bagchi, Virginia Tech, USA

EXTENDED ABSTRACT

While the industrial revolution has heralded an age of unprecedented affluence and choice abundance, it has also unfortunately increased wastefulness. Trashing products mean that not only did we not utilize the full potential of the raw material, but that we will be imposing further stress on our landfills and incineration facilities. Thus, it is of critical importance to understand how consumers can be encouraged to recycle more.

Consumers' decisions to recycle (vs. trash) a product are subject to a variety of influences, which range from consumer-centric to societal-level factors. Consumer factors, such as knowledge (e.g., Andrew et al. 2013) and concerns for the environment (Schultz and Oskamp, 1996), product-level factors, such as product form distortion (Trudel and Argo 2013) and identity-relevance (Trudel et al. 2016), and finally, social-class and cultural variables (e.g., Laidley 2013) have all been shown to affect consumers' decisions to trash or recycle.

We explore how a specific post-ownership experience, evaluations (positive vs. negative), influences consumers' disposal decisions. We evaluate products all the time and even share our evaluations. While our evaluations play a fundamental role in affecting our future engagement with products, these evaluations could also affect our disposal decisions—whether we trash or recycle a product? For example, while the evaluation of a drink's taste is likely to affect consumers' propensity to repurchase the drink, would it also impact their decision to recycle the container?

From a material-value perspective, there should be no reason to expect any difference in disposal propensity. If consumers are aware that a product (e.g., a drink's bottle) is recyclable, then, normatively, their disposal decisions should be independent of the product's evaluation (tastes good or bad). However, we argue that consumers will be more likely to recycle products that they evaluate positively (vs. negatively), and, thus, will be more likely to recycle a bottle when they evaluate the drink's taste positively.

We propose that this effect emerges because people are more likely to respect a product with positive (vs. negative) evaluations, and it is this respect that drives them to recycle (vs. trash). Respect is earned and is often based on reasons (Dillon 2007). We propose that a product associated with positive (vs. negative) evaluations will also be accorded greater respect by consumers. Furthermore, we believe that products that are respected more will also be given a more respectful burial—recycling (vs. trashing) may be a more respectful way to dispose of a recyclable product. In summary, we propose that people are more likely to respect a product associated with positive (vs. negative) evaluations, which would increase likelihood of recycling (vs. trashing).

In study 1 (N = 173), participants were randomly assigned to one of two conditions. In the positive (negative) evaluation condition, participants were informed that a brand of bottled water was very well (poorly) rated with an evaluation score of 4.8/5 (2.2/5) because most consumers liked the taste (did not like the taste). In both cases the product was priced the same. Participants then indicated how would they dispose of the bottle if they received a free sample and finished it. As shown in Table 1, consumers were more likely to recycle the bottle, and believed the bottle was more worthy of recycling when its taste was evaluated positively.

To investigate whether respect mediated the effect, we used an Implicit Association Test (iatgen via *Qualtrics*, Carpenter et al. 2018) to examine the positive association between the concepts of *respect* and *recycling (vs. trashing)* in study 2. The goal of this study was to assess if respondents associate "Recyclable materials" with "Respect" and "Non-recyclable materials" with "Disrespect." We provided participants (N = 208) with 5 words belonging to each of the four categories and ask them to categorize stimuli. In the "compatible" block, "Recyclable material" and "Respect" were on the one side, while "Non-recyclable material" and "Disrespect" were on the other side. In the "incompatible" block, the combinations were switched. As shown in Table 1, the association occurred more quickly in the compatible than in the incompatible block therefore, confirming our predictions.

In study 3, we replicate these effects in a context with real recycling behaviors, demonstrating external validity. We recruited 153 undergraduates to complete this study in an individual lab room to avoid distractions. We provided each participant with a piece of origami paper and asked them to make an origami fox following a tutorial. Then they were required to take their finished origami fox to the lab assistant. The lab assistant took pictures of their work and told them that an auto-grading system would score their work (but in fact the grade was assigned randomly). Thus, half the participants received a positive grade (8.5/10), while the other half received a negative grade (4.5/10). We then asked them to dispose of their work in the bins (a recycling bin and a trash bin) in the individual lab room. After that, they indicated their respect level toward the origami work. Unbeknownst to participants, after they left, the lab assistant recorded whether they recycled or trashed their fox and removed it to retain the same presets for each participant. As shown in Table 1, more of the participants who received a manipulated positive (vs. negative) evaluation score recycled (vs. trashed) their origami work, and respect toward their origami work mediated these effects.

We introduce a novel effect of product evaluations on consumer recycling behavior—consumers are more likely to recycle a product when it is positively evaluated. Overall, we believe this research makes important contributions from both theoretical and practical perspectives. From a theoretical perspective, this research explores the impact of intangible characteristics related to the product itself—product evaluations. We expand the literature on disposal decision making by demonstrating how a novel product-level characteristic — product evaluations — impact disposal decisions to trash or recycle. From a practical perspective, we believe it is of great importance to understand what drives consumers to recycle more. Our research adds to the growing discourse on environmental issues.

REFERENCES

Carpenter, Tom, Ruth Pogacar, Chris Pullig, Michal Kouril, Stephen J. Aguilar, Jordan P. LaBouff, Naomi Isenberg, and Aleksandr Chakroff (2008), "Survey-software Implicit Association Tests: A Methodological and Empirical Analysis, " *Behavior Research Methods*, 51 (5), 2194-2208.

Dillon, Robin S. (2007), "Respect: A Philosophical Perspective," *Gruppe. Interaktion. Organisation. Zeitschrift für Angewandte Organisationspsychologie (GIO)*, 38 (2), 201-12.

Greenwald, Anthony G., Brian A. Nosek, and Mahzarin R. Banaji (2003), "Understanding and Using the Implicit Association Test: I. An Improved Acoring Algorithm," Journal of Personality and Social Psychology, 85 (2), 197-216.

Laidley, Thomas M. (2013), "The Influence of Social Class and Cultural Variables on Environmental Behaviors: Municipal-Level Evidence from Massachusetts," *Environment and Behavior*, 45 (2), 170-97.

Schultz, P. Wesley, and Stuart Oskamp (1991), "Effort as A Moderator of the Attitude-Behavior Relationship: General Environmental Concern and Recycling," *Social Psychology Quarterly*, 59 (4), 375-83.

Trudel, Remi, and Jennifer J. Argo (2013), "The Effect of Product Size and Form Distortion on Consumer Recycling Behavior," *Journal of Consumer Research*, 40 (4), 632-643.

Trudel, Remi, Jennifer J. Argo, and Matthew D. Meng (2016), "The Recycled Self: Consumers' Disposal Decisions of Identity-Linked Products," *Journal of Consumer Research*, 43 (2), 246-264.

Was the Past Heavier? The Impact of Product Temporal Orientation on Perceived Heaviness and Product Purchase

Lan Xu, Wuhan University, China
June Cotte, Western University, Canada
Nan Cui, Wuhan University, China
Yiran Jiang, Wuhan University, China

EXTENDED ABSTRACT

Consumers may use perceived heaviness as a clue to diagnose the durability and quality of a tangible product (Krishna, 2006; Lin, 2013; Togawa, Park, and Ishii, 2016). Extant research has found that product-related attributes such as size (Murray et al., 1891), color lightness (Hagtvedt, 2019), or location of the product image on a package (Deng & Kahn, 2009) affect individuals' perception of product weight. In this research, we theorize and demonstrate a new aspect- the temporal orientation of a product (the perception of it as being from the past or the future)-that influences consumers' perception of product weight, and ultimate product choice.

Our theory about how product temporal orientation affects perceptions of heaviness is a processing-based one. Compared to the future, consumers can think of many more specific events that have happened in the past. Hence, one's memories and the facts related to one's past are specific and detailed (Muehling, Sprott, & Sprott,2004). Thinking about the past will inevitably trigger recollection and reflection on these specific facts and experiences (Van Boven, Kane, & McGraw, 2010). However, thinking about the future, no matter the extent of imagination or planning involved, is more uncertain and less specific (Epley & Dunning, 2000; Wilson et al., 2000). The different temporal orientation of products may trigger us to retrieve our experiences (past versus future) and we recollect more specific facts from the past, which we argue feels heavier, and may influence how we perceive the heaviness of a product we are considering.

When consumers are considering a product that is temporally oriented to the past, they are more likely to retrieval their sensory experiences and memories about events that happened in the past (Deng, Han, and Wang, 2019). The immediate experience of recalling details of events evokes simultaneously muscular thinking, which renders inner experience felt to be heavy (Winnicotti, 1971). The more details consumers consider, the heavier they will feel during this thinking/processing. The feeling of heaviness will be projected to the object which leads to thinking (Jostmann, Lakens, & Schubert, 2009). In contrast, when exposed to a more futuristic product, consumers are less likely to perceive heaviness because less processing of details happens when thinking about the future.

Hypothesis 1: *Compared to the product with a future temporal orientation, consumers will perceive a product with a past temporal orientation as heavier.*

Hypothesis 2: *The specificity of thinking related to product temporal orientation mediates the influence of the product's temporal orientation on perceived weight.*

Based on processing fluency theory, consumers will be more fluent in processing a weight-related stimulus that matches their current state of thinking of based on temporal orientation (Labroo et al., 2008).

Hypothesis 3: *Consumers are more likely to buy a product with a past (future) temporal orientation when it is designed to be heavier (lighter).*

We tested our hypotheses through three lab experiments and a field experiment. Study 1 examined the impact of the product's temporal orientation (past vs. future) on perceived product weight. A total of 75 undergraduates participated in this experiment. The experiment followed a two-cell (product temporal orientation: past vs. future) between-subjects design. We manipulated the temporal orientation, informing participants that a newly-designed notebook either "was launched in the market six months ago" (past) or "will be launched in the market in six months" (future). Then participants rated their perceived weight of the notebook using 9-point scales (1 = relatively light and 9 = relatively heavy). The results revealed a significant effect of product temporal orientation on perceived weight ($F(1,73)=37.62$, $p<0.001$). Participants in the past condition perceived the product to be heavier than those in the future condition ($M_{past} = 5.72$, $SD_{past} = 2.08$, $M_{future} = 3.03$, $SD_{future} = 1.68$).

Study 2 examined the robustness of H1 and the mediating role of specificity of thinking in the impact of product temporal orientation on perceived weight. A total of 114 undergraduates participated in this experiment. The experiment followed a two-cell (product temporal orientation: past vs. future) between-subjects design. As predicted, participants in the past condition perceived the product to be heavier. Mediation analysis showed that the indirect path of temporal orientation on perceived weight via specificity of thinking was significant.

Study 3 was to verify the impact of the match of temporal orientation and product weight on purchase intention (H3). A total of 148 undergraduates participated in this experiment. The experiment followed a 2 (product temporal orientation: past vs. future) × 2 (product weight: heavy vs. light) between-subjects design. Participants were asked to imagine a scenario of lamp purchase. Temporal orientation was manipulated by asking participants to look for either an antique lamp or a futuristic lamp. The product description was designed for the manipulation of the product weight (2500g net weight vs. 500g net weight). As predicted, an ANOVA revealed a significant interaction of temporal orientation and product weight on purchase intention ($F(1,144)=13.57$, $p<0.01$).

Study 4, a field experiment, was designed to examine H3 in a real shopping situation. We examined consumers' actual purchase by cooperating with a university souvenir shop selling bookmarks for four weeks. The experiment was a two-way mixed design, with a two-level between-subjects factor (temporal orientation: past vs. future) and a two-level within-subjects factor (product weight: heavy vs. light). The dependent variable was the real purchase of the bookmarks. Our results revealed a significant effect of the interaction of temporal orientation and product weight ($\chi2 = 6.23$, $p<0.05$) on product purchase. Specifically, in the past condition, a majority of the shoppers preferred the heavy bookmark (68.6%, [35/51]), whereas in the future condition, a majority of the shoppers chose the light bookmark (55.8% [29/52]), thus supporting H3.

In summary, four studies support the predicted relationship between product temporal orientation and perceived weight. Specifically, compared to a product with a future temporal orientation, consumers perceive a product with a past temporal orientation to be heavier, which was mediated by the specificity of thinking related to temporal orientation. Furthermore, consumers had higher purchase intention, and more actual purchases, when the product's temporal orientation matched its actual weight.

REFERENCES

Ariely, D., & Norton, M. I. (2009). Conceptual Consumption. *Annual Review of Psychology*, 60(1), 475–499.

Brown, L. J. (1985). On concreteness. *Psychoanalytic Review*, 72(3), 379–402.

Deng, X., Han, B., & Wang, L. (2019). Up-Down versus Left-Right: The Effect of Writing Direction Change in East Asia on Consumers' Perceptions and Advertising. *Journal of Advertising*, 48(5), 437–456.

Deng, X., & Kahn, B. E. (2009). Is Your Product on the Right Side? The "Location Effect" on Perceived Product Heaviness and Package Evaluation. *Journal of Marketing Research (JMR)*, 46(6), 725–738.

Epley, N., & Dunning, D. (2000). Feeling "holier than thou": Are self-serving assessments produced by errors in self- or social prediction? *Journal of Personality and Social Psychology*, 79(6), 861–875.

Hagtvedt, H. (2019). Dark is durable, light is user-friendly: The impact of color lightness on two product attribute judgments. Psychology & Marketing,1-12.

Krishna, A. 2006. Interaction of senses: The effect of vision versus touch on the elongation bias. *Journal of Consumer Research*, 32(4): 557–566.

Labroo, A. A., Dhar, R., & Schwarz, N. (2008). Of Frog Wines and Frowning Watches: Semantic Priming, Perceptual Fluency, and Brand Evaluation. *Journal of Consumer Research*, 34(6), 819–831.

Lin, H. M. 2013. Does container weight influence judgments of volume. *International Journal of Research in Marketing*, 30(3): 308–309.

Jostmann, N. B., Lakens, D., & Schubert, T. W. (2009). Weight as an embodiment of importance. *Psychological science*, 20(9), 1169–1174.

Muehling, D. D., Sprott, D. E., & Sprott, D. E. (2004). The power of reflection: An empirical examination of nostalgia advertising effects. *Journal of Advertising*, 33(3), 25–35.

Murray D J, Ellis R R, Bandomir C A, et al. 1999. Charpentier (1891) on the size-weight illusion[J]. *Attention Perception & Psychophysics*, 61(8): 1681–1685.

Taku Togawa, Jaewoo Park, & Hiroaki Ishii. (2016). Does Visual Heaviness Convey Rich Flavor? Effect of Product Image Location on Consumers' Taste Expectation. *Advances in Consumer Research*, 44, 762.

Van Boven, L., Kane, J., & McGraw, A. P. (2009). Temporally asymmetric constraints on mental simulation: Retrospection is more constrained than prospection. In K. D. Markman, W. M. P. Klein, & J. A. Suhr (Eds.), Handbook of imagination and mental simulation. (pp. 131–147). Psychology Press.

Winnicott, D. W. (1971) Playing and reality. New York: Basic books.

Wilson, T. D., Wheatley T, Meyers J M, et al. 2000. Focalism: A source of durability bias in affective forecasting[J]. Journal of Personality & Social Psychology, 78(5): 821–836.

How do Consumers React to Company Moral Transgressions?
The Role of Power Distance Belief and Empathy for Victims

Haiyue (Felix) Xu, The Pennsylvania State University, USA
Lisa E. Bolton, Pennsylvania State University, USA
Karen Page Winterich, Pennsylvania State University, USA

EXTENDED ABSTRACT

Company moral transgressions are prevalent in today's marketplace (e.g., Nike's poor labor practices, Volkswagen's emission scandal). With the Internet and social media, such company moral transgressions rapidly receive public scrutiny (Crockett 2017), which can cause considerable damage to transgressing firms (e.g., Frooman 1997).

However, not all consumers have the same level of concern toward company moral transgressions. Moral norms are often subjectively determined by one's moral system (Trevino and Nelson 2016) with moral judgments varying substantially across individuals and cultures (Haidt and Joseph 2004; Schein and Gray 2018). The current research examines how, when, and why power distance belief (hereafter, PDB), which is the extent to which people accept and endorse inequality and hierarchy in society (Hofstede 1980), influences consumer response following company moral transgressions. Equality is a prominent moral principle, and a moral transgression can be conceptualized as a powerful transgressor (corporations) harming vulnerable victims (Gray and Wegner 2009). Hence, we propose that PDB will affect how individuals react to company moral transgressions with empathy toward the transgression victims as the underlying mechanism.

Empathy is an other-oriented emotion that arises from witnessing someone in distress that subsequently motivates an effort to help (Batson 2011; DeSteno 2015). We theorize that i) low-PDB individuals are motivated to minimize social inequality and tend to feel empathy for the vulnerable in society (Winterich and Zhang 2014), such as transgression victims, whereas high-PDB individuals tend to defend social hierarchy and status quo (Jost, Banaji, and Nosek 2004) and hence may perceive transgression victims as less warranting of care and empathy (Lee, Winterich, and Ross 2014), and ii) the experience (or lack) of empathy further influences how negatively consumers evaluate transgressing companies. Thus, low- (versus high-) PDB consumers, due to their greater empathy for transgression victims, will have less favorable evaluations of transgressing companies.

Consistent with this theorizing, we propose that the effect of PDB is attenuated when the company moral transgression does not have a salient victim as even low-PDB consumers do not focus on victims, thereby suppressing empathy. We also investigate company response strategies and propose that neither an apology nor remedy alone dampens the PDB effect but a combined apology and remedy can attenuate the effect by signaling the company's empathy for victims.

In study 1, we examine search data regarding the Volkswagen emission scandal together with country-level cultural values (Hofstede 2018) to test the impact of PDB on consumer response to the scandal. Using Google Trends, we performed the topic search of "Volkswagen emission scandal" across all global regions. The PDB scores along with other cultural values were obtained from Hofstede's (2018) website and matched to the search data along with other controls (e.g., political freedom, GDP). Based on a one-year event window following the scandal, PDB had a negative effect on the search index (b=-.41, t(54)=-3.93, $p < .001$); that is, people from lower PDB countries were more likely to search for the scandal, consistent with greater concern for the moral transgression. This pattern remained when including control variables and conducting robustness checks with different event windows.

In Study 2, participants completed a PDB manipulation (Zhang, Winterich, and Mittal 2010) and read about two fitness brands, one with a moral transgression (poor labor practice), and the other with a non-moral transgression (poor product quality) and indicated their response. Consistent with our prediction, low PDB consumers made less favorable evaluations ($M_{\text{low PDB}}$=4.94 vs. $M_{\text{high PDB}}$=5.47, F(1, 245)=5.41, p=.021). Participants also had a chance to win a \$25 gift card to the brand of their choice: low PDB consumers were marginally less likely to choose the morally transgressing brand ($M_{\text{low PDB}}$=68.6% vs. $M_{\text{high PDB}}$=79.0%, χ^2(1)=3.12, p=.077).

Study 3 tests the empathy mechanism. Participants completed the same PDB manipulation as study 2 and then read about a different moral transgression (environmental harm), followed by measurement of their response and empathy toward victims (Batson 1987). As expected, low-PDB participants responded less favorably ($M_{\text{low PDB}}$=1.93 vs. $M_{\text{high PDB}}$=2.34, F(1, 207)=4.53, p=.035) and expressed greater empathy ($M_{\text{low PDB}}$=5.67 vs. $M_{\text{high PDB}}$=5.15, F(1, 207)=4.47, p=.036), and the effect of PDB on consumer response was mediated by empathy.

Study 4 uses an established empathy manipulation (high vs. control) to demonstrate moderation-of-process (Spencer, Zanna, and Fong 2005). Participants read about a company moral transgression (poor labor practice), with an empathy manipulation embedded, and then indicated their response and PDB (measured with Yoo et al. 2011). Results revealed the expected interaction between measured PDB and manipulated empathy (b=-.16, t(198)=-1.98, p=.049): lower PDB participants responded less favorably in the control condition (b=.33, t(198)=2.80, p=.006) but, as expected, the PDB effect was attenuated in the high empathy condition (b=.01, t(198) =.07, p>.05).

Study 5 manipulates victim salience by using two transgressions that vary naturally in victim salience: mistreating employees (high) vs. disrespecting traditions (low). Consumer response and PDB were measured as in study 4. We found the expected interaction (b=.21, t(305)=2.67, p=.008): lower PDB participants responded less favorably when victim salience was high (b=.49, t(305)=5.20, $p < .001$) but not when victim salience was low (b=.08, t(305)=.67, p>.05).

In Study 6, participants read about the a moral transgression (environmental harm) and were randomly assigned to either no response, an apology, a remedy, or a combined apology and remedy, with consumer response and PDB measured as in studies 4-5. Results revealed the expected interaction between PDB and firm response (F(3, 397)=7.73, p<.001): an effect of PDB following no response (b=.73, t(397)=7.73, p<.001), an apology (b=.74, t(397)=7.89, p<.001), or a remedy (b=.58, t(397)=5.73, p<.001), but not after a combined apology and remedy (b=.16, t(397)=1.65, p>.05).

In six studies, we find robust support for our theorizing across various consumer samples, operationalizations of PDB, and transgression contexts. In doing so, this research makes important contributions to the literature on corporate social (ir)responsibility and consumer/marketplace morality in a cross-cultural context. This research also has implications for marketers to understand when and why consumers have negative reactions to company moral transgressions, as well as guidance for company response strategies.

REFERENCES

Batson, C. Daniel (1987), "Prosocial Motivation: Is It Ever Truly Altruistic?" *Advances in Experimental Social Psychology*, 20, 65-122.

_____ (2011), *Altruism in Humans*, Oxford University Press.

Crockett, M. J. (2017), "Moral Outrage in the Digital Age," *Nature Human Behaviour*, 1 (11), 769-71.

DeSteno, D. (2015), "Compassion and Altruism: How our Minds Determine Who is Worthy of Help," *Current opinion in Behavioral Sciences*, 3, 80-83.

Frooman, Jeff (1997), "Socially Irresponsible and Illegal Behavior and Shareholder Wealth: A Meta-Analysis of Event Studies," *Business & Society*, 36 (3), 221-49.

Gray, Kurt, and Daniel M. Wegner (2009), "Moral typecasting: divergent perceptions of moral agents and moral patients," *Journal of personality and social psychology*, 96 (3), 505-20.

Haidt, Jonathan, and Craig Joseph (2004), "Intuitive Ethics: How Innately Prepared Intuitions Generate Culturally Variable Virtues," *Daedalus*, 133 (4), 55-66.

Hofstede, Geert (1980), "Culture and Organizations," *International Studies of Management and Organization*, 10 (4), 15-41.

_____ (2018), "Compare Countries," *Hofstede Insights*, 10 (4), https://www.hofstede-insights.com/product/compare-countries/.

Jost, John T., Mahzarin R. Banaji, and Brian A. Nosek (2004), "A Decade of System Justification Theory: Accumulated Evidence of Conscious and Unconscious Bolstering of the Status Quo," Political Psychology, 25 (6), 881–919.

Lee, Saerom, Karenn Page Winterich, and William T. Ross (2014), "I'm Moral, but I Won't Help You: The Distinct Roles of Empathy and Justice in Donations*," Journal of Consumer Research*, 41 (3), 678-96.

Schein, Chelsea, and Kurt Gray (2018), "The Theory of Dyadic Morality: Reinventing Moral Judgment by Redefining Harm," *Personality and Social Psychology Review*, 22 (1), 32-70.

Spencer, Steven J., Mark P. Zanna, and Geoffrey T. Fong (2005), "Establishing a Causal Chain: Why Experiments Are Often More Effective than Mediational Analyses in Examining Psychological Processes," *Journal of Personality and Social Psychology*, 89 (6), 845-51.

Trevino, Linda K., and Katherine A. Nelson (2016), *Managing Business Ethics: Straight Talk About How to Do It Right*, John Wiley & Sons.

Yoo, Boonghee, Naveen Donthu, and Tomasz Lenartowicz (2011), "Measuring Hofstede's Five Dimensions of Cultural Values at the Individual Level: Development and Validation of CVSCALE," *Journal of International Consumer Marketing*, 23 (3-4), 193-210.

Winterich, Karen Page, and Yinlong Zhang (2014), "Accepting Inequality Deters Responsibility: How Power Distance Decreases Charitable Behavior," *Journal of Consumer Research*, 41 (2), 274-293.

Zhang, Yinlong, Karen Page Winterich, and Vikas Mittal (2010), "Power Distance Belief and Impulsive Buying," *Journal of Marketing Research*, 47 (5), 945-54.

Getting Nothing Feels Fairer Than Getting Something: How Allocation Outcomes Invoke Different Allocation Rules

Minzhe Xu, University of Florida, USA
Bowen Ruan, University of Iowa, USA

EXTENDED ABSTRACT

Most resources are limited, which is presumably why most social systems evolve mechanisms for resource allocation (Cook and Hegtvedt 1983). A primary goal of an effective allocation mechanism concerns how fair people perceive the allocation of resource to be. Indeed, people care about fairness so much that they would sacrifice their own interests (and punish others) for the sake of fairness (Dawes et al. 2007).

A common practice to achieve fairness is to proportionally allocate resource based on the performances of the entities involved (Adams 1963; Hatfield et al. 1978; Ma and Roese 2013). Consider a sales contest in which two salespersons—A and B—compete for a total bonus of $1,000. A has sold 9,000 units in the contest, and B has sold 10,000 units. Based on the proportion rule, the fairest allocation of the bonus is A receiving $474 (9/19 of $1,000) and B receiving $526 (10/19 of $1,000), and the less an allocation deviates from the fairest allocation, the fairer people should perceive it to be. Therefore, it can be inferred that people perceive A receiving a small compensation amount (e.g., A receives $100 and B receives $900, a small-large allocation) to be fairer than A receiving no compensation (e.g., A receives $0 and B receives $1,000, a none-all allocation).

However, we find that the opposite is true: in a study (N=130), participants perceived A receiving no compensation ($0) to be fairer than A receiving a small compensation amount ($100; 4.02 vs. 3.08, $F(1, 128) = 8.05$, $p = .01$). Study 2 replicated this finding with an incentive-compatible design. Participants (N=147) were invited to compete with another participant in a math-addition task to win an extra bonus. They also learned, before the competition started, that the person who answered more questions correctly would receive 50 cents, whereas the other person would receive 0 cents (the none-all-allocation condition) or 1 cent (the small-large-allocation condition). Participants were not really in a competition—they were all told at end of the task that they lost (by 1-3 questions, randomly determined) and thus received a bonus of 0 cents or 1 cent. Supporting our hypothesis, participants in the none-all-allocation (vs. small-large-allocation) condition rated the allocation rule as fairer (4.28 vs. 3.57, $F(1, 145)=5.13$, $p=.03$) and were more likely to do the task one more time with the same participant and the same allocation rule (71% vs. 53%; $\chi^2(1)=4.99$, $p=.03$).

We argue the reason is that a small-lage allocation (e.g., $100-$900) invokes the proportion rule, and prompts people to calculate the proportion of the allocation (e.g., $100/$900=1/9) and compare it to the proportion of performance (e.g., 9,000 units/10,000 units=9/10). Because of the drastic difference between these two proportions, people likely infer that the small-large allocation violates the proportion rule to a large extent and thus perceive it as unfair. In contrast, when the low performer receives no compensation, people tend to infer the allocation rule is binary (e.g., the winner takes all) and are less likely to pay attention to the proportion of performance. Because the actual allocation is binary and thus consistent with the inferred allocation rule, people perceive the none-all allocation as fair.

Study 3 (N=573) had two goals. First, to test the proposed mechanism, we added another condition in which the resource allocation perfectly followed the proportion rule. Although in both this and the none-all-allocation condition, the allocation aligned with the inferred allocation rule, because the proportion rule ensures equity and is perceived to be fairer than the binary rule in most cases (Cook and Hegtvedt 1983; Berkowitz et al. 1987), we predicted that participants would perceive the perfectly proportional allocation as even fairer than the none-all allocation. Second, we tested a boundary condition: if people are prompted to use the binary rule regardless of the actual resource allocation (e.g., performance itself is evaluated in a binary way, such as pass/fail), those faced with a small-large allocation tend not to calculate or compare the proportions. We predicted that in such case, the difference between the none-all-allocation and the small-large-allocation conditions would be smaller. Study 3 represented a 3 (allocation: none-all vs. small-large vs. proportional) × 2 (performance: binary vs. control) between-subjects design. Supporting our hypotheses, in the control condition, participants perceived the small-large allocation to be less fair than the none-all allocation (2.47 vs. 4.34, $F(1, 567)=56.51$, $p<.001$), which was less fair than the proportional allocation (4.34 vs. 6.33, $F(1, 567)=66.95$, $p<.001$). Critically, in the binary-performance condition, the difference between the small-large-allocation and the none-all-allocation conditions became smaller (4.37 vs. 4.95, $F(1, 567)=5.60$, $p=.02$; partial interaction: $F(1, 567)=13.61$, $p<.001$).

Study 4 examined another boundary condition. In a non-competitive setting where individuals collaborate rather than compete with each other, the binary allocation rule may not be applicable, attenuating our effect. In a 2 (allocation: none-all vs. small-large) × 2 (context: competition vs. non-competition) between-subjects design, participants (N=342) imagined that they submitted a research proposal to either a competition where researchers competed against each other for research grant or a symposium where researchers interacted with each other. They learned that proposals with 80 or more votes (out of 100) would receive a grant of $500,000, while those with fewer than 80 votes would receive either no grant (none-all) or $10,000 (small-large). They then learned that their own proposal received 78 votes and received no grant or $10,000. We found that in the competition condition, participants perceived the none-all allocation to be fairer than the small-large allocation (4.36 vs. 3.78, $F(1, 338)=4.58$, $p=.03$), while in the non-competition condition, the effect disappeared (3.76 vs. 4.18, $F(1, 338)=2.32$, $p=.13$; interaction: $F(1, 338) = 6.66$, $p = .01$).

This research presents a novel effect regarding resource allocation that a small compensation amount (vs. no compensation) may backfire. It contributes to the literature on fairness perception by demonstrating that people may infer different allocation rules from the actual allocations of resource, which can have important consequences on fairness perception and behavior.

REFERENCES

Adams, J. Stacy (1963), "Towards an Understanding of Inequity," *Journal of Abnormal and Social Psychology,* 67 (5), 422–36.

Berkowitz, Leonard, Colin Fraser, F. Peter Treasure, and Susan Cochran (1987), "Pay, Equity, Job Gratifications, and Comparisons in Pay Satisfaction," *Journal of Applied Psychology,* 72 (4), 544-51.

Cook, Karen S. and Karen A. Hegtvedt (1983), "Distributive Justice, Equity, and Equality," *Annual Review of Sociology,* 9 (1), 217–41.

Dawes, Christopher T., James H. Fowler, Tim Johnson, Richard McElreath, and Oleg Smirnov (2007), "Egalitarian Motives in Humans," *Nature,* 446 (7137), 794–96.

Hatfield, Elaine, Elaine Hatfield Walster, G. William Walster, and Ellen Berscheid (1978), Equity: Theory and Research, Allyn & Bacon.

Ma, Jingjing and Neal J. Roese (2013), "The Countability Effect: Comparative versus Experiential Reactions to Reward Distributions," *Journal of Consumer Research,* 39 (6), 1219–33.

Social Media Magnetism and Marketplace Pilgrimage

Haibo Xue, East China Normal University, China
Xin Zhao, Lancaster University Management School, UK

EXTENDED ABSTRACT

In this paper, we investigate why certain quintessential tourist spots, shops, and retailing outlets become an instant magnetic site on social media and attract a large number of pious followers. Within the urban consumptionscape in Shanghai and many other metropolis in China, huge groups of consumers may spend an average of over 5 hours, and as long as 7 hours waiting in line in order to purchase a cup of bubble tea, a snack, a Chinese pancake, or even a piece of cookie. The zeal for such retail outlets is often fueled by Chinese social media such as Tiktok, the Little Redbook, WeChat, Weibo, and online forums. Such avid desire can only be matched by the devotions of religious pilgrimage (e.g., Turner and Turner 1978).

In particular, we examine consumption rituals at these places and discuss implications for understanding pilgrimage in the marketplace as a simulated form of consumer deceleration (e.g., Husemann and Eckhardt 2019; Rosa 2013). We seek to understand: whether or not the perceived slowed-down temporal experience can be achieved in the marketplace and without the expected detachment from one's social worlds as have been previously suggested.

Pilgrimage is a journey to the sacred place containing the actual sacred relics from the past, which has the power to contaminate pilgrims with magical cure or positive energy (Turner and Turner 1978). Consumers seek spirituality and self-transformation through religious pilgrimages (Hamilton and Higgans 2011; Higgans and Hamilton 2016). More importantly, these physically demanding and sacred journeys allow consumers to escape from their accelerated social life (Rosa 2013) and to engage in consumption practices that help them to slow down (Husemann and Eckhardt 2019). Such deceleration is a temporal consumption experience that is achieved through immersing in extended geographic journeys far away from home and ideally from the market. In this paper, we argue that such temporal experiences of slowing down may be achieved through the simulation of deceleration in marketplace pilgrimage.

In this study, we adopted both ethnographic and ethnographic approaches (Kozinets, 2015), to understand marketplace pilgrimage. We used emergent design, multiple sites, purposive sampling, and field interviews in the process of data collection. Our data collection started in Spring 2017 and continued into Summer 2019. The research team visited various cult food shops in Shanghai and participated in the waiting. This helped them to reflect upon the observations and to develop a better understanding of consumer experiences. We observed different waiting lines outside different cult food stores. Pictures and interviews were combined with detailed observation notes. Our total dataset consists of 35 depth interviews, 120 pages of fieldnotes, 257 images from our fieldwork, and over 300 social media accounts that describe consumption experiences of these cult food stores. Our data analysis proceeded in an iterative process (Spiggle 1994). We focus on consumers' experiences and seek to understand why consumers spent prolonged periods of time waiting in line.

The experiences of prolonged waiting in line at the shops are commonly understood and interpreted by our informants as a "*pilgrimage*". Many come with friends and collectively participate in the pilgrimage. We found that similar to religious pilgrimage, marketplace pilgrimage is structured by varied rituals, including anticipation, participation, evaluation, and dissemination. Marketplace pilgrimage involves efforts and bodily labor that transform consumer desire and consumption experience into an ephemeral form of social capital that can then be competed and displayed in social media space. It gives visual forms to consumers' formless and exhausting labor of waiting. In this case, consumers do not deliberately seek to slow down and to escape from the accelerated social life. It is oriented toward social media conspicuity and is an extrinsic form of deceleration that does not aim at introspection and reflection. The cult shops that attract pilgrims are characterized by scarcity, difficulty of access, ability of being traced on social media, or their potential for visual transportation and transformation, as well as endorsement of social media celebrity. We refer to the quintessential qualities of such pilgrimage space as social media magnetism.

In this paper, we extend previous literature on consumer deceleration by highlighting the *simulation* of consumer deceleration through pilgrimage in the marketplace. Our notion of social media magnetism explains why certain retailing space becomes an instant spot of such devotion. Together, we contribute to consumer culture theories on the sacralization of commercial spaces by highlighting the transient value of marketplace pilgrimage on social media in the era of assess-based consumption (e.g., Bardhi and Eckhardt 2017).

REFERENCES

Bardhi Fleura, and Eckhardt Giana M. (2017), " Liquid Consumption," *Journal of Consumer Research*, 44 (3), 582–97.

Hamilton, K.L. and Higgans, L. (2011), "Sacred Places: An Exploratory Investigation of Consuming Pilgrimage," in D. W. Dahl, G.V. Johar, and S.M.J. van Osselaer (eds), NA *Advances in Consumer Research*, 542-48. Vol 38. Duluth, MN: Association for Consumer Research.

Higgins, L. and Hamilton, K. (2016), "Mini-miracles: Transformations of Self from Consumption of the Lourdes Pilgrimage," *Journal of Business Research*, 69 (1): 25-32.

Husemann, Katharina C and Giana M Eckhardt, Consumer Deceleration, *Journal of Consumer Research*, 45 (6), 1142–1163

Kozinets, Robert V. (2015). *Netnography: Redefined*: Sage.

Spiggle, Susan. (1994). Analysis and interpretation of qualitative data in consumer research. *Journal of Consumer Research*, 21(3), 491-503.

Rosa, Hartmut (2013), *Social Acceleration: A New Theory of Modernity*, New York: Columbia University Press.

Turner, Victor W. and Turner, E. (1978), *Image and Pilgrimage in Christina Culture: Anthropological Perspectives*, New York, NY: Columbia University Press.

Stigma and Taint in Advertising

Cagri Yalkin, Middle Eastern Technical University, North Cyprus Campus, Turkey
Finola Kerrigan, University of Birmingham, USA

EXTENDED ABSTRACT

Advertising sustains the contemporary system and people's desire to consume despite recurring financial crises and the ongoing climate crisis (e.g. Pradham 2009, UNFCC 2019). Advertisers remain key cultural intermediaries and taste makers (Cronin 2004, Cayla and Eckhardt 2008). The conduct of *Cambridge Analytica*, widely covered in the press and through the documentary *The Great Hack* (2019), have highlighted the ability of advertising in manipulating all areas of public life. Corporate scandals have been blamed on the advertising industry and its professionals (e.g. Business Insider 2016). Consumption's direct link with climate crisis (see Carlson-Kanyama and Gonzalez 2014), stereotyping and racism (see Thomas and Jones, 2019) thus require to further critical engagement with the advertising industry.

Previous literature has often focused on creativitiy in advertising (e.g. Nyilasy, Kreshel, and Reid 2012), creative identities (Hirschman 1989, McLeod et al. 2009), gender in advertising practice (Nixon and Crewe 2004, Windels and Lee 2012), advertisers' perceptions of gender portrayals in advertisements and ethics (Zayer et al. 2015) and managing creatives (Gotsi et al. 2010, Hackley and Kover 2007, Hirschman 1989). In particular, Nixon and Crewe (2004) and Hackley and Kover (2007) illustrate how advertisers negotiate competing identities. Here, we study how advertisers view their own jobs in light of the recent global state of affairs.

Stigma and taint are associated with tasks of dubious virtue (e.g., exotic dancer, bill collector, pawnbroker) or with jobs that are "deceptive, intrusive, confrontational, or that otherwise defy norms of civility" (Ashforth & Kreiner, 1999, p.415) (e.g., paparazzo, telemarketer). As such, advertising can easily be classified as a stigmatized job as it is about managing sometimes deceptive perceptions that may not necessarily be based on the actual properties and benefits of products/services/brands. There is limited literature related to how the occupation holders themselves who are in morally stigmatized jobs view their jobs (see Zayer et. Al 2015 and Drumwright and Kamal 2016 for exceptions). If stigma and taint reduce occupational prestige (see Ashforth & Kreiner 2014), *what are the ways in which advertisers view their profession and themselves?*

This on-going qualitative study draws on data from Turkey, an emerging economy with a workforce of 28 million. The studies on the advertising industry in the Global South are still limited. Exceptions are Kaptan (2013), Cayla and Eckhardt (2008), and Drumwright and Kamal (2016). Here, in-depth interviews with 20 advertisers are completed. A maximum variation purposeful sampling is used, where age, department within the agency, tenure and type of agency (network vs. local boutique) is varied. The data are analysed by the authors using a hermeneutic approach (Thompson 1989) and interpretation followed the guidelines of Miles and Huberman (1994) and Spiggle (1994).

Our emergent findings point to a nuanced understanding of advertisers' own work as stigmatized and precarious, and the emerging circumstances under which they may or may not feel the pressure this brings. In particular, the advertisers view their jobs as stigmatized and precarious. They view their job to be stigmatized to the degree of being immmoral because they create artificial needs. Dar, a 40 year old senior creative, says: "*afterall it is about selling people crap they do not need... people look at me like I am evil*". Do, 40, is of a similar opinion "*..it is what it is. It is not helping anyone in any real sense*". On the other hand, excessive working hours express themselves as precarity: Goz, 41, account manager, illuminates the precarious aspect of her job "*..i'm trying to manage the feelings of everybody... trying to write emails that will not damage the relationship with the client*" and Fah, creative, seconds: "*we do the ugly job... so many people's feelings and irrelevant and irrational thoughts to manage 24/7, via email, via whatsapp, via everything else that I feel like I am just wasting the time*". Do also explains "*you can't just not take part in a tender, although it may not lead anywhere, you work on it for months, concurrently with other tenders too*".

The preliminary data analysis reveals that the advertisers from various ages and job specialisms view their job as stigmatized. In particular, they have a dual view of their job as stigmatized and precarious; where precariousness feeds into their perceptions of taint. This study extends the previous literature on creative identities (e.g. Hackley and Kover 2007, Gotsi 2010) by focusing on a middle to high income morally tainted line of work – advertising. Previous studies focused on physically and socially stigmatized jobs (e.g. Dick 2005, Simpson et al. 2014), here, we extend the inquiry into the moral arena. Limitations of this study are that it is a snapshot in time and it is bound by its context. For example, in light of the Covid-19 crisis, have the advertisers view of their jobs worsened? Future work could seek to investigate whether this perception also holds across other settings in the Global south and in the Global North and what coping strategies advertisers cultivate to manage taint.

REFERENCES

Ashforth, Blake E. and Glen E. Kreiner (2014), "Dirty work and dirtier work: Differences in countering physical, social, and moral stigma. Management and Organization Review, 10(1), 81-108.

Cadwalladr, Carole (2017), "The great British Brexit robber: how our democracy was hijacked," https://www.theguardian.com/technology/2017/may/07/the-great-british-brexit-robbery-hijacked-democracy on March 3rd 2020.

Carlsson-Kanyama, Annika and Alejandro D. González (2009), "Potential contributions of food consumption patterns to climate change", The American journal of clinical nutrition, 89(May), 1704S-1709S.

Chávez, Christopher (2012), "Hispanic agencies and profits of distinction: An examination of the advertising industry as a field of cultural production," Consumption Markets & Culture, 15(September), 307-325.

Cronin, Anne M. (2004), "Regimes of mediation: advertising practitioners as cultural intermediaries?" Consumption Markets & Culture, 7(December), 349-369.

Dick, Penny (2005). Dirty work designations: How police officers account for their use of coercive force. Human relations, 58(11), 1363-1390.

Drumwright, Minette E. and Sara Kamal (2016), "Habitus, doxa, and ethics: Insights from advertising in emerging markets in the Middle East and North Africa," Consumption Markets & Culture, 19(June), 172-205.

Ewen, Stuart (1976). Captains of Consciousness: Advertising and the Roots of Consumer Consciousness, McGraw-Hill: NY.

Gotsi, Manto, Andriopoulos, Constantine, Lewis, Marianne W. and Amy E. Ingram (2010), "Managing creatives: Paradoxical approaches to identity regulation," Human Relations, 63(June), 781-805.

Hackley, Chris & Arthur J. Kover (2007), "The trouble with creatives: Negotiating creative identity in advertising agencies," International Journal of Advertising, 26(January), 63-78.

Haug, Wolfgang F. (1986), Critique of commodity aesthetics: appearance, sexuality and advertising in capitalist society. Minneapolis: University of Minnesota Press.

Hirschman, Elizabeth C. (1989). Role-based models of advertising creation and production. Journal of Advertising, 18(June), 42-53.

McLeod, Charlotte, O'Donohoe, Stephanie and Barbara Townley (2009), "The elephant in the room? Class and creative careers in British advertising agencies," Human Relations, 62(July), 1011-1039.

Nixon, Sean and Ben Crewe (2004), "Pleasure at work? Gender, consumption and work-based identities in the creative industries," Consumption Markets & Culture, 7(June), 129-147.

Nyilasy, Gergely, Kreshel, Peggy J., and Leonard N. Reid (2012), "Agency practitioners, pseudo-professionalization tactics, and advertising professionalism," Journal of Current Issues & Research in Advertising, 33(August), 146-169.

Simpson, Ruth, Hughes, Jason, Slutskaya, Natasha and Maria Balta (2014). Sacrifice and distinction in dirty work: men's construction of meaning in the butcher trade. Work, employment and society, 28(5), 754-770.

Thomas, Kevin D. and Naya Jones (2019), "Critical reflexivity: Teaching about race and racism in the advertising classroom," Advertising & Society Quarterly, 20(2), doi:10.1353/asr.2019.0013.

Tuncay Zayer, Linda and Catherine A. Coleman (2015), "Advertising professionals' perceptions of the impact of gender portrayals on men and women: A question of ethics?. Journal of Advertising, 44(July), 1-12.

UNFCC (2019). Fashion for Global Climate Action, accessed at https://unfccc.int/climate-action/sectoral-engagement/fashion-for-global-climate-action

Windels, Kasey and Wei-Na Lee (2012), "The construction of gender and creativity in advertising creative departments," Gender in Management: An International Journal, 27(November), 502-519.

Time in the Past is Real and Honest: The Role of Nostalgia in Enhancing Authenticity

Shiyu Yang, University of Illinois at Urbana-Champaign, USA
Jia Chen, University of Illinois at Chicago, USA
Yu-Wei Lin, University of Illinois at Urbana-Champaign, USA

EXTENDED ABSTRACT

Authenticity, typically defined as being "real", "genuine", or "true" (Dutton 2003; Sharpley 1994; Taylor 1991; Vannini and Franzese 2008), is a desirable state for individuals (Gino, Kouchaki, and Galinsky 2015) and a cherished attribute of products (Newman and Dhar 2014). Many recent social criticisms argue that our society is experiencing an authenticity deficit because of the overflow of meaningless market offerings (Boyle 2004). To overcome this deficit, people increasingly search for authenticity in brands, products, and experiences (Arnould and Price 2000; Beverland 2005; Morhart et al. 2015). As a result, authenticity has "…overtaken quality as the prevailing purchasing criterion" (Gilmore and Pine 2007, 5) and become "one of the cornerstones of contemporary marketing . . ." (Brown, Kozinets, and Sherry 2003, 21). In response to consumers' craving for authenticity, marketers are enthusiastic in cultivating products and services that are experienced as authentic (Goldman and Papson 1996; Grayson and Shulman 2000).

It is therefore important to ask the following questions: From consumers' perspective, what kind of products can connect them with a real, honest and genuine self-view (i.e., self-authenticity)? From marketers' perspective, how to make their products experienced by consumers as real, honest, and genuine (i.e., product authenticity)? These two questions are interrelated, as prior research has shown that consuming authentic products can increase self-authenticity (Hahl, Zuckerman, and Kim 2017); also, a product that connects consumers with their true self is perceived to be symbolically authentic (Morhart et al. 2015). We therefore ask the following question encompassing both self and product authenticity: how to increase *experienced* authenticity in consumptions? We posit that inducing nostalgia in consumptions can lead consumers to experience a greater level of authenticity.

A plethora of research has documented the benefits of nostalgia, such as social connectedness (Wildschut et al. 2010), meaningfulness (Routledge et al. 2012), empathy (Zhou et al. 2011), and patience (Huang, Huang, and Wyer Jr 2016). A majority of consumer research has shown that nostalgia toward a brand could increase brand preference, respect, trust (Merchant and Rose 2013; Muehling and Sprott 2004), and the likelihood of purchase and recommendation (Nam et al. 2016). However, as far as we know, there is limited research on how nostalgia may influence consumers' experience of authenticity.

Drawing upon research linking past autobiographical memories with intrinsic self-focus (Baldwin, Biernat, and Landau 2015) and pure self-view (Gino and Desai 2012), we argue that nostalgic consumptions will offer a window to one's original self, a self that is real, honest and true, a self that preserves one's intrinsic nature as a person that is not yet tainted by any external constraints. The recollection of past experiences can set the tone for understanding and anchoring individual identity. Following these arguments, we predict that consumptions that have been woven into consumers' personal histories are likely to be perceived as embodiment of their true self (i.e., self-authenticity); a logical corollary is that, products that can elicit nostalgic feelings are likely to be perceived as real, honest, and genuine (i.e., product authenticity). We therefore posit that inducing nostalgia in consumptions (e.g., nostalgic descriptions or advertisements) can potentially enhance experienced authenticity.

Across six studies, we examined how nostalgic consumptions enhanced experienced authenticity. We first demonstrated that products that made consumers feel authentic (vs. products that consumers liked) were more nostalgic (Study 1 N=63). Building on this finding, we further tested the causal effect of nostalgia on experienced authenticity using both controlled (Study 2 N=107) and freely recalled consumptions (Study 3 N=190). Moreover, we identified the underlying mechanism by showing that nostalgic consumptions could remind consumers of their intrinsic nature, which in turn led to increased experienced authenticity (Study 3). We also found that self-concept clarity moderated the effect, such that the positive relationship between nostalgia and experienced authenticity was stronger among consumers with ambiguous self-views (Study 4 N=51). We then applied the findings to a purchase decision context and showed that highlighting the importance of authenticity would lead consumers to favor nostalgic products over novel ones (Study 5 N=159). Finally, applying natural language processing to analyzing over 5000 real-world products on Kickstarter, we showed that invoking nostalgia when pitching for a product could potentially make the product appear more authentic (Study 6 N=52997).

Taken together, our research contributed to the literature on authenticity and nostalgia by unveiling the relationship between them, the underlying mechanism, and the boundary condition. Moreover, our findings have implications for marketers who want to appeal to consumers with authentic market offerings and consumers who are in search for authenticity. Also, to the extent that authenticity is a positively valenced psychological state, the current research also contributes to the literature on consumer well-being.

REFERENCES

Arnould, Eric J. and Linda L. Price (2000), "Questing for Self and Community," *The why of consumption: Contemporary perspectives on consumer motives, goals and desires*, 1(1), 140.

Baldwin, Matthew, Monica Biernat, and Mark J. Landau (2015), "Remembering the Real Me: Nostalgia Offers a Window to the Intrinsic Self," *Journal of personality and social psychology*, 108(1), 128–47.

Beverland, Michael (2005), "Brand Management and the Challenge of Authenticity," *Journal of Product & Brand Management*, 14(7), 460–61.

Boyle, David (2003), *Authenticity Brands, Fakes, Spin and the Lust for Real Life*, philpapers.org.

Brown, Stephen, Robert V. Kozinets, and John F. Sherry (2003), "Teaching Old Brands New Tricks: Retro Branding and the Revival of Brand Meaning," *Journal of marketing*, 67(3), 19–33.

Gilmore, James H. and B. Joseph Pine (2007), *Authenticity: What Consumers Really Want*, Harvard Business Press.

Gino, Francesca., & Desai (2012), "Memory lane and morality: How childhood memories promote prosocial behavior". *Journal of personality and social psychology*, 102(4), 743.

Gino, Francesca, Maryam Kouchaki, and Adam D. Galinsky (2015), "The Moral Virtue of Authenticity: How Inauthenticity Produces Feelings of Immorality and Impurity," *Psychological science*, 26(7), 983–96.

Goldman, Robert and Stephen Papson (1996), *Sign Wars: The Cluttered Landscape of Advertising*, Guilford Press.

Grayson, Kent and David Shulman (2000), "Indexicality and the Verification Function of Irreplaceable Possessions: A Semiotic Analysis," *The Journal of consumer research*, 27(1), 17–30.

Hahl, Oliver, Ezra W. Zuckerman, and Minjae Kim (2017), "Why Elites Love Authentic Lowbrow Culture: Overcoming High-Status Denigration with Outsider Art," *American sociological review*, 82(4), 828–56.

Huang, Xun (irene), Zhongqiang (tak) Huang, and Robert S. Wyer Jr. (2016), "Slowing down in the Good Old Days: The Effect of Nostalgia on Consumer Patience," *The Journal of consumer research*, 43(3), 372–87.

Merchant, Altaf and Gregory M. Rose (2013), "Effects of Advertising-Evoked Vicarious Nostalgia on Brand Heritage," *Journal of business research*, 66(12), 2619–25.

Morhart, Felicitas, Lucia Malär, Amélie Guèvremont, Florent Girardin, and Bianca Grohmann (2015), "Brand Authenticity: An Integrative Framework and Measurement Scale," *Journal of consumer psychology: the official journal of the Society for Consumer Psychology*, 25(2), 200–218.

Muehling, Darrel D., David E. Sprott, and David E. Sprott (2004), "THE POWER OF REFLECTION: An Empirical Examination of Nostalgia Advertising Effects," *Journal of advertising*, 33(3), 25–35.

Nam, Jiyeon, Yun Lee, Nara Youn, and Kyoung-Min Kwon (2016), "Nostalgia's Fulfillment of Agentic and Communal Needs: How Different Types of Self-Concepts Shape Consumer Attitudes toward Nostalgia," *Journal of Consumer Behaviour*, 303–13, http://dx.doi.org/10.1002/cb.1568.

Newman, George E. and Ravi Dhar (2014), "Authenticity Is Contagious: Brand Essence and the Original Source of Production," *JMR, Journal of marketing research*, 51(3), 371–86.

Routledge, Clay, Tim Wildschut, Constantine Sedikides, Jacob Juhl, and Jamie Arndt (2012), "The Power of the Past: Nostalgia as a Meaning-Making Resource," *Memory* , 20(5), 452–60.

Sharpley, R. (1994), "Tourism, Tourists," *& society. Huntington, Cambridgeshire: ELM*.

Taylor, Charles (1992), *The Ethics of Authenticity*, Harvard University Press.

Vannini, Phillip and Alexis Franzese (2008), "The Authenticity of Self: Conceptualization, Personal Experience, and Practice," *Sociology Compass*, 2(5), 1621–37.

Wildschut, Tim, Constantine Sedikides, Clay Routledge, Jamie Arndt, and Filippo Cordaro (2010), "Nostalgia as a Repository of Social Connectedness: The Role of Attachment-Related Avoidance," *Journal of personality and social psychology*, 98(4), 573–86.

Zhou, Xinyue, Tim Wildschut, Constantine Sedikides, and Kan Shi (2012), "Nostalgia: The Gift That Keeps on Giving," *The Journal of consumer research*, 39(1), 39–50.

The Moderating Effect of Regulatory Effect on Consumer Preferences for Price Discounts and Bonus Packs

Jun Yao, Macquarie University, Australia
Di Wang, Queensland University of Technology, Australia
Brett A.S. Martin, Queensland University of Technology, Australia

EXTENDED ABSTRACT

In today's increasingly competitive marketplace, firms deploy a range of sales promotion tactics to encourage purchases by providing consumers with extra benefits or incentives. The sales promotion literature suggests that monetary tactics, such as price discounts, and non-monetary tactics, such as bonus packs, distinctively influence consumers' purchase behaviors. Bonus packs which offer more product volumes are generally preferred by consumers over price discounts which offer lower prices (Diamond and Sanyal 1990; Mishra and Mishra 2011), because the former tend to be framed as pure gains while the latter tend to be framed as reductions in losses according to prospect theory's value function (Kahneman and Tversky 1979).

We propose that regulatory orientation (Higgins 2000) plays a moderating role in consumers' preferences between bonus packs and price discounts. Specifically, the default preference for a bonus pack does not hold for individuals with a prevention orientation. A price discount provides an opportunity to reduce the economic cost and thus aligns with a prevention orientation to minimize losses. In turn, individuals with a prevention orientation are expected to experience a regulatory fit between the prevention orientation and the price discount, resulting in a preference for a price discount over a bonus pack.

In contrast, a bonus pack provides incremental product benefits and thus aligns with a promotion orientation to maximize gains, individuals with a promotion orientation are expected to experience a regulatory fit between the promotion orientation and the bonus pack, resulting in a preference for a bonus pack over a price discount. Such a preference is in line with the default preference in favor of a bonus back based on differential framing (i.e., a bonus pack is framed as a pure gain while a price discount is framed as a reduction in loss). However, we argue the regulatory fit cue may not be as accessible as the differential framing cue to influence the preference.

We present two studies, including a field study, to test the proposed effects. Study 1 investigates the joint effect of regulatory orientation and promotion format on purchase intention and the mediating role of regulatory fit. We recruited 387 participants on Mturk. The study adopted a 2 (promotion format: discount vs. bonus pack) × 2 (regulatory orientation: promotion vs. prevention) between-participants design, with two product replicates to enhance generalizability.

Results demonstrated that neither promotion format nor regulatory orientation had main effects, but there was a significant interaction effect. Participants in the prevention-orientation condition were more likely to purchase the product when the promotion was in the discount format than in the bonus pack format. Participants in the promotion-orientation condition were more likely to purchase the product when the promotion was in the bonus pack than in the discount format. The analysis of regulatory fit revealed a significant interaction effect such that participants in the prevention-orientation condition felt the discount was more "right" than the bonus pack. There was no difference in regulatory fit between the discount and bonus pack in the promotion-orientation condition. Results of the mediation analysis showed a significant moderated mediation effect. Specifically, the indirect effect was significant while the direct effect was not significant in the prevention-orientation condition. The indirect effect was not significant, but the direct effect was significant

in the promotion-orientation condition. These results indicate that regulatory fit mediates only the effect of prevention orientation on preference for promotion format, but not the effect of promotion orientation on preference. The direct effect in the promotion-orientation condition can be explained by consumers' inherent preference for a bonus pack over a price discount, due to the prospect theory-based framing conceptualization.

Study 2 was designed to replicate the findings shown in Study 1 in a field setting. In addition, instead of using percentages, we used an equivalent absolute value in the two promotion formats. The study adopted a 2 (promotion format: discount vs. bonus pack) × 2 (regulatory orientation: promotion vs. prevention) between-participants design. We collaborated with a medium-sized supermarket to conduct this study over a one-week period. We set up a table in the entrance/exit area of the supermarket and put a sign on the table reading, "By completing our marketing survey, you can receive a $5 voucher." Participants were asked to read three sentences either related to their hopes and aspirations (i.e. "I want to do grocery shopping," "It is enjoyable to do grocery shopping," "Doing grocery shopping is interesting.") or to their duties and obligations (i.e. "I ought to do grocery shopping," "It is an obligation to do grocery shopping," "Doing grocery shopping involves a feeling of duty."). Participants were then told that today the supermarket was running an in-store promotion for a store gift voucher. The promotion was framed as either a discount (i.e. "you buy a $12 gift voucher and get $2 off, you pay $10 cash") or a bonus pack (i.e. "you pay $10 cash to get $2 bonus, you get a $12 gift voucher"). Participants indicated their choice of whether to purchase the gift voucher.

Results showed an interaction effect. In the prevention-orientation condition, 58.5% of participants in the discount condition and 40.0% of participants in the bonus pack condition chose to purchase the gift voucher. In contrast, in the promotion-orientation condition, 40.6% of participants in the discount condition and 58.5% of participants in the bonus pack condition chose to purchase the gift voucher. Again, participants in the prevention-orientation condition felt the discount promotion was right more than the bonus pack. Those in the promotion-orientation condition felt no difference in terms of how right participants felt in the discount and bonus pack conditions. Similar to Study 1, results indicate that regulatory fit mediates only the effect of prevention orientation on preference for promotion format, but not the effect of promotion orientation on preference.

One limitation of our research is that regulatory orientation was primed across two studies. To enhance the robustness of our findings, further research could assess consumers' chronic regulatory orientation to see whether the moderating effect of regulatory orientation on consumer preferences for promotion tactics still hold.

REFERENCES

Diamond, W. D. & Sanyal, A. (1990). The effect of framing on the choice of supermarket coupons," in M. E. Goldberg, G. Gorn, & R. W. Pollay (Eds.), *Advances in Consumer Research* (Vol. 17, pp. 488-493). Provo, UT: ACR.

Higgins, E. T. (2000). Making a good decision: Value from fit. *American Psychologist,* **55(11), 1217-1230.**

Kahneman, D., & Tversky, A. (1979). Prospect theory: An analysis of decision under risk. *Econometrica, 47* (2), 263-291.

Mishra, A., & Mishra, H. (2011). The influence of price discount versus bonus pack on the preference for virtue and vice foods. *Journal of Marketing Research, 48*(1), 196-206.

The Devil You Know: The Problem of Equilibrium Goals

Siyuan Yin, The Wharton School, University of Pennsylvania, USA
Cait Lamberton, The Wharton School, University of Pennsylvania, USA

EXTENDED ABSTRACT

Why do we stay in unsatisfying relationships with brands (Erdem and Keane 1996, Erdem, Keane, and Sun 2008), hold onto losing stocks even when they have little likelihood of improving (Odean 1998, Shefrin and Statman,1985), take extra flights to stay with airlines that delay us regularly, or remain in frustrating jobs or interpersonal relationships? We conceptualize such "devil you know" situations as *equilibrium goals*, in which we prioritize status quo maintenance even when changing our state would be more likely to offer positive utility than remaining.

Three studies have been completed to substantiate the unique nature of equilibrium goals. We first identify consistent characteristics of equilibrium goals across domains. Study 1 (n = 460) followed a five (scenario: job, relationship, diet, budget, cancer treatment) by two (goal: equilibrium vs. disequilibrium) between-subject design. For example, participants in the equilibrium job condition read: "Suppose that your current job is boring and involves tedious work and you have been working in the position for 5 years. You could change jobs, but you choose to continue to go to work and do well enough to stay in this job." By contrast, participants in the disequilibrium job condition read the same information with reversed actions.

Participants reported that in both goal conditions they were pursuing a goal to an equivalent extent and had a similar level of past investment in pursuit of that goal. However, disequilibrium goals (e.g. changing jobs) involved a higher focus on change, stronger motivation, and higher anticipated utility than equilibrium goals ($b_{focus on change}$ = -.023, $p < .001$; $b_{motivation}$ = -.026, $p = .002$; $b_{utility}$ = -.033, $p < .001$). By contrast, remaining in equilibrium as opposed to disequilibrium goals required greater self-control ($b_{self-control}$ = .039, $p < .001$). Thus, it appears that equilibrium goals create an undesirable situation for consumers: while their self-control costs are high, their motivation and utility are low.

To prompt consumers to release their equilibrium goals, we examined literature on maintenance goals (Yang, Stamatogiannakis, and Chattopadhyay 2015) and consumer lock-in (Johnson and Russo 1984, Johnson, Bellman, and Lohse 2003, Zauberman 2003). This literature suggested that consumers in equilibrium goals may perceive higher switching costs than necessary. If this is the case, lowering perceptions of social and cognitive switching costs should weaken consumers' hold on equilibrium goals.

Study 2 (n = 1782) tested this prediction using a three (cognitive cost: control, high, low) by three (social cost: control, high, low) by three (scenario: airline, retailer, partner relationship) between-subject design. For example, in the airline scenario, the equilibrium goal related to staying in an airline reward program that regularly provided less-than-optimal service. We manipulated the perceived social and cognitive switching costs as high or low via cost-related messages. No cost information was provided in the control conditions. Participants reported how likely they would be to end their relationship and start over with another airline or do what it takes to maintain their relationship from 0 (definitely keep status) to 100 (definitely end the relationship).

A mixed-effects model predicting this likelihood with cognitive- and social-cost conditions as predictors and scenarios as random effects revealed significant main effects of cognitive costs ($F(2, 1771)$ = 14.17, $p < 0.001$) and social costs ($F(2, 1771) = 32.65, p < .001$), but no significant interaction ($F(4, 1771) = .47, p = .75$). Compared to control conditions, people in the high social- and cognitive-cost conditions were less likely to switch away from equilibrium goals ($b_{high social cost}$ = -7.41, $p < .001$; $b_{high cognitive cost}$ = -3.04, $p = .038$) and people in the low social- and cognitive-cost conditions were more likely to do so ($b_{low social cost}$ = 4.13, $p = .005$; $b_{low cognitive cost}$ = 5.19, $p < .001$). Thus, manipulating both types of switching costs can independently shift individuals' likelihood to persist in equilibrium goals.

To replicate this finding in a more consequential setting, Study 3 (n = 228) established a "work partnership" with cost-related interventions in the lab. The experiment followed a two (cognitive cost: high vs. low) by two (social cost: high vs. low) between-subject design. Participants worked together in "teams" to obtain points, such that they could maximize their final bonus that would be determined by their own points and their team points. All participants were assigned the role of "receiver" and received points allocated by their paired deciders who was ostensibly on the same team. We held constant point allocations across conditions such that an equilibrium goal situation was created for all participants: the decider was systematically underallocating to participants, such that little utility could be gained by staying in the partnership. After three rounds of point allocations, participants read, in the high (low) cognitive (social) cost condition, "The average rating of cognitive (social) costs of switching from previous surveys was 7 (3) out of 10." Participants then had the opportunity to switch partners who were on an opposing (the same) team in the high (low) social cost conditions.

Despite the fact that participants had evidence that their decider was unlikely to offer a high chance to maximize their outcomes, only 58.7% decided to switch partners, leaving 41.3% pursuing the equilibrium goal. Participants in the low social-cost conditions were significantly more likely to switch partners, thus releasing an equilibrium goal, than those in the high social-cost conditions ($b_{low social cost}$ = 1.85, $p < .001$). Participants in the low cognitive-cost conditions were marginally more likely to switch partners than those in the high cognitive-cost conditions ($b_{low cognitive cost}$ = .91, $p = .08$). As before, no interaction was observed ($b_{interaction}$ = -.70, $p = .30$).

We show that manipulating perceived goal-switching costs effectively shifted people away from equilibrium goals in both marketplace and collaboration contexts. Our findings contribute to traditional goal and motivation literature with a new framework that helps understand the mechanisms of equilibrium goal-pursuit behavior. Future research will extend these findings to other consequential equilibrium goals, in the hope that we can learn more about ways to enhance consumers' goal pursuit and overall well-being.

REFERENCE

Erdem, Tülin. and Michael P. Keane (1996), "Decision-Making under Uncertainty: Capturing Dynamic Brand Choice Processes in Turbulent Consumer Goods Markets," *Marketing Science,* 15(1), 1–20.

Erdem, Tülin, Michael P. Keane, and Baohong Sun (2008), "A Dynamic Model of Brand Choice When Price and Advertising Signal Product Quality," *Marketing Science,* 27(6), 1111–25.

Johnson, Eric J. and J. Edward Russo (1984). "Product Familiarity and Learning New Information," *Journal of Consumer Research*, 11(1), 542-550.

Johnson, Eric J., Steven Bellman, and Gerald L. Lohse (2003), "Cognitive lock-in and the power law of practice," *Journal of Marketing*, 67 (April), 62-75.

Odean, Terrance (1998), "Are Investors Reluctant to Realize Their Losses?" *Journal of Finance,* LIII (5), 1775–1798.

Shefrin, Hersh and Heir Statman (1985), "The disposition to sell winners too early and ride losers too long: Theory and evidence," *Journal of Finance,* 40 (July), 777–790.

Yang, Haiyang, Antonios Stamatogiannakis, and Amitava Chattopadhyay (2015), "Pursuing Attainment versus Maintenance Goals: The Interplay of Self-Construal and Goal Type on Consumer Motivation," *Journal of Consumer Research,* 42 (1), 93–108.

Zauberman, Gal (2003), "The Intertemporal Dynamics of Consumer Lock-In," *Journal of Consumer Research,* 30 (December), 405–419.

The Effect of Social Identity Conflict on Consumers' Planning Time Horizons

Yiqi Yu, Guanghua School of Management, Peking University, China
Ying Zhang, Guanghua School and Management, Peking University, China

EXTENDED ABSTRACT

Consumers often hold multiple social identities (Crisp and Hewstone 2007). For example, immigrants are simultaneously identified with their country of origin and the new country; students may hold identities associated with the multiple schools that they have attended. When these identities are simultaneously activated and the contents of these identities are perceived incompatible, consumers experience social identity conflict (Hirsh and Kang 2016).

Despite the ubiquity and importance of consumers experiencing such conflict, research that examines whether and how this experience may affect consumer choices remain relatively scarce. In this research, we explore how social identity conflict might alter one's perception of self, and in turn affect his/her planning time horizon in consumption decisions. Specifically, we predict that experiencing social identity conflict leads consumers to focus more on here and now, thus showing greater preference for short-term products and service plans. This preference shift occurs because experiencing social identity conflict undermines a clear sense of self (Campbell et al. 1996), which lays the foundation of a temporally stable self (Dunlop 2017; Jiang, Chen, and Sedikides 2019). A less enduring sense of self in the temporal dimension, in turn, leads to less willingness to plan for the distant future.

Study 1 surveyed 225 Mturkers to directly test the relationship between social identity conflict and planning horizon. Participants indicated the extent to which and how often they felt that their multiple social identities were in conflict, after we introduced what was social identity conflict. We then used three items to measure participants' planning time horizons (e.g. "I focus more on the proximate future when I am making the decisions") and found that social identity conflict was positively correlated with shorter planning time horizons ($b = 0.128$, $p = .001$), controlling for demographic variables.

Study 2 employed a lab study where 94 participants first read a diary written by a college student about her experience after moving to a different city from her hometown and imagined themselves being the student. Participants were randomly assigned to a conflict condition where the diary described that the college student often experienced identity conflict because of the different norms of the two places, or a no conflict condition, where the diary described that the student comfortably navigated between the two identities and no conflict experience was mentioned. Next, in an ostensibly unrelated task, participants were told to write down their future plans. We intentionally kept the instructions vague and did not specify any time period for the "future". Their answers were coded based on the time frame and we found that, participants in the conflict condition wrote down more plans about proximate future than did those in the no conflict condition: 71.8% vs. 47.6%, $p < 0.001$.

Study 3 moved to school identity. A total of 104 graduate students were randomly assigned to either a social identity conflict condition where they imagined that they were watching a championship match between their undergraduate alma mater and their current school, or a friendly exhibition match between the two teams. Then, participants were asked to indicate their preferences between two financial products: a one-year CD offering 1.12% APY and a three-year CD offering 1.28%. Results showed that participants in the conflict condition were less likely to choose the three-year product ($M_{Conflict} = 2.14$ vs. $M_{No conflict} = 3.09$, $p = .018$; higher value denoted preference for the long-term product).

Using the Midlife in the United States survey, study 4 found that a less clear sense of self was associated with shorter planning horizons among 2654 respondents. Further, study 5 directly measured our proposed mechanism, after the using the same manipulation of conflict as Study 2. Results suggested that experiencing social identity conflict increased participants' preferences for a short-term video streaming membership ($M_{Conflict} = 3.05$ (1.50) vs. $M_{No conflict} = 3.79$ (1.59), $p = .011$). Furthermore, bootstrapping analyses revealed that an unclear sense of self mediated this effect (95% CI = [-0.6973, -0.0031]).

In study 6, we employed a 2 (social identity conflict: conflict vs. no conflict) ×2 (bolstering a clear sense of self: yes vs. no) between-subject design and randomly assigned 231 participants to one of the four conditions. We manipulated identity conflict as study 5. Participants were then asked to describe a personal possession (Morrison and Johnson 2011). Specifically, to bolster a clear sense of self, participants were asked to describe a possession that reflects one of his/her important social identities. In the control condition, participants were asked to describe a possession which they found useful. We then recorded their choice of financial products. We found that when a clear sense of self was not bolstered, participants who experienced social identity conflict showed greater preference for the short-term financial products than did those who experienced no such conflict ($M_{Conflict} = 2.98$ (2.05) vs. $M_{No conflict} = 3.92$ (2.06), $p = .019$). However, when participants experienced a clear sense of self, the difference disappeared ($M_{Conflict} = 3.83$ (2.05) vs. $M_{No conflict} = 3.75$ (1.39), $p = .642$).

To summarize, by showing consumers who experience social identity conflict are more likely to adopt short planning time horizons, our work makes important theoretical contributions and yields practical implications for consumer decision-making and well-being.

REFERENCES

Campbell, Jennifer D., Paul D. Trapnell, Steven J. Heine, Ilana M. Katz, Loraine F. Lavallee, and Darrin R. Lehman (1996), "Self–Concept Clarity: Measurement, Personality Correlates, and Cultural Boundaries," *Journal of Personality and Social Psychology*, 70 (1), 141–56.

Crisp, Richard J., and Miles Hewstone (2007), "Multiple Social Categorization," *Advances in experimental social psychology*, 39, 163-254.

Dunlop, William L. (2017), *Self-Concept Clarity*, Springer, Cham.

Hirsh, Jacob B. and Sonia K. Kang (2016), "Mechanisms of Identity Conflict: Uncertainty, Anxiety, and the Behavioral Inhibition System," *Personality and Social Psychology Review*, 20(3), 223-44.

Jiang, Tonglin, Zhansheng Chen, and Constantine Sedikides (2019), "Self–Concept Clarity Lays the Foundation for Self–Continuity: The Restorative Function of Autobiographical Memory," *Journal of personality and social psychology.*

Morrison, Kimberly Rios and Camille S. Johnson (2011), "When What You Have Is Who You Are: Self-Uncertainty Leads Individualists to See Themselves in Their Possessions," *Personality and Social Psychology Bulletin*, 37 (5), 639–51.

How Mere Manager Response Influences Product Evaluations

Vincentia Yuen, University of Miami, USA
Michael Tsiros, University of Miami, USA

EXTENDED ABSTRACT

As firms gradually notice the impact of electronic word of mouth (eWOM) on business performance, online review management has become more prominent in marketing practice. Rather than subtly intervene in eWOM by promotional reviewing (Mayzlin, Dover, and Chevalier 2014), firms start to actively engage in eWOM conversations by responding to customer reviews to restore customer satisfaction (Gu and Ye 2014) and influence future reviews (Proserpio and Zervas 2017) via a manager response (MR) feature.

While MRs are, in theory, directed at reviewers, Murphy (2019) finds that 97% of review readers also attend to MRs when they evaluate products online. For this reason, even if managers are responding to prior failures, the impact of such highly observable MRs should no longer be confined to the focal recipients who wrote the initial reviews but should also extend to all customers who observe such responses. In the current research, we build on service recovery literature and hypothesize that the mere presence of MR —with no knowledge of the actual content—can positively shape consumer responses.

It is well-established that a successful recovery from service failure could restore customer satisfaction and enhance repurchase intentions (Grewal, Roggeveen, and Tsiros 2008). When firms recover in a way that builds customer trust, customers are more likely to make confident predictions about the firms' future recovery behaviors and thus commit themselves to ongoing relationships (Kim, Kim, and Kim 2009). As trust could also be acquired by observing or learning from previous interactions (e.g., conflicts) that the firm has had with others in similar situations (Holmes 1991; Tax et al. 1998), we argue that previous recovery episodes should enhance prospective customer trust and enhance product evaluations on the basis of a positive expectation of solving any potential future failures. Formally, we hypothesize:

Hypothesis 1: *The mere presence (vs. absence) of manager response to negative reviews enhances product evaluations.*

Hypothesis 2: *The effect of the presence of manager response on product evaluations in H1 is mediated by the increase in perceived recovery and subsequent customer trust toward the firm.*

Three studies examine the hypotheses and the proposed psychological mechanism. In all studies, participants first read identical product information along with actual hotel or restaurant reviews (where we only manipulated the presence of MR) and responded to measures on seven-point Likert scales. It is worth noting that we examine the impact of the *mere* presence of MR, rather than the effects driven by the MR content itself.

Study 1 (N= 258) tested the central hypothesis that the mere presence of MR enhances product evaluations with a 3(MR: mere presence vs. with content vs. control) between-subjects design. As one might question how our findings might compare to the more popular practice of having MR response present publicly, we also examine a condition in which (a widely used) response content (acknowledgment and apology) is shown in this study. After reading the stimulus, participants indicated their product evaluations (α = .940). Results supported our prediction (H1). Product evaluations in the two MR presence conditions (Mmere = 4.70, F(1, 255) =2.431, p=.016 and Mcontent = 4.75, F(1, 255)=2.776, p=.006) were significantly higher than that in the control condition (Mcontrol = 4.34). As expected, we found no significant difference in product evaluations between the two MR presence conditions (F(1, 255)=.351, p = .726).

Study 2 (N= 273) tested the hypothesized mechanism (H2) with a 2(MR: presence vs. control) between-subjects design. We measured product evaluations (α = .969), trust (α= .960), and perceived recovery (e.g., "I expect the [firm] to try to make up for any negative issues mentioned in the reviews," α = .843) respectively. As predicted, the presence of MR increased product evaluations (4.08 vs. 3.79; t(271) = 1.94, p =.053). A serial mediation analysis (PROCESS model 6; Hayes 2018) confirmed our hypothesized process (b = .24; 95% CI from .0611 to .4273) that the presence of MR made consumers perceive the firm will address the issues mentioned in the review (b = .48, t = 2.65, *p* <.01), which enhanced customer trust toward the firm (b = .64, t = 18.73, *p* < .001) and thus boosted product evaluations (b = .78, t = 19.87, *p*< .001).

Lastly, study 3 (N= 231) further examined the hypothesized underlying process by directly manipulating perceived recovery through review valence with a 3 (MR presence: negative reviews vs. both positive and negative reviews vs. control) between-subjects design. If, as we suggest, MR increases product evaluations by making the firm seem more likely to address the negative issues raised in reviews and lead to higher trust, then having managers also reply to positive reviews should weaken this positive effect from the MR. We measured product evaluations (α = .898), trust (α= .916), and perceived recovery (α = .836) in a randomized order. As predicted, planned contrasts revealed that product evaluations in the condition with MRs to negative reviews (M = 4.94) were significantly higher than that in the condition with MRs to both positive and negative reviews (M = 4.45; F(1, 228) = 2.573, p=.011) and the control condition (M = 4.43; F(1, 228) = 2.618, p=.009). We found no significant difference in product evaluations between the latter two conditions (F(1, 228)= .104, p = .917). The serial mediation analysis (PROCESS model 6) again confirmed that perceived recovery and customer trust mediated the effect of MR on product evaluations (b = .27; 95% CI from .0902 to .4711). Overall, H1 and H2 were supported.

In sum, this research contributes to the eWOM literature by showing how firms could proactively intervene in the impact of online reviews on consumer responses. To date, no research has examined the psychological processes underlying the impact of MRs on prospective customer evaluations. Hence, by extending key findings in the service recovery literature, this research yields important insight into the process explanation and shows how the mere signal of response to a negative prior review could influence product evaluations. From a substantive perspective, this research offers clear implications to practitioners, particularly those under pressure to manage their online reputation.

REFERENCES

Grewal, Dhruv, Anne L. Roggeveen, and Michael Tsiros (2008), "The Effect of Compensation on Repurchase Intentions in Service Recovery," *Journal of Retailing*, 84 (4), 424-34.

Gu, Bin, and Qiang Ye (2014), "First Step in Social Media: Measuring the Influence of Online Management Responses on Customer Satisfaction," *Production and Operations Management*, 23 (4), 570-82.

Holmes, John G. (1991), "Trust and the Appraisal Process in Close Relationships," *Advances in Personal Relationships*, 2, 57-104.

Kim, Taegoo Terry, Woo Gon Kim, and Hong-Bumm Kim (2009), "The Effects of Perceived Justice on Recovery Satisfaction, Trust, Word-Of-Mouth, and Revisit Intention in Upscale Hotels," *Tourism Management*, 30 (1), 51-62.

Mayzlin, Dina, Yaniv Dover, and Judith Chevalier (2014), "Promotional Reviews: An Empirical Investigation of Online Review Manipulation," *American Economic Review*, 104 (8), 2421-55.

Murphy, Rosie (2019), "Local Consumer Review Survey: Online Reviews Statistics & Trends," https://www.brightlocal.com/research/local-consumer-review-survey/.

Proserpio, Davide, and Georgios Zervas (2017), "Online Reputation Management: Estimating the Impact of Management Responses on Consumer Reviews," *Marketing Science*, 36 (5), 645-65.

Tax, Stephen S., Stephen W. Brown, and Murali Chandrashekaran (1998), "Customer Evaluations of Service Complaint Experiences: Implications for Relationship Marketing," *Journal of Marketing*, 62 (2), 60-76.

Does Space Speak Quantities? The Impact of Interspace on Product Size Estimates

Yuli Zhang, Stockton University, USA
Hyokjin Kwak, Drexel University, USA
Marina Puzakova, Lehigh University, USA
Charles R. Taylor, Villanova University, USA

EXTENDED ABSTRACT

Academic research has recognized the general significance of space in a retail setting and marketing communications by devoting attention to the study of the downstream consequences of the amount of space allocated to products in a display (e.g., shelf display, POP/advertising display) (Dreze, Hoch, and Purk 1994; Parker and Lehmann 2011). However, this past streams of work have primarily focused on either variation in the amount of space dedicated to a product display itself (e.g., more or less amount of display space) or the alteration in the space-to-product ratio (e.g., high or low interstitial space) in a display. Our research significantly differs from these prior investigations in that we examine the impact of the *existence* of space *between* products (hereafter referred to as "interspace") as opposed to the overall space *surrounding* products. In our research, we hold the amount of display space constant and demonstrate that the existence or nonexistence of interspace in a product display has unique consequences for judgments of product size. We posit that an interspatial (vs. a non-interspatial) product display is likely to increase consumers' perceived product size.

Prior research on visual processing demonstrates that space between entities facilitates an entity's recognition or increases its delineation from the background (Qiu, Sugihara, and von der Heydt 2007; Rayner 2011). In this regard, prior research points out that objects are more readily recognizable when they are separated by background space than when they are connected to each other or overlapping (Qiu et al. 2007). In situations where distinction from the background is enhanced, this causes increased salience of the target stimulus (Nothdurft 2000), which in turn affects the allocation of attention to that stimulus (Bacon and Egeth 1994). Overall, prior research suggests that when space isolates objects in a visual field from the background they are more salient and, thus, attract more attention. We further theorize that such increased attention to products in an interspatial (vs. a non-interspatial) product display subsequently results in greater size perceptions. According to prior research, an object appears to be larger and/or of greater quantity when people's attention is automatically directed to this object (Folkes and Matta 2004). Hagtvedt and Brasel (2017) also show that objects with highly saturated colors attract more attention and, thus, are perceived to be larger. Taken together, these findings point out that increased attention devoted to an object prioritizes processing mental resources to make size estimation better.

Study 1 examines the core effect of interspace on product size estimates and the underlying mechanism. Participants (n = 103) were instructed to view a print ad which included an image of three cans of a fictitious brand of wafers. In the interspatial (non-interspatial) display condition, the cans were presented with a perceptually recognizable space (vs. no space) between them. Participants then reported their perceived product size. As predicted, participants in the interspatial (vs. non-interspatial) display condition estimated a greater quantity of wafer rolls per product package ($M_{interspatial}$ = 23.06 vs. $M_{non-interspatial}$ = 17.21; t(101) = 2.21, $p < .05$). Mediation analysis revealed a significant indirect path from interspatial product display to product size estimates through attention (95% CI = [.2317, 3.9667]). The effect of interspatial product display on product size estimates through product popularity and quality were not significant.

Study 2 aims to replicate the findings of Study 1. Participants were asked to imagine going to a store and considering buying mixed nuts and then were presented with a shelf image displaying the fictitious brand of mixed nuts. We manipulated interspatial (non-interspatial) product display similar to that of Study 1, with only slight modifications. Study 2A (n = 160) kept the number of products and the amount of white space between conditions constant. Study 2B (n = 87) held the size of the display between conditions constant. As expected, participants estimated that one product package contained a higher number of servings of mixed nuts in the interspatial (vs. non-interspatial) display condition (Study 2A: $M_{interspatial}$ = 11.38 vs. $M_{non-interspatial}$ = 9.26; t(158) = 1.99, $p < .05$; Study 2B: $M_{interspatial}$ = 6.54 vs. $M_{non-interspatial}$ = 5.28; t(85) = 2.09, $p < .05$). Mediation analysis revealed a significant indirect path from interspatial product display to product size estimates through attention (Study 2A: 95% CI = [.0525, 1.0726]; Study 2B: 95% CI = [.0319, .8221]).

Study 3 provides further process evidence by manipulating individuals' attention level. Participants (n = 155) first viewed a one-tier shelf image displaying HK shampoo. Interspatial (non-interspatial) product display was manipulated in a manner similar to that of Study 1. At the same time, participants' level of attention was manipulated via a distraction task. In the distraction (no distraction) condition, a popular song was played (no music was played) while participants were exposed to the HK shampoo display. After viewing the image, participants then indicated their perceived product size. As expected, when participants were not distracted, they estimated the product to contain more quantity in the interspatial (vs. non-interspatial) display condition (how many washes per bottle: $M_{interspatial}$ = 58.55 vs. $M_{non-interspatial}$ = 37.71; F(1, 150) = 9.15, $p < .01$; how long to use up (days): $M_{interspatial}$ = 68.81 vs. $M_{non-interspatial}$ = 47.97; F(1, 150) = 6.74, $p < .02$). However, when participants were distracted, there was no significant difference in perceived product size between the two conditions (Fs < 1).

From a theoretical point of view, our research contributes to the literature by identifying a novel spatial factor, the mere existence of interspace in a display, that has unique consequences for judgments of product size. Our work also provides significant managerial guidelines for the use of space between products in a product display.

REFERENCES

Bacon, William F. and Howard E. Egeth (1994), "Overriding stimulus-driven attentional capture," *Perception & Psychophysics*, 55 (5), 485-496.

Dreze, Xavier, Stephen J. Hoch, and Mary E. Purk (1994), "Shelf management and space elasticity," *Journal of Retailing*, 70 (4), 301-326.

Folkes, Valerie and Shashi Matta (2004), "The effect of package shape on consumers' judgments of product volume: attention as a mental contaminant," *Journal of Consumer Research*, 31 (2), 390-401.

Hagtvedt, Henrik and S. Adam Brasel (2017), "Color saturation increases perceived product size," *Journal of Consumer Research*, 396-413.

Nothdurft, Hans-Christoph (2000), "Salience from feature contrast: additivity across dimensions," *Vision Research*, 40 (10-12), 1183-1201.

Parker, Jeffrey R. and Donald R. Lehmann (2011), "When shelf-based scarcity impacts consumer preferences," *Journal of Retailing*, 87 (2), 142-155.

Qiu, Fangtu T., Tadashi. Sugihara, and Rüdiger von der Heydt (2007), "Figure-ground mechanisms provide structure for selective attention," *Nat Neurosci*, 10 (11), 1492-1499.

Rayner, Alan David (2011), "Space cannot be cut—why self-identity naturally includes neighbourhood," *Integrative Psychological and Behavioral Science*, 45 (2), 161-184.

The Pursuit of Pragmatic Truth at the Cost of Literal Truth

Charles Y. Zhang, University of California, Riverside, USA
Norbert Schwarz, University of Southern California, USA

EXTENDED ABSTRACT

In communication, listeners expect speakers' utterances to be truthful and speakers expect their utterances to be accepted as true. Philosophers and linguists consider it a core principle of cooperative conversation that speakers should only say what they believe to be true (Grice, 1975). Grice (1989) noted that his other maxims of conversation (relation, quantity, and manner) "come into operation only on the assumption that this maxim of quality is satisfied" (p. 27).

In the present research, we challenge this view and introduce a distinction between literal and pragmatic truth. To tell a *literal truth*, a speaker should avoid saying anything she does not believe to be part of the fact. To tell a *pragmatic truth*, a speaker should provide information that is as close to the fact as possible on the variable that is most relevant to the audience. Although the goals of achieving literal and pragmatic truth are often aligned, they can conflict in contexts where the fact cannot be entirely and precisely communicated, e.g., e.g., due to a lack of time, technical difficulties, or the recipient's lack of background knowledge. We propose that, in these cases, speakers will, and will be expected to, form utterances that maximize the pragmatic truth, even at the cost of literal truth. In the present research, we pitch statements that are literally true but pragmatically false against statements that are literally false but pragmatically true. We demonstrate the existence of situations in which pragmatically true statements are considered more appropriate than literally true statements and discuss the implications of the findings for marketing contexts.

In study 1, participants were told that a medicine was recently found to have side effects, including *dry mouth* and *heart attack*. An official misspoke in a radio interview that "the medicine may cause side effects such as dry mouth and liver failure." The editor's only choices were to either broadcast this interview or a trimmed version of it: "the medicine may cause side effects such as dry mouth." The original statement is literally false but pragmatically truer because liver failure and heart attack are comparable in terms of their severity. As predicted, the majority of participants considered that the trimmed version better reflected the facts, but chose the full version to broadcast.

In study 2, participants imagined being a burglar whose task it is to warn a partner of any approaching cops. They had agreed to position their arms horizontally if no cop is in sight and vertically if a cop is approaching. Participants were told that, although no cop was approaching, they spotted a hidden surveillance camera when their partner was about to commit the crime. In this situation, the gesture that indicates an approaching cop could serve as a warning even though no cop was seen; it would hence serve the pragmatic purpose while being literally false. As expected, most participants chose to hold the arms vertically, thus conveying a warning, while also agreeing that the explicit prerequisite for this signal (cop approaching) was not met.

An utterance can be relevant to different listeners in different ways. Statements that are pragmatically true to some listeners may not be pragmatically true to others, which should affect speakers' choice of utterances. In study 3, participants learned that a typhoon hit a Pacific island and destroyed a warehouse and the only seaport. Two local officials were interviewed. One stated that a warehouse was destroyed and the other stated that a warehouse and the only airport were destroyed. Half of the participants were told that the interview would be used as part of a call for international charity donations; the other half were told that the interview would be used to inform the coordinators of international rescue teams. All participants were asked to 1) choose which interview should be issued, and 2) identify which statement was more accurate. For donors, it is irrelevant if the damage pertains to the seaport or airport as long as the severity of damage is comparable. In contrast, whether the seaport or the airport is destroyed is crucial for rescue teams, who need to approach the island. Accordingly, while most participants in both conditions considered "a warehouse and the airport were destructed" less accurate, they chose to issue this statement to potential donors but not to rescue teams.

Study 4 provides process evidence that a speaker's choice of utterance is driven by the extent to which she believes that the utterance is pragmatically true. Participants learned that a medicine could lead to side effects such as dry mouth and heart attack. The official misspoke the side effects either as "dry mouth and liver failure," "heart attack and itchy skin," or "dry mouth and itchy skin." All participants were given a choice of broadcasting the original version or to trim off the second side effect of the corresponding statement. They also rated the severity of the four side-effects. When the speaker mentioned dry mouth and liver failure, most participants chose to broadcast this (literally false) statement over the trimmed version. Their decision to do so was mediated by their perceived severity of the side effect. In contrast, significantly fewer participants chose to broadcast one of the other literally false statements (heart attack and itchy skin or dry mouth and itchy skin).

In sum, the present research highlights the distinction between pragmatic and literal truth. When literal truth conflicts with pragmatic truth under conditions of communication constraints, speakers choose the pragmatically true statement over the literally true statement.

REFERENCES

Grice, H. P. (1975). Logic and conversation. In *Speech acts* (pp. 41-58). Brill.

Grice, H. P. (1989). *Studies in the Way of Words*. Harvard University Press.

Horn, L. (1984). Toward a new taxonomy for pragmatic inference: Q-based and R-based implicature. *Meaning, form, and use in context: Linguistic applications*, *11*, 42.

Johnson, E. J., & Goldstein, D. (2003). Medicine. Do defaults save lives?. *Science (New York, NY)*, *302*(5649), 1338-1339.

Levinson, S. C., Stephen, C., & Levinson, S. C. (2000). *Presumptive meanings: The theory of generalized conversational implicature*. MIT press.

Thomson, J. J. (1985). The trolley problem. *The Yale Law Journal*, *94*(6), 1395-1415.

Maximizing Strengths or Fixing Weaknesses?
Evaluatees Tend to Fix Weaknesses More Than Evaluators Appreciate

Xiaoying Zheng, Nankai University, China
Yanping Tu, University of Florida, USA
Jingting Yuan, China Construction Bank, China
Jing Xu, Peking University, China

EXTENDED ABSTRACT

Everything has its strengths and weaknesses. For instance, a restaurant may receive an above average rating on food quality, but an average rating on service; a job candidate may have better analytical skills than writing skills. When given an opportunity to improve, do people (e.g., the restaurant manager, the job candidate) prioritize maximizing strengths (e.g., food quality, analytical skills) or fixing weaknesses (e.g., service, writing skills)? Moreover, often times, these decisions are made to cater to others' preferences. For instance, the restaurant manager would like to win consumers' heart; the job candidate hopes to get recruiters' vote. Do the restaurant manager and the job candidate make improvement decisions optimally?

We examine decision contexts like these, which involve an evaluatee/seller who provides products for others to evaluate or select, and an evaluator/buyer who evaluates or selects among products provided by evaluatees. Evaluatees often make decisions to improve an original product (P_O) that has strengths and weaknesses. Should they prioritize maximizing strengths (MS) or fixing weaknesses (FW)? Sometimes the answer is obvious: if the weakness falls below the acceptable threshold, then FW will be imperative; if the return for improving a certain attribute is higher, then effort should be devoted to that attribute. However, in situations where the original product (1) is reasonably good such that the weakness is not alarmingly unacceptable and (2) the return of improving either the strength and the weakness is similar, what should evaluatees do? To illustrate (figure 1), consider, in a 5-star evaluation system, a product at the original state P_O (4.3, 4.0), scoring 4.3 on attribute A (i.e., the strength) and 4.0 on attribute B (i.e., the weakness). Suppose the evaluatee can improve the rating of one (and only one) attribute by 0.3. Should they improve attribute A or B?

To answer this question, our empirical approach is to present the final products of the two strategies to evaluators, ask evaluators to choose, and assess the match. Specifically, maximizing strengths will lead to a product with more polarized attributes, some extremely strong and some relatively weak (P_{MS}); fixing weaknesses will lead to a product with more balanced attributes, all moderately strong (P_{FW}). We measure whether evaluators prefer P_{MS} or P_{FW}, as a proxy of their appreciation of evaluatees' effort of MS or FW.

Evaluatees Prefer Fixing Weaknesses More Than Evaluators Appreciate

We propose that evaluatees may choose FW more than evaluators appreciate, for the following reasons. To begin with, it is well documented that people feel apprehensive (also described as anxious, uneasy, or worried in literature) when being judged by others (i.e., evaluation apprehension; Rosenber 1969). Feeling apprehensive, evaluatees may consider more about the negative prospects of their decision (e.g., being rejected or disliked by evaluators), rather than the positive prospects (e.g., being selected or favored by evaluators). Our proposition is informed by two streams of research. First, mood alters cognition (Mayer et al. 1992; Johnson and Tversky 1983): people attend to mood-congruent information, generate mood-congruent thoughts, and expect mood-congruent event to be more likely to happen. More specifically, apprehension heightens

sensitivity to potentially threatening information and negative outcomes: apprehensive individuals detect negative information faster (Bradley, Mogg and Lee 1997), interpret ambiguous stimuli in a more negative way (Calvo and Castillo 1997; Eysencket al. 1991), and perceive higher risks of negative events (e.g., failing an exam, catching a disease) (Butler and Mathews 1987; Mitte 2007). Another stream of research that informs our proposition is about how motivational orientation (prevention vs. promotion focus; Higgins 1997) changes thinking. Specifically, apprehension is associated with a prevention-focus (Klenk, Strauman, and Higgins 2011), a "vigilant, negative-outcome-focused motivational state," which makes people attend to negative information and work towards avoiding negative outcomes (rather than achieving positive outcomes).

Thinking guides action. If follows that, when evaluatees worry about the negative prospects of being rejected or disliked, they act on the aspect that is more likely to cause it. Because weaknesses (rather than strengths) are the more likely causes of the negative prospects, evaluatees will act on weaknesses to ensure that they provide no grounds for rejection.

However, evaluators, the other party in the evaluatee-evaluator dyad, do not experience such apprehension and are less likely to adopt a negative focus when choosing a product. Compared to evaluatees, their attention is less likely to be drawn to the weakness attribute, and, consequently, they would not appreciate evaluatees' effort of FW as much.

In sum, our central hypothesis is that, when making improvement decisions, evaluatees tend to fix weaknesses more than evaluators appreciate, because they are in a more apprehensive state and engage in more negative thinking.

Study 1: Job Candidate vs. Recruiter

Study 1 (N = 173) tests our basic hypothesis in the job market context, using a one-factor two-level (evaluatee vs. evaluator) between-participants design.

In the evaluatee condition, participants imagined themselves hunting for a job and preparing for two equally important job entrance tests (A and B). They learned that the total score of each test was 150, and that, in a mock test, they scored 120 for test A and 100 for test B. Participants further supposed that they could improve the score on either test by 20 points, and indicated whether they would like to improve test A (the strength) or test B (the weakness).

In the evaluator condition, participants imagined being a recruiter and choosing between two candidates. They learned that the total score of each test was 150, and that, candidate 1 scored 140 on test A and 100 on test B (i.e., the end state of the evaluatee had they chosen to improve test A), whereas candidate 2 scored 120 on both tests (i.e., the end state of the evaluatee had they chosen to improve test B). Evaluators indicated which candidate they would like to recruit.

Evaluatees who chose to work on test A [test B] were coded as preferring MS [FW]; evaluators who selected candidate 1 [candidate 2] were coded as preferring MS [FW]. A Chi-Square test showed that evaluatees preferred FW (63%; 53 out of 84) more than evaluators

(45%; 40 out of 89; $\chi^2(1) = 5.73$, $p = .017$, odds ratio = 2.09), lending support to our basic hypothesis.

Study 2: Vacation Spot Manger vs. Consumer

Study 2 (N = 402) aimed to explore the main effect in a marketer-consumer setting. We also examined whether (1) the importance of the weakness attribute and (2) whether P_{FW} received perfectly balanced scores on both attributes had an impact. It used a 2 (evaluatee vs. evaluator) x 2 (P_{FW} has perfectly balanced attribute scores: yes vs. no; conceptual replication factor) x 2 (importance of the weakness attribute: high [food]vs. low [entertainment]; conceptual replication factor) between-participants design.

In the evaluatee conditions, participants imagined themselves being a manager of a vacation spot with food and entertainment (abbreviated to entmt.) as the two major attributes. They can improve the rating of one dimension by 0.2. In the evaluator conditions, participants imagined themselves making a choice between two vacation spots which differed in ratings on food and entertainment. Information on attribute values shown to evaluatees and evaluators respectively is in appendix A.

We coded participants' preferences for MS/FW. The choice share for FW broken by cells is shown in appendix B. A 2 (evaluatee vs. evaluator) x 2 (P_{FW} has perfectly balanced attribute scores: yes vs. no) x 2 (importance of the weakness attribute: high [food]vs. low [entertainment]) logistic regression with choice (0 = MS, 1 = FW) as the dependent variable yielded neither a three-way interaction nor any two-way interactions (all $ps > .350$). Thus, we collapsed data on the latter two factors and ran a chi-square test, finding that evaluatees preferred FW (72%, 149 out of 208) marginally more than evaluators (63%, 122 out of 194; $\chi^2(1) = 3.50$, $p = .061$, odds ratio = 1.49).

Collectively, studies 1 and 2 established the main effect, as well as demonstrated its generalizability.

Study 3: Testing the Underlying Mechanism

Study 3 (N = 401) aimed to test the proposed mechanism: evaluatees consider more about the negative prospects of their decisions, leading them to act on the more likely cause (i.e., weakness). In addition, we generalized the effect to a new domain: Airbnb, with a host and a guest as the seller-buyer dyad. This study used a one-factor two-level (evaluator vs. evaluatee) between-participants design.

In the evaluator condition, participants assumed the role of an Airbnb host who was considering whether to improve the amenities or the interior design (i.e., two focal attributes of their apartment). Participants learned that their apartment was currently rated 4.0 and 4.3 on interior design and amenities, respectively, on Airbnb's 5-star rating system. They further learned that they had the resources to improve the customer rating of one, and only one, attribute by 0.3. Participants then chose one attribute to improve. In the evaluatee condition, participants assumed the role of an Airbnb guest who was choosing between two apartments. Apartment A was rated 4.0 on interior design and 4.6 on amenities (i.e., P_{MS}). Apartment B was rated 4.3 on both interior design and amenities (i.e., P_{FW}).

Afterward, participants indicated (1) whether they experienced a negative mentality ("I was worried that guests may not like my apartment" and "I felt uncertain about what kind of apartment would be preferred by guests." in the evaluatee condition; "I was worried that I may not like the apartment I chose" and "I felt uncertain about what kind of apartment I prefer." In the evaluator condition) and (2) whether they adopted a negative focus ("I was worried that guests may focus more on the lower rated aspect of my apartment" and "I was worried that guests may not choose my apartment because of its lower rated aspect." in the evaluatee condition; "I focused more on

the lower rated aspect of these apartments" and "I made the decision based on the lower rated aspect of these apartments." in the evaluator condition). (1 = *completely disagree*, 7 = *completely agree*).

Replicating the findings in Studies 1 and 2, the results showed that evaluatees (hosts) preferred FW (49%, 98 out of 201) more than evaluators (guests) (30%, 60 out of 200; $\chi^2(1) = 14.77$, $p < .001$; odd ratio = 2.22). Evaluatees (M = 4.11, SD = 1.40) experienced a more negative mentality than evaluators (M = 3.31, SD = 1.31) (t(399) = 5.94, $p < .001$), and adopted a more negative focus (M = 4.36, SD = 1.77) than buyers (M = 3.39, SD = 1.55) (t(399) = 5.84, $p < .001$). The planned serial mediation (PROCESS Model 6; Hayes 2013) confirmed that negative mentality and negative focus mediated the impact of role (evaluatee vs. evaluator) on preference for FW (95% CI = [.1185, .3355]).

Study 4: Car Manufacturers vs. Car Buyers

Although for simplicity and clarity, we conducted our analysis and most empirical work in a two-products and two-attributes context where evaluatees choose to improve one attribute, our theory could make predictions in multiple-products and multiple-attributes contexts where evaluatees can choose to improve multiple attributes. In such contexts, MS means increasing the variance across attributes (i.e., making attribute values more polarized), whereas FW means reducing the variance across attributes (i.e., making attribute values more balanced).

Study 4 offered such an empirical test, modeling real decisions by car manufactures (evaluatees) and buyers (evaluators). We linked (1) a unique proprietary data set of multi-attribute rating information (fuel consumption, handling, horsepower, exterior styling, interior design, comfort, and space), scraped from a leading customer review website, of the top 20% major cars and (2) their corresponding monthly sales volumes in the Chinese market, between January 2014 and October 2019 (70 months).

Car manufacturers make decisions to improve car models on a yearly basis, and thus we coded attribute rating at year-level. Their choice of FW [MS] would manifest as a decrease [an increase] of variance across attributes (Var) from time t-1 to time t. We note the possibility that the whole industry might be shifting to produce cars with more balanced (or more polarized) attributes due to external factors, and thus standardized Var based on the average variance of all the car models in the given year (SVar). We reason that, if car manufacturers adopt a FW strategy, then a car with an above-average variance last year should have a larger decrease in variance this year. Put formally, our dependent variable was the difference of standardized variance between year t and year t-1 for car i (), and our main predictor was standardized variance of car i in year t-1 (). We included rating valence (), sales volume (), and price () of car i in year t as control variables. We also incorporated fix effects for car () and for time (). Equation is shown below.

$$SVar_{it} - SVar_{it-1} = \beta_0 + \beta_1 SVar_{it-1} + \beta_2 Valence_{it} + \beta_3 Volume_{it} + \beta_4 Price_{it} + \alpha_i + f_t + \varepsilon$$

If manufacturers choose FW [MS], then should be negative [positive]. Our theory predicts that should be negative. Regression results supported our theory (see appendix C).

Car buyers make purchase decisions based on customer review information. Because we obtained monthly sales data, we coded attribute rating data at monthly level. Our dependent variable was *sales volume* of car i at month t (), and our main predictor was the accumulative variance at month t-1 of car i (). Note that we used accumulative reviews, because when a buyer reads reviews at time t, she gets reviews from time 1 to time t. Our control variables included accumulated valence from time 1 to time t (), accumulated volume

from time 1 to time t (), and price at time t of car i (). In addition, to control for the impact of the change in the entire industry, we factored in accumulated industry-level variance (Var_industry$_{it}$) by averaging variances in all the accumulated reviews for all cars from time 1 to time t. We also incorporated fix effects for car () and for time (). Equation is shown below.

$$SalesVolume_{it} = \gamma_0 + \gamma_1 Var\_review_{it-1} + \gamma_2 Valence_{it} + \gamma_3 Volume_{it} + \gamma_4 Price_{it} + \gamma_5 Var\_industry_{it} + \alpha_i + f_t + \varepsilon$$

If consumers appreciate FW [MS], then should be negative [positive]. Our theory predicts that should be positive. Regression results supported our theory (see appendix D).

General Discussion

Across three lab studies and two secondary data sets collected in both the US and China, we document a robust effect that evaluatees choose to fix weaknesses more than evaluators appreciate. We further identify the underlying psychological process: evaluatees experience apprehension and focus more on negative prospects.

Our research adds to literature on improvement decision, which previously only focused on establishing methods to calculate financial returns post hoc (Rust, Zahorik and Keiningham 1995). It enriches literature on how roles shape preferences and decisions (Weaver, Garcia and Schwarz 2012; Woolley and Fishbach 2018). Last but not the least, our research offers clear recommendations for managers that they should give prioritize maximizing strengths rather than fixing weaknesses.

REFERENCES

Bower, G. H. (1981). "Mood and Memory," *American Psychologist,* 36, 129-148.

Johnson, Eric J., and Amos Tversky (1983), "Affect, Generalization, and the Perception of Risk," *Journal of Personality and Social Psychology,* 45(1), 20-38.

Klenk, Megan M., Timothy J. Strauman, and E. Tory Higgins (2011), "Regulatory Focus and Anxiety: A Self-regulatory Model of GAD-depression Comorbidity," *Personality and Individual Differences,* 50(7), 935-943.

Rust, Roland T., Anthony J. Zahorik, and Timothy L. Keiningham (1995), "Return on Quality (ROQ): Making Service Quality Financially Accountable," *Journal of Marketing,* 59(2), 58-70.

Weaver, Kimberlee, Stephen M. Garcia, and Norbert Schwarz (2012), "The Presenter's Paradox," *Journal of Consumer Research,* 39(3), 445-460.

Woolley, Kaitlin, and Ayelet Fishbach (2018), "It's About Time: Earlier Rewards Increase Intrinsic Motivation," *Journal of Personality and Social Psychology,* 114(6), 877-885.

Donating Cash or Donating Objects? How Donation Type Determines Donation Likelihood

Xiaozhou (Zoe) Zhou, IE Business School, Spain
Dilney Gonçalves, IE Business School, Spain

EXTENDED ABSTRACT

Charities have been concerned about in-kind donations (vs. cash donations) shipped to disaster-affected areas displacing more urgent shipments and incurring high logistic costs (Brooks 2018; Piper 2019). However, a pre-test (30 participants) revealed that more than half of the participants believed that making in-kind donations (i.e., food/supplies) was a better way to help disaster-affected area. In this research, we sought to provide evidence for and explain the underlying mechanism of donors' preference for in-kind donations.

Research of imagery has recognized that stimulus plays an important role in eliciting imagination (MacInnis and Price 1987; Spears and Yazdanparast 2014). Moreover, researchers demonstrate that stimulus with higher concreteness is better at inducing imagination (Burns, Biswas, and Babin 1993; Yoo and Kim 2014). Drawing on previous findings, we propose that in-kind donations, which are both tangible and concrete, are more likely to induce donors' imagination about how their donation can be used. Since people have higher confidence about the likelihood of an event happening if they have previously imagined the same situation (Anderson 1983; Carroll 1978), we hypothesize that asking for in-kind donations will increase donors' contribution confidence about their donation's helpfulness, thus increasing donation intention.

Consumers vary in their imaginal processing ability (Ernest 1977). Studies that examined the effect of imagery-eliciting strategies on advertising found that advertisements that instructed consumers to imagine were more effective to participants with high imaginal ability (Burns et al. 1993). We thus predict that donors with high imaginal ability will show a stronger preference for in-kind donations by better using the stimulus (the in-kind donations) to imagine an end result. Low imaginal ability donors, in contrast, have limited ability to use stimulus to imagine a similar situation. Consequently, we hypothesize that donors' imaginal ability will moderate the effect of donation type on donors' perceived contribution confidence.

According to construal-level theory, low-level construal leads people to construe events in a more concrete manner (Trope and Liberman 2010). Since the ease of imagination increases as concreteness increases (Sherman et al. 1985), we expect that the ease of imagination increases as mental construal decreases. Thus, we hypothesize that the effect of donation type on contribution confidence will be attenuated by low construal because low construal encourages imagination regardless of donation type.

In studies 1a and 1b participants were told to evaluate a situation where a charity, which was collecting donations for people who just suffered an earthquake, approached them at a supermarket. We employed a between-subjects design in study 1a and an independent-samples t-test revealed that donation likelihood was significantly higher for in-kind donations ($M_{physical}$ = 3.94, SD = 1.11; M_{cash} = 3.43, SD = 1.35; $t(159)$ = -2.60, p = .01). Study 1b used a within-subjects design. A paired-samples t-test showed that participants still preferred in-kind donations ($M_{physical}$ = 3.78, SD = 1.27; M_{cash} = 2.98, SD = 1.30; $t(79)$ = - 4.05, p < .001).

Study 2 examined how people react to nonprofits' ads that requested either cash or in-kind donation by using Google Adwords to post charity advertisements. Two advertisements were created to raise donations for Chinese residents living in the epidemic area during COVID-19 and the advertisements differed only in the first headline where we manipulated the donation request as either in cash or in in-kind. A third ad was created which instructed people in its description to imagine how their cash donation could be used to get face masks. Chi-square tests revealed that the likelihood of clicking on the in-kind advertisement was higher than the cash advertisement (χ^2 = 16.89, p < .01). People were also more likely to click the cash advertisement that encouraged imagination (χ^2 = 6.13, p < .02) compared to that which simply requested cash. We did not observe any difference between in-kind and cash advertisement with imagination (χ^2 = 1.07, p = .30).

Study 3 examined the moderated mediation with mental imaginal ability as a moderator. Participants were presented with a mostly identical charitable advertisement. The only difference was the type of donation the charity sought (in-kind or cash). We measured participants donation likelihood, contribution confidence (Macdonnell and White 2015), and imaginal ability (α = .73, scale developed by Childers, Houston, and Heckler (1985)). A regression with donation type, imaginal ability, and their interaction on contribution confidence (the mediator) revealed a significant interaction effect (β = 1.31, p = .01). The moderated mediation through contribution confidence was also significant (indirect effect = .99, SE = .42; 95% CI [.2172, 1.8927]). Participants with high imaginal ability indicated higher donation likelihood for in-kind donation as these increased their contribution confidence.

Study 4 examined moderated mediation with construal-level as a moderator. Mental construals were manipulated by social distance. The charity was either collecting donations (cash or in-kind) for people in the participants' hometown (low construal) or Indonesia (high construal). A regression with donation type, construal level, and their interaction on contribution confidence revealed a significant interaction effect (β = .96, p = .01). The overall moderated mediation was also supported (indirect effect = .71, SE = .27; 95% CI [.1929, 1.2589]). Participants with high mental construal indicated higher contribution confidence and donation intention for in-kind donation. We did not observe differences in contribution confidence between donation types when participants use low construal.

Past research mostly focused on the difference between cash donation and volunteering (Liu and Aaker 2008). Our research fills the gap by examining the difference between cash and in-kind donation. Moreover, our work adds to consumer imagination literature, particularly in the area of donation. We also provide practical implications. Our studies suggest that nonprofits can create advertisements that elicit imagination about how cash donations can be used to encourage cash donations. The results that construal levels can influence people's preferred donation type also provide guidance to nonprofits who target a wide range of donors. There are situations where nonprofits would prefer physical donations, and sometimes nonprofits might want to collect in-kind donations from nearby donors and cash donation from long-distance donors. In this case, different advertisements could be designed.

REFERENCES

Anderson, Craig A. (1983), "Imagination and Expectation: The Effect of Imagining Behavioral Scripts on Personal Influences," *Journal of Personality and Social Psychology*, 45(2), 293–305.

Brooks, Julia (2018), "Want to Help after Hurricanes? Give Cash, Not Diapers.," *The Conversation*.

Burns, Alvin C, Abhijit Biswas, and Laurie A Babin (1993), "The Operation of Visual Imagery as a Mediator of Advertising Effects," *Journal of Advertising*, 22(2), 71–85.

Carroll, John S (1978), "The Effect of Imagining an Event on Expectations for the Event: An Interpretation in Terms of the Availability Heuristic," *Journal of Experimental Social Psychology*, 14(1), 88–96.

Childers, Terry L., Michael J Houston, and Susan E Heckler (1985), "Measurement of Individual Differences in Visual Versus Verbal Information Processing," *Journal of Consumer Research*, 12(2), 125–34.

Ernest, Carole H (1977), "Imagery Ability and Cognition: A Critical Review," *Journal of Mental Imagery*, 1(2), 181–215.

Liu, Wendy and Jennifer Aaker (2008), "The Happiness of Giving: The Time-Ask Effect," *Journal of Consumer Psychology*, 35(3), 543–557.

Macdonnell, Rhiannon and Katherine White (2015), "How Construals of Money Versus Time Impact Consumer Charitable Giving," *Journal of Consumer Research*, 42(4), 551–63.

MacInnis, Deborah J and Linda L Price (1987), "The Role of Imagery in Information Processing: Review and Extensions," *Journal of Consumer Research*, 13(4), 473–491.

Piper, Kelsey (2019), "Why Disaster Relief Is so Hard," *Vox*, https://www.vox.com/future-perfect/2018/10/15/17927688/disasters-cyclone-idal-relief-mozambique.

Sherman, Steven J, Robert B Cialdini, Donna F Schwartzman, and Kim D Reynolds (1985), "Imagining Can Heighten or Lower the Perceived Likelihood of Contracting a Disease: The Mediating Effect of Ease of Imagery," *Personality and Social Psychology Bulletin*, 11(1), 118–27.

Spears, Nancy and Atefeh Yazdanparast (2014), "Revealing Obstacles to the Consumer Imagination," *Journal of Consumer Psychology*, 24(3), 363–72.

Trope, Yaacov and Nira Liberman (2010), "Construal-Level Theory of Psychological Distance," *Psychoanalytic Review*, 117(2), 440–63.

Yoo, Jungmin and Minjeong Kim (2014), "The Effects of Online Product Presentation on Consumer Responses : A Mental Imagery Perspective," *Journal of Business Research*, 67(11), 2464–72.

Can a Single Digit Make Consumers Eat Less? The Influence of Calorie Presentation Format on Consumers' Unhealthy Food Consumption

Li Zhou, Hunan Normal University, China
Leilei Gao, Chinese University of Hong Kong, China
Guowei Zhu, Hunan University, China

EXTENDED ABSTRACT

To alleviate the problem of obesity and promote consumers' well-being, many countries require food companies to provide nutritional information on food packages (FDA 2016; European (EU) No 1169/2011). Yet, with regard to information on calorie content in particular, different countries have different regulations (Appendix A). Take the original flavored Pringles potato chips as an example, companies selling in the EU market are required to present the calorie content of Pringles as a precise integer (154 calories per serving), whereas companies in the US market have to round the number of calories to the nearest multiple of 10 (150 calories per serving). An interesting question that arises is, does this tiny difference in the presentation of calorie information affect consumers' food consumption intentions and actual behavior?

A round number is defined as any integer that is a multiple of 10 (where numbers that end in more zeroes are considered to be "rounder" than numbers that end in fewer zeroes). Consumers perceive numbers that end with non-zero digits to be more precise than round numbers (Thomas, Simon, and Kaidiyali 2010; Pena-Marin and Bhargave 2016). Research suggests that people process round numbers more easily (or fluently) than they process precise numbers (Kettle and Häubl 2010; King and Janiszewski 2011; Wadhwa and Zhang 2014, 2019). The heightened processing fluency associated with round numbers is commonly attributed to the high frequency of usage of round numbers in daily life (Dehaene and Mehler 1992; Fassbender et al. 2014.

Prior research does not provide an obvious indication of whether round (vs. precise) presentation of calorie content is likely to positively or negatively affect consumers' perceptions of a particular food item. On the one hand, some studies suggest that processing fluency can evoke positive affective reactions, which individuals might misattribute to the target stimulus, leading them to evaluate it more favorably (Winkielman and Cacioppo 2001; Winkielman et al. 2003; Schwarz 2004). This account would suggest that presenting calorie information in round (vs. precise) numbers might elicit more positive affect, leading to more positive evaluations of the food item. Yet, other researchers downplay the role of positive affect triggered by processing fluency, and instead emphasize the general capacity of processing fluency to magnify one's judgment of a stimulus, whatever that judgment might be (Jacoby and Dallas 1981; Jacoby, Kelley, and Dywan 1989; Witherspoon and Allan 1985). This stream of research (Albrecht and Carbon 2014; Carbon and Albrecht 2016) suggests that a higher level of processing fluency can activate a clearer interpretation of the most salient source of the stimulus that is task-relevant at the time of judgment, thus intensifying one's original evaluations of that stimulus. In other words, under heightened processing fluency, an individual will evaluate positive attributes of the stimulus even more positively, and negative attributes more negatively (King and Janiszewski 2011; Wadhwa and Zhang 2014).

In the case of unhealthy foods, consumers usually have mixed evaluations. Such foods offer immediate hedonic enjoyment, but also high numbers of calories that conflict with long-term goals of staying healthy or losing weight (e.g., Read, Loewenstein, and Kalyanaraman 1999; Wertenbroch 1998). When processing calorie information of unhealthy foods, we suggest that consumers are likely to treat it as

negative information. Thus, for a given vice food item, we would expect a round-number presentation of caloric information (as opposed to precise presentation) to intensify consumers' negative evaluations.

Finally, we expect people's evaluative judgment of food items to have a direct impact on their consumption intention such that negative (positive) evaluation of a given food item will decrease (increase) consumption (e.g., Kivetz and Simonson 2002; Wertenbroch 1998). Therefore, it is expected that a round-number presentation of caloric information (as opposed to precise presentation) will intensify consumers' negative evaluations of unhealthy food items, and subsequently decrease consumption intention. We examined this proposition in four studies.

Study 1a

Method

Participants (N=114, 45.6% female, M_{age}=36.65, SD=10.19) recruited on Amazon M-Turk were randomly assigned to one of two conditions (round vs. precise calorie information) in a between-subject design.

All participants were shown the front and back package views of a brand of peanut butter flavored sandwich crackers, with either round (200 calories) or precise (202 calories) calorie information displayed on the back-pack nutrition facts label (Appendix B). Participants were then asked to estimate the number of crackers they would like to eat (between 0 and 30). As hunger has been reliably shown to affect people's food consumption level (Garg, Wansink, and Inman 2007; Tangari et al. 2019), in all studies we also recorded participants' hunger level ("How hungry are you at the moment?"; 1= *not at all*, 7= *extremely hungry*), and included hunger as a covariate in all the related analyses.

Results

Consistent with our expectation, participants indicated that they would eat fewer crackers when calorie information was presented as a round number (*M*=8.67, SD=6.37) than as a precise number (*M*=11.12, SD=8.8; $F(1, 111)$=4.37, p=.039, η^2=.04).).

Study 1b

Study 1B sought to replicate the findings of Study 1A using a different product and a different presentation method of calorie information. To assure that the effect was not only observed when the precise number was bigger than the round number, Study 1B adopted two precise presentation conditions where the precise numbers were either slightly higher or slightly lower than the round number. Finally, in Study 1B, we measured the perceived healthiness and perceived calorie level of the unhealthy food item and examined whether it was these judgments that were magnified by the round presentation of calorie numbers and subsequently caused the effect.

Method

Participants recruited via Amazon M-Turk (N=201, 46.8% female, M_{age}=36.79, SD=11.13) were randomly assigned to one of three conditions (round, precise-low, and precise-high) in a between-subject design.

They were told to look at the package design of a newly launched ice cream brand and indicate how much ice cream they would like to

eat at the moment (between 0 to 250 grams). The per-serving calorie content was 200 calories, 196 calories, and 204 calories for the round, precise-low, and precise-high conditions respectively (Appendix C). Next, they evaluated the perceived healthiness of the food item ("*In your opinion, how healthy is the ice cream?*"; 1=*Not at all healthy*, 7=*Very healthy*)" and the perceived calorie level of the ice cream ("*How do you perceive the calorie level of the ice cream?*"; 1=*Extremely low*, 7=*Extremely high*).

Results and Discussion

As expected, there was a significant difference in consumption intention across the three conditions ($F_{(2, 197)}$=3.48, p=.03, η^2= .033). Participants in the round-number condition intended to consume less ice cream (M=101.46, SD=75.38) than those in the precise-high condition (M=138.06, SD=80.88; $F_{(1, 197)}$= 5.07, p= .025, η^2= .03) and those in the precise-low condition (M=128.36, SD= 73.68; $F_{(1, 197)}$=5.33, p= .022, η^2= .03). Participants in the two precise-number conditions, however, did not differ in terms of their intended consumption level (F < .01, p = .966).

In addition, calorie presentation format did not affect the healthiness perception of the ice cream (p= .163), nor the perceived calorie level of the ice cream (p= .431).

In summary, Study 1A and Study 1B provide convergent evidence that a round-number presentation of caloric information (as opposed to precise presentation) decreased consumption intention. However, the lack of between-condition difference in perceived unhealthiness and perceived calorie level of the ice cream suggests that the effect was not caused by the amplification of these judgments. It is possible that they may not be the primary consideration when consumers process calorie information on nutrition labels.

Study 2

Study 2 was designed to replicate the findings of Study 1 with real consumption behavior. In addition, we continued to examine the underlying mechanism of the effect by measuring participants' risk perception and guilt associated with eating unhealthy foods.

Method

Students from a large university (N=124, 51.6% female, M_{age}=21.34, SD=2.01) participated in the lab study and were randomly assigned to two conditions (round vs. precise). As a cover story, participants were asked to taste a brand of newly launched potato chips and provided their evaluations. Each participant was provided a cup of water to rinse their mouth, a plate containing 20 original flavored potato chips, and a food label that presented the calorie information either as a round (2000 KJ/100g) or precise (2021KJ/100g) number. Participants were given five minutes to taste the chips and fill out a short questionnaire measuring their food evaluations (e.g., taste, saltiness, crispiness). After the food-tasting task, all participants returned the questionnaire and any leftover food to the experimenter and answered some additional questions.

Specifically, participants' risk perceptions were assessed ("Will eating chips on a regular basis increase the risk of weight gain?" and "Will eating chips on a regular basis increase the risk of long-term health problems?" 1= *not at all*, 7= *definitely*). The two measures were highly correlated and were combined for later analyses (r = .77). Participants were also asked, "How guilty do you feel to eat the chips in today's study?" (1= *not at all guilty*, 7= *extremely guilty*). After the participant left the lab, the experimenter counted each participant's leftover potato chip pieces and recorded their consumption amount to the nearest half chip.

Results and Discussion

Replicating the findings of Studies 1A and 1B, we found an effect of calorie information roundness ($F_{(1, 121)}$=5.03, p= .027, η^2= .04). Participants ate significantly fewer chips when the calorie information was presented in a round number (M=5.33, SD=3.53) than a precise number (M=7.2, SD=4.73).

In addition, there was no difference in self-reported guilt associated with eating chips (p = .332). Nonetheless, analysis on risk perception revealed an effect of calorie presentation condition ($F_{(1, 122)}$= 10.06, p= .002, η^2= .08). Specifically, compared to presenting the potato chip's calorie content in a precise number (M=4.30, SD=1.46), participants perceived greater health-related risks when the calorie content was presented in a round number (M=5.14, SD=1.49).

We also conducted a mediation analysis following the PROCESS macro (calorie presentation format à risk perception à consumption volume; model 4, Hayes, 2018). The effect of calorie presentation on risk perception was significant (b=.65, SE= .17, t= 3.76, p = .001, 95% CI= [.31, 1.00]), so was the effect of risk perception on food consumption (b= -.31, SE= .10, t=-3.18, p =.001, 95% CI= [-.50, -.12]). Participants' subjective judgment of risk factor fully mediated the effect of calorie presentation on food consumption (b= -.20, SE= .08, p = .017, 95% CI= [-.41, -.08]).

In summary, Study 2 replicated the findings of Study 1 with consumers' actual consumption behavior. In addition, Study 2 found that it was the risk judgment associated with consuming unhealthy food that was magnified when calorie information was presented as a round (vs. precise) number, and subsequently decreased consumption volume.

STUDY 3

Thus far, our findings are consistent with the conceptualization that processing fluency increases attention paid to calorie information, which allows consumers to form a more negative interpretation of the information, and subsequently decreases consumption intention. If this is the case, then the effect should be prominent among those who do not habitually pay attention to food calorie information, but attenuated when consumers' default attention to food calorie information is high. We tested this hypothesis in Study 3.

Method

Participants (N=211, 49.3% Female, M_{age}= 30.01, SD= 7.23) were randomly assigned to two conditions (calorie presentation: round vs. precise). We also measured participants'' default attention paid to food calorie information and treated as an individual difference moderator.

Participants were presented the front package view of a fictitious brand of potato chips with calorie information presented either as a round (800 KJ) or precise number (813KJ). Next, they indicated the amount of potato chips they felt like to eat (0 ~ 70 grams). Then, participants' default attention levels were measured with three questions, "How often do you check calorie information when choosing food items?" (1= *never*, 7= *always*); "How sensitive are you to calorie information when choosing food items?" (1= *not at all sensitive*, 7= *extremely sensitive*); "To what extent do you base your snack purchase decision on the calorie information?" (1= *not at all*, 7= *totally*). These three measures were combined for later analyses considering the high correlation among them (r = .93).

Results and Discussion

A bootstrapping method with PROCESS macro (Model 1, Hayes 2013) was conducted with food consumption as DV, calorie presentation format (0=precise, 1=round) and attention to calorie

information as the IV. Results showed a significant main effect of caloric number roundness on food consumption (b=-6.82, SE=3.01, t=-2.26, p= .025, 95% CI= [-12.75, - .88]) such that participants indicated that they would eat fewer potato chips when the calorie information was presented as a round than precise number. In addition, there was a significant interaction between calorie number roundness and default attention level (b=4.75, SE=1.80, t=2.63, p= .009, 95% CI= [1.19, 8.31]). For participants whose default attention level to food calorie information was low (b=-14.95, SE=4.42, t=-3.38, p= .001, 95% CI= [-23.66, -6.23]) or median (b=-6.82, SE=3.01, t=-2.26, p= .025, 95% CI= [-12.75, - .88]), presenting the calorie number in round (vs. precise) number decreased their consumption intention. However, for participants whose default attention level to calorie information was already high, presenting calorie information as a round or precise number did not cause any difference in consumption intention (b=-1.32, SE=4.21, t=.31, p= .754, 95% CI= [-6.97, 9.61]).

In summary, Study 3 provides strong support to our theory and suggest that the effect is primarily driven by consumers who are habitually inattentive to food calorie information.

General Discussion

In recent years, considerable attention has been paid to the efficient presentation of nutrition information on food packages. For example, research has suggested presenting nutrition labels on front (vs. back) packages (Van Kleef et al. 2008), and informing consumers of the duration of exercises needed to burn out the calories (Dowray et al. 2013; Kim et al. 2018). The current research shows that simply presenting calorie information in round (vs. precise) numbers can nudge consumers to reduce their unhealthy food consumption, especially for those who do not habitually pay attention to calorie information on food packages.

Our studies also show that the calorie roundedness effect is triggered by greater processing fluency associated with round (vs. precise) calorie numbers, which in turn magnifies perceived health risks of unhealthy foods, and subsequently reduces consumers' consumption intention and actual consumption volume.

REFERENCES

Albrecht, Sabine and Claus-Christian Carbon (2014), "The Fluency Amplification Model: Fluent Stimuli Show More Intense but Not Evidently More Positive Evaluations," *Acta Psychologica,* 148, 195-203.

Carbon, Claus-Christian and Sabine Albrecht (2016), "The Fluency Amplification Model Supports the Gane Principle of Arousal Enhancement," *The Behavioral and Brain Sciences,* 39, e204.

Dehaene, Stanislas and Jacques Mehler (1992), "Cross-Linguistic Regularities in the Frequency of Number Words," *Cognition,* 43 (1), 1-29.

Dowray, Sunaina, Jonas J. Swartz, Danielle Braxton and Anthony J. Viera (2013), "Potential Effect of Physical Activity Based Menu Labels on the Calorie Content of Selected Fast Food Meals," *Appetite,* 62, 173-81.

Fassbender, Catherine, Sebastien Houde, Shayla Silver-Balbus, Kacey Ballard, Bokyung Kim, Kyle J. Rutledge, J. Faye Dixon, Ana-Maria Iosif, Julie B. Schweitzer and Samuel M. Mcclure (2014), "The Decimal Effect: Behavioral and Neural Bases for a Novel Influence on Intertemporal Choice in Healthy Individuals and in Adhd," *Journal of Cognitive Neuroscience,* 26 (11), 2455-468.

Garg, Nitika, Brian Wansink and J. Jeffrey Inman (2007), "The Influence of Incidental Affect on Consumers' Food Intake," *Journal of Marketing,* 71 (1), 194-206.

Hayes, Andrew F. (2013), *Introduction to Mediation, Moderation, and Conditional Process Analysis: A Regression-Based Approach,* New York, NY, US: Guilford Press.

_____ (2018), *Introduction to Mediation, Moderation, and Conditional Process Analysis: A Regression-Based Approach,* 2nd ed. New York, NY, US: Guilford Press.

Jacoby, Larry L. and Mark Dallas (1981), "On the Relationship between Autobiographical Memory and Perceptual Learning," *Journal of Experimental Psychology: General,* 110 (3), 306-40.

Jacoby, Larry L., Colleen M. Kelley and Jane Dywan (1989), "Memory Attributions," in *Varieties of Memory and Consciousness: Essays in Honour of Endel Tulving,* ed. H. L. Roediger III and F. I. M. Craik, Hillsdale, NJ, US: Lawrence Erlbaum Associates, Inc., 391-422.

Kettle, Keri and Gerald Häubl (2010), "Numeric Fluency and Preference," in *Na - Advances in Consumer Research,* Vol. 37, ed. M. C. Campbell, J. Inman and D. Rik Pieters, MN: Association for Consumer Research, 150-52.

Kim, Eojina, Liang Tang, Chase Meusel and Manjul Gupta (2018), "Optimization of Menu-Labeling Formats to Drive Healthy Dining: An Eye Tracking Study," *International Journal of Hospitality Management,* 70, 37-48.

King, Dan and Chris Janiszewski (2011), "The Sources and Consequences of the Fluent Processing of Numbers," *Journal of Marketing Research,* 48 (2), 327-41.

Kivetz, Ran and Itamar Simonson (2002), "Self-Control for the Righteous: Toward a Theory of Precommitment to Indulgence," *Journal of Consumer Research,* 29 (2), 199-217.

Pena-Marin, Jorge and Rajesh Bhargave (2016), "Lasting Performance: Round Numbers Activate Associations of Stability and Increase Perceived Length of Product Benefits," *Journal of Consumer Psychology,* 26 (3), 410-16.

Read, Daniel, George Loewenstein and Shobana Kalyanaraman (1999), "Mixing Virtue and Vice: Combining the Immediacy Effect and the Diversification Heuristic," *Journal of Behavioral Decision Making,* 12 (4), 257-73.

Schwarz, Norbert (2004), "Metacognitive Experiences in Consumer Judgment and Decision Making," *Journal of Consumer Psychology,* 14 (4), 332-48.

Tangari, Andrea Heintz, My Bui, Kelly L. Haws and Peggy J. Liu (2019), "That's Not So Bad, I'll Eat More! Backfire Effects of Calories-Per-Serving Information on Snack Consumption," *Journal of Marketing,* 83 (1), 133-50.

Thomas, Manoj, Daniel H. Simon and Vrinda Kadiyali (2010), "The Price Precision Effect: Evidence from Laboratory and Market Data," *Marketing Science,* 29 (1), 175-90.

Van Kleef, Ellen, Hans Van Trijp, Frederic Paeps and Laura Fernández-Celemín (2008), "Consumer Preferences for Front-of-Pack Calories Labelling," *Public Health Nutrition,* 11 (2), 203-13.

Wadhwa, Monica and Kuangjie Zhang (2014), "This Number Just Feels Right: The Impact of Roundedness of Price Numbers on Product Evaluations," *Journal of Consumer Research,* 41 (5), 1172-185.

_____ (2019), "When Numbers Make You Feel: Impact of Round Versus Precise Numbers on Preventive Health Behaviors," *Organizational Behavior and Human Decision Processes,* 150, 101-11.

Wertenbroch, Klaus (1998), "Consumption Self-Control by Rationing Purchase Quantities of Virtue and Vice," *Marketing Science,* 17 (4), 317-37.

Winkielman, P. and J. T. Cacioppo (2001), "Mind at Ease Puts a Smile on the Face: Psychophysiological Evidence That Processing Facilitation Elicits Positive Affect," *Journal of Personality and Social Psychology,* 81 (6), 989-1000.

Winkielman, Piotr, Norbert Schwarz, Tedra A. Fazendeiro and Rolf Reber. (2003), "The Hedonic Marking of Processing Fluency: Implications for Evaluative Judgment," in *The Psychology of Evaluation: Affective Processes in Cognition and Emotion*, ed. J. Musch and K. C. Klauer, Mahwah, NJ, US: Lawrence Erlbaum Associates Publishers, 189–217.

Witherspoon, Dawn and Lorraine G. Allan (1985), "The Effect of a Prior Presentation on Temporal Judgments in a Perceptual Identification Task," *Memory & Cognition,* 13 (2), 101-11.

Digital Nudging to Reduce Screen Time Consumption

Laura Zimmermann, IE University, Spain
Michael Sobolev, Cornell University, USA

EXTENDED ABSTRACT

Mobile phones are our constant companions and an integral part of our daily lives. Despite the huge advantages of mobile devices, research has started to uncover negative effects on behavior, including performance (Felisoni & Godoi, 2018; Lanaj, Johnson, & Barnes, 2014), emotional health (Lee, Chang, Lin, & Cheng, 2014), sleep patterns (Thomée, Härenstam, & Hagberg, 2011) as well as cognitive capacity (Ward, Duke, Gneezy, & Bos, 2017). A significant proportion of people want to reduce their screen time, yet they are not able to achieve the goal. As a solution, both Apple and Google released time management applications with the goal of helping consumers understand and change their mobile phone habits.

Despite recent controversies regarding the correlational nature of studies investigating screen time consumption, there is a lack of systematic experimentation of interventions to reduce screen. Although a plethora of possible solutions are suggested in the popular press to reduce screen time, almost none have been examined in a randomized fashion. One approach to help consumers lower their screen time is altering the choice architecture by manipulating existing features on mobile devices, for example, by incorporating frictions in the usage process which disrupt habitual, automatic behavior and stimulate a more mindful interaction with the phone (Cox, Gould, Cecchinato, Iacovides, & Renfree, 2016). Such digital nudges do not eliminate consumers' freedom of choice to use their phone (as opposed to blocking applications) but nevertheless lead individuals in a particular direction (Okeke, Sobolev, Dell, & Estrin, 2018; Thaler & Sunstein, 2009).

This research addresses the question of whether screen time tracking apps effectively educate consumers about their digital behavior on mobile, and whether this leads to a reduction of screen time (study 1: longitudinal field study). Second, we investigate consumers' attitudes towards app designs varying in terms of their coerciveness (study 2: experimental survey). Third, we study digital nudges that alter the choice architecture as a method to reduce screen time consumption (study 3: longitudinal randomized trial). Finally, we examine to what extent reducing objectively measured smartphone usage is linked to wellbeing and academic performance.

Study 1 investigated the effect of mobile phone screen time tracking apps on users' self-awareness, their actual time spent on mobile, and long-term consequences for grade point average (GPA). Participating students (N=246) completed two screen time estimation surveys before and after (T1 & T2) a mobile phone tracking project which was part of a university workshop. Students downloaded a tracking app and submitted screenshots of their usage indicators. At T1, before the tracking project, estimated screen time was not correlated with actual screen time (r=.018, p=.783). At T2, after tracking, participants' estimates of mobile screen time were highly correlated with their actual screen time (r=0.691, p<.001). Longer tracking durations led to better calibration (β=1.63, SE=.46, t=3.55, p<.001). However, this did not lead to a reduction of overall screen time. In fact, the findings suggest the opposite (β=1.56, CI [-.22, 3.35], t=1.71, p=.087), an increase in screen time. Higher mobile phone screen time was linked to lower GPA (β=-0.0004, SE=0.0002, p=.031).

Study 2 investigated consumers' attitudes towards app design idea varying in terms of coerciveness (Thaler & Sunstein, 2009). We hypothesized that consumers evaluate app designs, which limit free-dom of choice directly or nudge consumers to reduce screen time *less favorably* than apps, which only provide information. We investigated consumer perceptions of three app design ideas (within-subjects: tracking vs. blocking vs. greyscale) in terms of overall preference, knowledge efficacy and reduction efficacy (scales from 0-100). Participants (N=139; Prolific Academic) evaluated three app design ideas with the goal of helping consumers spend less unproductive time on their phones. Within-subjects ANOVA showed that participants had a clear preference for the purely informational tracking app (F(2, 276)=15.74, p<.001), and thought it was most effective in increasing self-awareness (F(2, 276)=50.98, p<.001). However, in terms of reduction efficacy, the blocking app was perceived as most effective (F(2, 276)=18.55, p<.001).

Study 3 employs systematic experimentation of interventions to reduce screen time as well as potential consequences for GPA and wellbeing. We conducted an RCT with three conditions among a student population (N=112) over three weeks and altered the choice architecture of mobile consumption by manipulating existing mobile features to help consumers lower their screen time. In the control condition subjects simply tracked their screen time with the help of an app. Additionally, we examined two commonly proposed digital nudges varying along a spectrum of coerciveness: (1) greyscale: altering the color of the screen, and (2) self-commitment: setting goals to limit time spent on addictive apps. Objectively measured screen time was obtained through screenshots.

As hypothesized, simply tracking phone usage had no effect on screen time (M=283 min). However, the greyscale (M=233 min) and, to a lesser extent, self-commitment (M=268 min) digital nudges led to significant reduction in daily screen time (F(2,109)=3.21, p=.044). Subjects in the greyscale condition reported lower enjoyment of social media activities during the intervention (F(2,131)=3.35, p=.038), suggesting a process mechanisms through which greyscale is effective.

While our intervention was effective in reducing screen time, it did not have any immediate causal effects on sleep quality, happiness and stress level (all ps=ns). We also found no difference for GPA (F(2,109)=0.15, p=.858). Nevertheless, average daily screen time was correlated with GPA (r=-0.263, p<.0.001).

Our findings offer insights for consumer researchers and practitioners interested in curbing mobile phone overload. By showing that screen time is linked to GPA we add to the growing literature on consequences of mobile phone overuse. This research further contributes to the 'quantified self' literature (Lupton, 2016) by showing that the quantification of mobile phone usage with the help of tracking app has benefits for self-awareness, but no impact on behavior change. Finally, we add to the literature on digital nudges, by showing that greyscale mode can be a viable technique to reduce mobile use. Taken together, our research advances knowledge about effective solutions to curb digital overload and potential consequences of screen time reduction.

REFERENCES

Cox, A. L., Gould, S. J. J., Cecchinato, M. E., Iacovides, I., & Renfree, I. (2016). *Design frictions for mindful interactions: The case for microboundaries*. In Proceedings of the 2016 CHI Conference Extended Abstracts on Human Factors in Computing Systems.

Felisoni, D. D., & Godoi, A. S. (2018). Cell phone usage and academic performance: An experiment. *Computers & Education, 117*, 175-187.

Lanaj, K., Johnson, R. E., & Barnes, C. M. (2014). Beginning the workday yet already depleted? Consequences of late-night smartphone use and sleep. *Organizational Behavior and Human Decision Processes, 124*(1), 11-23.

Lee, Y.-K., Chang, C.-T., Lin, Y., & Cheng, Z.-H. (2014). The dark side of smartphone usage: Psychological traits, compulsive behavior and technostress. *Computers in human behavior, 31*, 373-383.

Lupton, D. (2016). *The quantified self*: John Wiley & Sons.

Okeke, F., Sobolev, M., Dell, N., & Estrin, D. (2018, September) *Good vibrations: can a digital nudge reduce digital overload?*. In Proceedings of the 20th international conference on human-computer interaction with mobile devices and services.

Thaler, R. H., & Sunstein, C. R. (2009). *Nudge: Improving decisions about health, wealth, and happiness*: Penguin.

Thomée, S., Härenstam, A., & Hagberg, M. (2011). Mobile phone use and stress, sleep disturbances, and symptoms of depression among young adults-a prospective cohort study. *BMC public health, 11*(1), 66.

Ward, A. F., Duke, K., Gneezy, A., & Bos, M. W. (2017). Brain drain: The mere presence of one's own smartphone reduces available cognitive capacity. *Journal of the Association for Consumer Research, 2*(2), 140-154.

Engagement with Virtue and Vice Information Through the Day

Ozum Zor, Rutgers University, USA
Kihyun Hannah Kim, Rutgers University, USA
Ashwani Monga, Rutgers University, USA

EXTENDED ABSTRACT

A growing number of consumers access information using social media platforms, such as Twitter. These platforms have become the dominant locations to engage with new information. Consumers spend more than two hours per day on social media (Bayindir and Kavanagh 2018). Users mostly engaged with frivolous information in the early days of social media, but it is now a source of news for 68% of U.S. adults (Matsa and Shearer 2018). Thus, it is critical to understand how different types of information are driving engagement. We specifically focus on vice (i.e., tempting, but with few later benefits) versus virtue information (i.e., not tempting, but offering later benefits).

We draw from research on self-control. Similar to muscles weakening after physical exertion, self-control weakens after subsequent efforts (Muraven and Baumeister 2000). Individuals are faced with multiple self-control challenges through the day, as they try to avoid tempting activities and foods. Such behavior is depleting (Vohs et al. 2008), weakening self-control as the day progresses. For instance, individuals are more likely to disregard professionalism rules or engage in unethical behavior later in the day (Dai et al. 2015; Kouchaki and Smith 2014). What is not yet understood is how self-control depletion may manifest for online information engagement. One exception is Hofmann et al.'s (2012) examination of a broad set of activities, including TV watching and web surfing. They observed an increased desire to engage in several media activities in the evening hours. Will such a pattern emerge similarly for engagement with online information, specifically, tweets on Twitter? We argue that the outcome will depend on what the tweet is about. That is, the type of information will matter.

Specifically, we discover an asymmetry in the engagement with vice versus virtue information. A relative vice offers immediate pleasure at the moment of consumption but may have negative consequences later on; in contrast, consumption of a relative virtue may not be pleasurable at the moment but provides benefits in the long-term (Khan and Dhar 2007; Khan, Dhar, and Wertenbroch 2005; Siddiqui, May, and Monga 2017). While a bulk of the vice-virtue research has been conducted on foods, this distinction can apply equally to information content. Thus, a salacious gossip in the *Cosmopolitan* could be considered vice information by many who are tickled by the instantaneous pleasure of reading the article but know that there is no long-term benefit from it. However, an article on financial markets in *Forbes* could be considered virtue information by many who find it hard to understand but appreciate the long-term benefit of becoming more knowledgeable on the topic. We argue that the self-control depletion arising at the end of the day is likely to reduce the resources needed to process the *Forbes* article, but makes one more likely to succumb to the immediate gratification from reading the *Cosmopolitan* article. Thus, we expect that as the day wears on, consumers will engage more with vice content and less with virtue content.

We observe such a pattern across six studies—four experiments and two studies using large-scale Twitter datasets. In study 1, we find initial evidence of engagement shifting away from virtue and toward vice as morning turns to evening. Studies 2 and 3 replicate this result with student participants in a lab setting, where we simply measure the time at which participants complete the survey considering vice versus virtue magazines and websites. Study 4 also shows the same vice-virtue asymmetry for tweets from CNN when we randomly assign participants to morning and evening time periods. We observe the same asymmetry in study 5 where we measure actual engagement of Twitter users with several magazines through likes (Study 5A) and followers (Study 5B). Finally, in study 6, we measure actual engagement through likes by using vice versus virtue information from the Twitter account of a newspaper. In addition, we observed that this asymmetry becomes stronger when day temperatures are higher, providing evidence for depletion as the underlying reason.

Our results add to the findings from social media research. To our knowledge, we are the first to demonstrate asymmetric engagement with vice versus virtue content throughout the day on social media. By examining vice versus virtue content online, we also contribute to research on self-control. We believe that our study is the first to show depletion effects using large-scale social media datasets.

The current research has implications for consumers and practitioners. Our findings can help consumers, and public policy makers understand how the time of day changes sensitivity to different kinds of information. On the flip side, our results are helpful for companies trying to decide when to release which type of information to best capture consumers' attention.

REFERENCES

Bayindir, Nisa and Duncan Kavanagh (2018), "The Latest Social Media Trends to Know in 2019," https://www.globalwebindex.com/reports/social.

Dai, Hengchen, Katherine L. Milkman, David A. Hofmann, and Bradley R. Staats (2015), "The Impact of Time at Work and Time Off From Work on Rule Compliance: The Case of Hand Hygiene in Health Care," *Journal of Applied Psychology*, 100 (3), 846–62.

Hofmann, Wilhelm, Kathleen D. Vohs, and Roy F. Baumeister (2012), "What People Desire, Feel Conflicted About, and Try to Resist in Everyday Life," *Psychological Science*, 23 (6), 582–8.

Khan, Uzma and Ravi Dhar (2007), "Where There Is a Way, Is There a Will? The Effect of Future Choices on Self-Control," *Journal of Experimental Psychology: General*, 136 (2), 277–88.

Khan, Uzma, Ravi Dhar, and Klaus Wertenbroch (2005), "A Behavioral Decision Theory Perspective on Hedonic and Utilitarian Choice," in *Inside Consumption: Frontiers of Research on Consumer Motives, Goals, and Desires*, ed. S. Ratneshwar and David Glen Mick, London: Routledge, 144–65.

Kouchaki, Maryam and Isaac H. Smith (2014), "The Morning Morality Effect: The Influence of Time of Day on Unethical Behavior," *Psychological Science*, 25 (1), 95–102.

Matsa, Katerina Eva and Elisa Shearer (2018), "News Use Across Social Media Platforms 2018," http://www.journalism.org/2018/09/10/news-use-across-social-media-platforms-2018/.

Muraven, Mark and Roy F. Baumeister (2000), "Self Regulation and Depletion of Limited Resources: Does Self Control Resemble a Muscle?" *Psychological Bulletin*, 126 (2), 247–59.

Siddiqui, Rafay A., Frank May, and Ashwani Monga (2017), "Time Window as a Self-Control Denominator: Shorter Windows Shift Preference toward Virtues and Longer Windows toward Vices," *Journal of Consumer Research*, 43 (6), 932–49.

Vohs, Kathleen D., Roy F. Baumeister, Brandon J. Schmeichel, Jean M. Twenge, Noelle M. Nelson, and Dianne M. Tice (2008), "Making Choices Impairs Subsequent Self-Control: A Limited-Resource Account of Decision Making, Self-Regulation, and Active Initiative," *Journal of Personality and Social Psychology*, 94 (5), 883–98.

Special Sessions

Digitized Big Data and Machine Learning Approaches To Consumer Behavior
Chair: Ada Aka, University of Pennsylvania, USA

Paper #1: Computational Consumer Segmentation and Brand Management: Leveraging Social Media, Digitized Language Data, and Machine-Learning to Identify Consumer Personality Segments, Facets of Brand Image, and Predictors of Brand Liking

Ada Aka, University of Pennsylvania, USA
Christopher Olivola, Carnegie Mellon University, USA
Sudeep Bhatia, University of Pennsylvania, USA
Gideon Nave, University of Pennsylvania, USA

Paper #2: We Are What We Watch: Movies Contents Predicts The Personality Of Their Social Media Fans

Gideon Nave, University of Pennsylvania, USA
Jason Rentfrow, Cambridge University, UK
Sudeep Bhatia, University of Pennsylvania, USA

Paper #3: Spending Reflects Not Only Who We Are But Also Who We Are Around: The Joint Effects of Individual and Geographic Personality on Spending

Goetz Friedrich, Cambridge University, UK
Ebert Tobias, Mannheim University, Germany
Mueller Sandrine, Columbia University, USA
Gladstone Joe, University College London, UK
Sandra Matz, Columbia University, USA

Paper #4: The Role of Vocal Tone in Online Persuasion: A Crowdfunding Enquiry

Xin (Shane) Wang, Western University, Canada
Shijie Lu, University of Houston USA
Xi Li, City University of Hong Kong, Hong Kong, China
Mansur Khamitov, Nanyang Technological University, Singapore
Neil Bendle, Western University, Canada

SESSION OVERVIEW

In today's world, consumers leave unprecedented amounts of digitized footprints every day when they use social media platforms, review a movie on IMDb, make purchases using their credit cards, or decide to help fund a new project on Kickstarter. The availability of digitized 'Big Data' and the recent advances in data science created numerous novel opportunities to ask many consumer-related questions. Our session concentrates on multiple different kinds of digitized 'Big Data' and applies cutting-edge machine learning techniques to gain insights about various aspects of consumer cognition and behavior.

Aka, Olivola, Bhatia, and Nave shed light on the relationship between consumer personality and brand liking as revealed in large online datasets. Using machine learning models trained on large-scale digitized language data and Facebook 'likes' data, they predict consumer personality profiles for brands above and beyond demographic variables, or other objective and subjective brand characteristics. They show how these 'black box' models can be interpreted in terms of the images associated with brands liked by particular consumer personality segments. Finally, they also demonstrate self-congruity effects in consumer liking of brands.

Nave, Rentfrow, and Bhatia combine data from Facebook and IMDb to investigate associations between movie characteristics and consumer personalities. They find that key features of movies' plots predict the personality profiles of consumers who are fans of those movies, above-and-beyond demographic variables, movie genre, and movie metadata. Their findings thus reveal robust links between personality and movie preferences, with implications for media marketing recommendation systems.

Goetz, Ebert, Mueller, Gladstone, and Matz examine how the personality of consumers' social context (i.e. the personality of those around them) shape their spending decisions above and beyond their own individual traits. Using spending records of 111,336 participants across 374 Local Authority Districts (LAD), she finds a congruency between geographic regions' aggregate scores on a given personality trait and the collective spending on categories associated with that trait. Furthermore, individual-level analyses demonstrate that regional personality of a participant's home LAD predicts individual spending above and beyond individual personality.

Wang, Lu, Li, Khamitov, and Bendle investigate the relationship between vocal tones of persuaders and online persuasion using Kickstarter videos. Applying a novel audio mining technology, they find that concentration, lack of stress, and stable emotions influence funding success. Next, they conduct a controlled experiment to show how greater signs of stress or extreme emotion hurt while greater signs of concentration help persuasion success. Lastly, they identify perceptions of competence as a mediator in this relationship between vocal tones and persuasion success.

Altogether, the papers presented in this session demonstrate how novel machine learning approaches applied to digitized big data can provide important new insights to consumer behavior. More specifically, each of the papers use a unique digitized data platform and apply varying novel quantitative techniques to answer consumer-relevant research questions. This session will appeal to a broad audience who are interested in learning about novel approaches to studying consumer behavior, and will also be relevant to all researchers as well as practitioners interested in consumer personality, cognition, and decision-making.

Computational Consumer Segmentation and Brand Management

EXTENDED ABSTRACT

The emergence of social media has fundamentally changed the way consumers interact with brands and, as a result, how brands are managed (e.g., Appel et al. 2020; Batra and Keller 2016). For example, every day, millions of social media users (e.g., on Facebook, Instagram, and Twitter) express their attitudes towards branded content through 'likes' (De Vries et al. 2012; John et al. 2017). These indicators are often viewable to their friends, family, colleagues, and acquaintances, and are available to brand managers in real-time. As a consequence, firms can efficiently monitor the favorability of their brands and how this favorability evolves over time. In this paper, we use several recently assembled datasets drawn from social media and news media. We analyze these data using techniques from machine learning, to study how consumer psychographic characteristics (their

personality) relate to brand image and brand liking. In particular, we analyze a unique dataset of Facebook users who rated their (own) personality characteristics and examine the relationships between different brands and the personality of social media users who "liked" those brands. This allows us to determine how personality traits are associated with brand liking. We go further by utilizing a word embeddings model built using large scale language data (Mikolov et al. 2013; see reviews in Bhatia et al. 2019) and an established semantic dictionary (the LIWC) (Pennebaker and Graybeal 2001; Pennebaker et al. 2003) to predict consumer personality and to identify the main concepts and themes that each brand is associated with, in the mind of consumers. This, in turn, allows us to analyze the relationships between consumer characteristics and brand liking, for hundreds of brands, both within and across different product categories. We present three studies. The goal of Study 1 was to evaluate our machine learning approach for predicting consumer personality. Specifically, we tested how well we could predict the average personality profiles of Facebook users who 'liked' different brands. We call this 5-dimensional personality profile "Brand Consumer Personality Profile" (BCPP). We used high-dimensional embedding representations for those brands (i.e., brand embeddings), derived from large-scale natural language data. The brand embeddings served as predictor variables in five Ridge regression models (one for each personality dimension) that attempted to predict (out-of-sample) the BCPPs of the brands. Due to the flexibility inherent in machine learning modeling, we evaluated all our models in terms of their out-of-sample predictive power—i.e., their ability to predict Facebook user personalities for novel brands, not previously shown to the model. The results of this analysis plots observed vs. predicted BCPPs for each brand and for the five personality dimensions. Our approach achieves high accuracy rates, with an average out-of-sample correlation of 0.62 across the five personality dimensions. To evaluate our approach against other established methods, we tested competitor models that used various quantified brand characteristics (e.g., brand age, brand personality trait ratings) as predictor variables (Lovett et al. 2014). Additional analyses of the robustness of our approach involved models based on user demographics and brand categories. Our results showed that these methods predict BCPPs above-and-beyond brand category information, consumer demographics, and brand-level characteristics (including both In Study 2, we sought to examine and interpret the information contained in brand embeddings that gives rise to these successful predictions. Embedding vectors quantify the extent to which words and concepts are associated with each other in language, and thus by extension, in the minds of consumers. In this way, embedding vectors provide an approach to measuring brand associations and images automatically from natural language data. By studying the words and concepts that make up these images, we can try to characterize the variability in BCPPs across different brands, and understand how this variability relates to brand images. That is, we can "dig into" our brand embeddings data in order to determine which attributes, traits, concepts, and constructs are most associated with brands that are 'liked' by consumers who are high (vs. low) on a particular personality dimension.

We identified a number of distinct associations between psychological constructs and BCPPs. For example, the BCPP for Openness correlated with brand construct associations (BCA) and brand word associations for experiences, creativity and art (in other words, brands whose consumers were higher in Openness were closer in the word embedding space to words and constructs related to experiences, creativity and art). Likewise, Agreeableness correlated with pro-sociality and Extraversion with apparel and parties. While not all of the associations we identified have simple explanations, many

of them were consistent with the notion that consumers 'like' brands that reflect their personality. We test this conjecture more formally in the next study.

In Study 3, we carried out a similar analysis, but with personality words instead of the LIWC constructs, in order to directly examine whether brand personality dimensions relate to consumer personality traits. Doing so allows us to evaluate the extent to which consumers tend to like brands that "fit" (i.e., are congruent with) their own personality traits. Our analyses using dimensions of human personality found evidence for congruity between BCAs and BCPPs for three of the Big Five dimensions: Openness, Agreeableness and Emotional Stability (thus, for example, brands strongly associated with Openness adjectives were also liked by individuals high in Openness).

In sum, this paper showcases, through three studies, the power and promise of combining big data and machine learning methods to examine three important topics in consumer research: consumer psychographic segmentation, brand image, and consumer-brand self-congruity. The capacity to accurately and inexpensively assess the BCPP of brands, using publicly available word embedding representations, not only has important practical managerial applications for marketing strategy, but also enhances our theoretical understanding.

We Are What We Watch: Movies Contents Predicts The Personality Of Their Social Media Fans

EXTENDED ABSTRACT

With the growing prevalence of on-demand video streaming services, the volume of personalized media consumption is rapidly increasing. Despite the ubiquity of personalized video consumption, and although understanding the psychological characteristics of media audiences is fundamental to many aspects of marketing, relatively little is known about the associations between movie preferences and individual differences in psychological traits. The current work addresses this gap in knowledge by systematically studying the personality profiles of movie fans.

Our analysis uses data collected via *myPersonality*, a Facebook app through which roughly 3.5 million users took personality questionnaires and consented to share their Facebook data with researchers. Using the myPersonality database, we created personality profiles for 854 movies, by averaging the Big Five personality scores of all users who "liked" these movies on Facebook (we included all of the movies in the myPersonality dataset that were liked by at least 250 people). Similarly, we estimated the fans' demographic profiles by calculating their average age, percentage of females, and the percentage of individuals who reported being in a relationship.

We obtained rich representations of movies from *IMDb* (www. imdb.com), an online database that contains information about over 5 million titles of movies and TV episodes . Each IMDb entry represents a title, and includes genre information (a total of 21 genres), and user-generated plot keywords that describe *"any notable object, concept, style or action that takes place during a title".* IMDb also includes additional information about the movies, such as box office income and critics ratings, to which we refer as "metadata".

Our primary objective was to test whether movies' characteristics (genre, metadata and content, as captured by plot keywords), contain information about the personality of their Facebook fans. To this end, we conducted "leave one out" cross validated predictions (Stone, 1978; Zhang, 1993) to predict the Big Five profiles associated with each movie, using different combinations of the following variables: (1) the movie keywords (2) the demographic profiles of the movies' fans; (3) the movies' IMDb metadata variables; (4) the movies' genre. Personality predictions for each movie were carried

out by fitting regularized linear regressions with the least absolute shrinkage and selection operator (LASSO (Tibshirani, 1996) to the data of all other movies, and recording the out-of-sample predictions under different model specifications. The results reported here were obtained using a LASSO with regularization parameter value of λ = 0.001. Similar results were obtained using different λ values. Predictive accuracy was calculated as the part of the variance in personality that could be explained by the independent variables.

Our results indicate that all of the Big Five traits could be predicted from the keywords (all p-values <0.001), and that the variance in fans personalities that was predicted by plot keywords was significantly greater than what could be explained by metadata and genre in all of the Big Five traits. Furthermore, adding plot keywords significantly improved the predictive accuracy incrementally above all of the other variables, for all of the Big Five traits.

Our findings provide marketers means for reaching audiences of specific personality profiles via cinema advertising (Phillips & Noble, 2007), branded entertainment (Hudson & Hudson, 2006) or product placement (Gupta & Lord, 1998). While personality has been shown to be indicative of consumer's attitudes and behavior (Arbuthnot, 1977; Matz, Kosinski, Nave, & Stillwell, 2017; Moon, 2002; Wheeler, Petty, & Bizer, 2005), its use in marketing has been limited due to the questionnaire-based nature of personality assessment. Although recent research has shown that personality can be approximated from individual's digital footprints (e.g., Facebook Likes, Instagram photos and Twitter language), marketers seldom have access to dataset that contain both individual-level digital footprints and personality measures. Our approach overcomes this barrier by allowing marketers to assess the personality profiles of movies' audiences based on the movies' attributes alone (as measured using plot keywords), and without having to collect data about individuals.

Our work also contributes to the literature of content recommendation and prediction of viewing behaviors. Typical individual-level recommendation systems (or prediction models) requires observing each consumer's past behavior (i.e., using panel data). However, such data may not be available in the particularly important application of making recommendations to new consumers. However, in some cases it is possible to approximate the personalities of new consumers (e.g., from their tweeter language), and provide them with personality-based recommendations.

Our study has several limitations, which provide a fertile ground for future investigations. First, while our findings suggest that part of the variance in movie preferences is linked to stable personality traits, movie preferences are likely also influenced by environmental context. For example, the movie industry is highly seasonal (Einav, 2007), and people were shown to prefer romantic movies when it is colder (Hong & Sun, 2012). Continuous investigation of how context variables affects dynamic aspects of movie preferences may benefit from studying interactions between context variables and personality.

A second limitation concerns our use of Facebook Likes is proxies for movie preferences. While Likes are active, ecologically valid expressions of preferences, they do not necessarily reflect what people de facto watch, and they might be affected by social and cultural factors that do not immediately reflect the content of movies, such as signalling and impression management. Our reliance on Facebook likes might also bias our study because specific types of people may be more disposed to sharing their Facebook data with the *MyPersonality* app, or to liking movie-related contents on Facebook. However, such selection bias would be expected, in general, to attenuate the associations we observed, because it would restrict the range of personalities that we observe and thus constrain the amount of

personality variance that could potentially be explained by the other factors (Sackett & Yang, 2000). We hope that the growing availability of video-streaming services (e.g., Netflix, Hulu, Amazon Prime) will facilitate the generation of datasets that would allow exploring the associations between personality and preferences for movies using actual watching behavior and with less selection bias.

Spending Reflects Not Only *Who We Are* But Also *Who We Are Around*: The Joint Effects of Individual and Geographic Personality on Spending

EXTENDED ABSTRACT

Research shows that people's personality traits play and important role in their spending decisions. Previous research has shown that people tend to spend money in a way that is aligned with their personality (Aaker, 1999, Govers & Schoormans, 2005; Matz, Gladstone, & Stillwell, 2016) and personal values (Hill & Howell, 2014). An extraverted person, for example, is more likely to spend money on social activities such as going to bars and restaurants, while an introverted person is more likely to spend money on books (Gladstone et al., 2019; Matz et al., 2016). This is because spending not only reflects functional need-fulfillment but also reflects who we are as individuals (self-congruity theory, Sirgy, 1985): We buy products not only for what they can do, but also for what they mean to us (Levy, 1959). Consistent with this idea, individuals high in extraversion, agreeableness and openness prefer to spend money on experiences (Howell, Pchelin, & Iyer, 2012; Mehmetoglu, 2012), whereas individuals low in agreeableness, conscientiousness and emotional stability prefer to spend money on possessions (Zhang, Howell, Caprariello, & Guevarra, 2014).

At the same time spending is also an inherently interpersonal, social behavior and--at least in part--performative. What people buy is not only guided by their own preferences, but also by cultural norms (de Mooij & Hofstede, 2002; Henry, 1967; Kacen & Lee, 2002), social expectations (Martineau, 1958; Mathews & Slocum, 1969; Rook & Fisher, 1995; van Kempen, 2004), status concerns (Brown, Bulte & Zhang, 2011; Martineau, 1958; Veblen, 1899), and people's social networks (Gärling, Kirchler, Lewis, & van Raaj, 2009; Sheth, 1967; Wang & Xiao, 2009). Spending can be used to satisfy social needs, such as reinforcing and expressing self-identity to others, and allowing one to differentiate oneself and to assert one's individuality (Ball & Tasaki, 1992; Belk, 1988; Fournier, 1998; Richins & Rudmin, 1994). Consequently, what people buy is not only determined by their own preferences, but also their socio-cultural context.

In this work, we integrate these separate research streams by investigating the extent to which the personality of consumers' social context (i.e. the personality of those around them) influence their spending decisions above-and-beyond their own individual traits. Specifically, we test the impact of individual and regional personality as drivers of spending behavior in two steps. First, we analyze spending records from 111,336 participants (over 31 million unique transactions) to test whether spending behaviors (i.e., what people spend their money on) are regionally clustered and whether these regional clusters of spending are reliably predicted by regionally aggregated personality traits (H1). This step is necessary as examining the relationship between regional personality and spending behavior is only meaningful if people in different areas actually spend money differently. Second, we analyze individual personality and spending of 1,716 participants, to test whether regionally aggregated personality predicts individual spending behavior above-and-beyond individual personality (H2).

Our findings show that personality-related spending is meaningfully clustered on the geographic level. The effects are strongest for the traits of extraversion and openness, for which we find strong geographical clusters of highly prototypical spending in and around Metropolitan London, while low (i.e., introverted and less open) spending clusters North of London, in the Southwest, Wales and the North of England. For agreeableness, we find significant hotspots of prototypical agreeable spending in the very Southwest of England, Southern Wales as well as in pockets of Northern England and Scotland, while low, disagreeable spending clusters in Metropolitan London and North of London. For conscientiousness, high prototypical spending clusters in the very South and North of England and the English Midlands, while low, unconscientious spending strongly cluster in Southern Wales and parts of Scotland. For neuroticism, high prototypical spending clusters in pockets of Scotland, Southern Wales and the English Midlands, while low, emotionally stable spending primarily clusters around London. Importantly, those spending clusters map onto clusters found for the regional personality of participant. We capture this relationship more objectively by calculating the zero- order correlations between the two variables on the aggregated LAD level ($N = 374$). We find a significant positive relationship for all Big Five personality traits. These correlations were medium-sized for openness ($r = .34$, $p < .001$), extraversion ($r = .47$, $p < .001$), agreeableness ($r = .33$, $p < .001$) and neuroticism ($r = .34$, $p < .001$) and small for conscientiousness ($r = .17$, $p < .01$).

To test whether regionally aggregated personality scores predict prototypical individual level spending above-and-beyond individual personality, we used a subset of 1,716 participants for which individual spending and personality information was available. Specifically, we employed multilevel analyses (individuals nested in 374 LADs) to regress prototypical individual level spending on individual personality, gender, age and total spending amount (level 1 predictors) and aggregated personality (level 2 predictor). We z-standardized all non-binary predictors (i.e., all except gender) and specified random intercepts and random slopes for individual personality.

As hypothesized, regional personality positively predicted prototypical spending above all individual level predictors for all Big Five traits. For conscientiousness ($\beta = .06$, $p < .01$) and neuroticism ($\beta = .06$, $p < .05$) effect sizes reached roughly one third of the effect size of individual personality. For openness ($\beta = .08$, $p < .001$) and agreeableness ($\beta = .10$, $p < .001$), the regional level effect approached half the size of the individual level effect. Finally, for extraversion, the regional level effect ($\beta = .17$, $p < .001$) even reached the same size as the individual level effect. In other words, prototypically extraverted spending to the same extent reflects the personality of the regional context as the personality of the individuals themselves. These results provide support for our second hypothesis that regionally aggregated personality scores predict individual spending on associated purchase categories above-and-beyond individual level personality for all of the Big Five personality traits.

Taken together, our findings empirically support the proposition that spending behavior is a reflection of personality traits as both a personal and environmental characteristic.

The Role of Vocal Tone in Online Persuasion: A Crowdfunding Enquiry

EXTENDED ABSTRACT

A major stream within consumer research involves understanding persuasion attempts and reactions to these (Campbell and Kirmani 2000; Friestad and Wright 1994; Petty and Cacioppo 1986). The profusion of online interactions provides additional observations to studying this important consumer-relevant phenomenon but also somewhat changes the process. Online those making persuasion attempts (who we will call persuaders) cannot be assessed through such things as handshakes and eye contact. Yet as technology progresses this gives access to more cues that allow for intuitive assessment (Nisbett and Wilson 1977) by those subject to a persuasion attempt (who we will call receivers). Receivers tend to use assessments beyond the message content (Hall 1980) to judge whether persuaders are worthy of their support. Since online videos allow receivers of a persuasion attempt to hear the vocal tones that the persuader uses, these vocal tones are likely to give cues that are used by the receivers to inform the persuasion attempt success.

Prior work has examined how certain vocal characteristics, such as speech rate, pitch, volume, and tone, can influence individuals' perceptions of speaker traits and character (Apple et al. 1979; Chattopadhyay et al. 2003; Cheng et al. 2016; Klofstad et al. 2012, 2015; Oleszkiewicz et al. 2017; Street et al. 1983; Signorello 2019; Tigue et al. 2012; Wiener and Chartrand 2014). A vast majority of this important work has been conducted in traditional, face-to-face contexts. This precludes understanding all the nuances and intricacies of the now prevalent online and digital persuasion attempts. Second, virtually all relevant prior research did not venture beyond assessing attitudes and behavioral intentions to systematically tap into real-world funding outcomes that are more relevant to ultimate persuasion success. Third, prior work has predominantly employed labor-intensive and/or semi-automated approaches to coding and interpreting vocal characteristics which limited scalability and researchers' ability to consider fine-grained detail. These benefits are now afforded by advanced machine learning techniques and computational methods.

We first used novel audio mining technology to investigate Kickstarter videos, looking for indications related to the receiver's assessment of the persuader's concentration, stress, and lack of extreme emotion. These indications were assessed for connections to successful persuasion, i.e. funding of the project. We collaborated with Nemesysco Ltd., an Israel based high-tech firm whose QA5 system (Nemesysco 2015) was commercially applied in call centers and sold as "the most sophisticated, flexible, cutting edge voice analysis technology available today" (Nemesysco 2016). The software not only allows analysis of many more audio files than could be achieved using human coders, it also uses standardized signal processing algorithms to extract and combine attributes from voices identifying, amongst other things, stress, cognitive processes, and emotional reactions. Taken together, the study showed a significant relationship between concentration, lack of stress, and lack of excessive emotionality on funding success.

Next, we conducted a controlled experiment to validate our findings from the secondary data and to extend them by investigating if perceptions of competence mediate the differential relationship between vocal tones and persuasion attempt success. We used a pretested "Coolest cooler brand" actual Kickstarter pitch recorded by a research assistant that was made to sound either concentrated, stressed, extremely emotional, or neutral (control). Overall, we found that a funding request was less likely to succeed when the voice of a persuader requesting funds in a pitch shows greater signs of stress or extreme emotion compared to a control. In contrast, a funding request was more likely to succeed when the voice of the requestor shows greater signs of concentration (vs. control). The findings of study 2 also support our theorizing regarding a focal mechanism. Specifically, we documented that a concentrated vocal tone (vs. control) generates greater perceptions of persuader competence, thus, leading to increased willingness to fund and improved brand

evaluations. Conversely, a stressed or extremely emotional vocal tone (vs. control) reduced perceived persuader competence, thereby lowering willingness to fund and brand evaluations. Lastly, study 2 also explored the possibility that given trust and processing fluency are central considerations in consumer decision-making in the marketplace (Chaudhuri and Holbrook 2001; Graf et al. 2018; Khamitov et al. 2019; Morgan and Hunt 1994; Reber et al. 1998; Winkielman and Cacioppo 2001), the resulting levels of trust or distrust in a persuader might have guided a particular peer-to-peer funding decision. Since vocal tone dimensions did not seem to foster different levels of processing fluency or persuader trust, the latter are unlikely to drive our findings.

Our findings offer insight to the persuasion literature, reinforcing that speaker characteristics matter (Crowley and Hoyer 1994; Eisend 2006; Rucker et al. 2014; Tormala and Petty 2004; Swartz 1984; Wilson and Sherrell 1993). Our enquiry documents that speaker characteristics in online persuasion attempts can not only be readily inferred from the voice heard but, more importantly, matter so much in first impressions as to exert influence on real world financial outcomes. In doing this our work speaks to persuasion in the online world which is an increasingly fruitful topic given the profusion of online interactions and how they provide additional opportunities to studying persuasion (Grewal and Stephen 2019; Kupor and Tormala 2018). In contrast to the work focused on offline persuasion environments, another key contribution of our research is to provide an early illustration that the effectiveness of online persuasion efforts can be computationally mined and captured at a much larger scale with more fine-grained detail using an automatic novel method. Here, we provide one of the pioneering accounts of how computers can precisely predict the general effectiveness of online persuasion attempts based on automatically extracted vocal tone characteristics and their interplay with the extent of video stimulation and brightness. In doing this we contribute by highlighting audio-mining's potential in academic consumer research (Hobson et al. 2012; Mayew and Venkatachalam 2012). We, using technology now available to marketers, have fascinating new methods of quantifying key elements of the human voice. Using these could benefit numerous academic fields with consumer research taking the lead.

REFERENCES

Appel, Gil, Lauren Grewal, Rhonda Hadi, and Andrew T. Stephen (2020), "The Future of Social Media in Marketing," *Journal of the Academy of Marketing Science*, 48 (1), 79–95.

Apple, William, Lynn A. Streeter, and Robert M. Krauss (1979), "Effects of Pitch and Speech Rate on Personal Attributions," *Journal of Personality and Social Psychology*, 37 (5), 715–27.

Arbuthnot, J. (1977). The roles of attitudinal and personality variables in the prediction of environmental behavior and knowledge. *Environment and Behavior*, 9(2), 217–232.

Batra, Rajeev, and Kevin L. Keller (2016), "Integrating Marketing Communications: New Findings, New Lessons, and New Ideas," *Journal of Marketing*, 80 (6), 122–45.

Bhatia, Sudeep, Russell Richie, and Wanling Zou (2019), "Distributed Semantic Representations for Modeling Human Judgment," *Current Opinion in Behavioral Sciences,* 2931–36.

Brand Affect to Brand Performance: The Role of Brand Loyalty," *Journal of Marketing*, 65 (2), 81–93.

Campbell, Margaret C. and Amna Kirmani (2000), "Consumers' Use of Persuasion Knowledge: The Effects of Accessibility and Cognitive Capacity on Perceptions of an Influence Agent," *Journal of Consumer Research*, 27 (1), 69–83.

Chattopadhyay, Amitava, Darren Dahl, Robin J. B. Ritchie, and Kimary N. Shahin (2003), "Hearing Voices: The Impact of Announcer Speech Characteristics on Consumer Response to Broadcast Advertising," *Journal of Consumer Psychology*, 13 (3), 198–204.

Chaudhuri, Arjun and Morris B. Holbrook (2001), "The Chain of Effects from Brand Trust and

Cheng, Joey T., Jessica L. Tracy, Simon Ho, and Joseph Henrich (2016), "Listen, Follow Me:

Crowley, Ayn E. and Wayne D. Hoyer (1994), "An Integrative Framework for Understanding Two-Sided Persuasion," *Journal of Consumer Research*, 20 (4), 561–74.

De Vries, Lisette, Sonja Gensler, and Peter S.H. Leeflang (2012), "Popularity of Brand Posts on Brand Fan Pages: An Investigation of the Effects of Social Media Marketing," *Journal of Interactive Marketing*, 26 (2), 83–91.

Dynamic Vocal Signals of Dominance Predict Emergent Social Rank in Humans," *Journal of Experimental Psychology: General*, 145 (5), 536–47.

Einav, L. (2007). Seasonality in the U.S. motion picture industry. *Rand Journal of Economics*, *38*(1), 127–145.

Eisend, Martin (2006), "Two-Sided Advertising: A Meta-Analysis," *International Journal of Research in Marketing*, 23 (2), 187–98.

Friestad, Marian and Peter Wright (1994), "The Persuasion Knowledge Model: How People Cope with Persuasion Attempts," *Journal of Consumer Research*, 21 (1), 1–31.

Graf, Laura K. M., Stefan Mayer, and Jan R. Landwehr (2018), "Measuring Processing Fluency: One versus Five Items," *Journal of Consumer Psychology*, 28 (3), 393–411.

Grewal, Lauren and Andrew T. Stephen (2019), "In Mobile We Trust: The Effects of Mobile Versus Nonmobile Reviews on Consumer Purchase Intentions," *Journal of Marketing Research*, 56 (5), 791–808.

Gupta, P. B., & Lord, K. R. (1998). Product placement in movies: The effect of prominence and mode on audience recall. *Journal of Current Issues & Research in Advertising*, *20*(1), 47–59.

Hall, Judith A. (1980), "Voice Tone and Persuasion," *Journal of Personality and Social Psychology*, 38 (6), 924–34.

Hobson, Jessen L., William J. Mayew, and Mohan Venkatachalam (2012), "Analyzing Speech to Detect Financial Misreporting," *Journal of Accounting Research*, 50 (2), 349–92.

Hong, J., & Sun, Y. (2012). Warm it up with love: The effect of physical coldness on liking of romance movies. *Journal of Consumer Research*, *39*(2), 293–306.

Hudson, S., & Hudson, D. (2006). Branded entertainment: A new advertising technique or product placement in disguise? *Journal of Marketing Management*, *22*(5-6), 489–504.

John, Leslie K., Oliver Emrich, Sunil Gupta, and Michael I. Norton (2017), "Does 'Liking' Lead to Loving? The Impact of Joining a Brand's Social Network on Marketing Outcomes," *Journal of Marketing Research*, 54 (1), 144–55.

Khamitov, Mansur, Xin (Shane) Wang, and Matthew Thomson (2019), "How Well Do Consumer-Brand Relationships Drive Customer Brand Loyalty? Generalizations from a Meta-Analysis of Brand Relationship Elasticities," *Journal of Consumer Research*, 46 (3), 435–59.

Klofstad, Casey A., Rindy C. Anderson, and Stephen Nowicki (2015), "Perceptions of Competence, Strength, and Age Influence Voters to Select Leaders with Lower-Pitched Voices," *PloS ONE*, 10 (8), e0133779.

Klofstad, Casey A., Rindy C. Anderson, and Susan Peters (2012), "Sounds Like a Winner: Voice Pitch Influences Perception of Leadership Capacity in Both Men and Women," *Proceedings of the Royal Society B: Biological Sciences*, 279, 2698–704.

Kupor, Daniella and Zakary Tormala (2018), "When Moderation Fosters Persuasion: The Persuasive Power of Deviatory Reviews," *Journal of Consumer Research*, 45 (3), 490–510.

Matz, S. C., Kosinski, M., Nave, G., & Stillwell, D. J. (2017). Psychological targeting as an effective approach to digital mass persuasion. *Proceedings of the National Academy of Sciences of the United States of America*, *114*(48), 12714–12719.

Mayew, William J. and Mohan Venkatachalam (2012), "The Power of Voice: Managerial Affective States and Future Firm Performance," *Journal of Finance*, LXVII (1), 1–43.

Mikolov, T., Sutskever, I., Chen, K., Corrado, G. S., & Dean, J. (2013). *Distributed representations of words and phrases and their compositionality.* Paper presented at the Advances in neural information processing systems.

Mikolov, T., Sutskever, I., Chen, K., Corrado, G. S., & Dean, J. (2013). *Distributed representations of words and phrases and their compositionality.* Paper presented at the Advances in neural information processing systems.

Moon, Y. (2002). Personalization and personality: Some effects of customizing message style based on consumer personality. *Journal of Consumer Psychology*, *12*(4), 313–325.

Morgan, Robert M and Shelby D Hunt (1994), "The Commitment-Trust Theory of Relationship Marketing," *Journal of Marketing*, 58 (3), 20–38.

Nisbett, Richard E. and Timothy D. Wilson (1977), "The Halo Effect: Evidence for Unconscious Alteration of Judgments," *Journal of Personality and Social Psychology*, 35 (4), 250–56.

Oleszkiewicz, Anna, Katarzyna Pisanski, Kinga Lachowicz-Tabaczek, and Agnieszka Sorokowska (2017), "Voice-Based Assessments of Trustworthiness, Competence, and Warmth in Blind and Sighted Adults," *Psychonomic Bulletin and Review*, 24 (3), 856–62.

Pennebaker, James W. and Anna Graybeal (2001), "Patterns Of Natural Language Use: Disclosure, Personality, And Social Integration," *Current Directions in Psychological Science*, 10(3), 90-3.

Pennebaker, James W., Matthias R. Mehl and Kate G. Niederhoffer (2003), "Psychological Aspects Of Natural Language Use: Our Words, Our Selves," *Annual Review of Psychology*, 54(1), 547-77.

Petty, Richard E. and John T. Cacioppo (1986), "The Elaboration Likelihood Model Of Persuasion," *Advances in Experimental Social Psychology*, 19, 123–94.

Phillips, J., & Noble, S. M. (2007). Simply captivating: Understanding consumers' attitudes toward the cinema as an advertising medium. *Journal of Advertising*, *36*(1), 81–94.

Phillips, J., & Noble, S. M. (2007). Simply captivating: Understanding consumers' attitudes toward the cinema as an advertising medium. *Journal of Advertising*, *36*(1), 81–94.

Reber, Rolf, Piotr Winkielman, and Norbert Schwarz (1998), "Effects of Perceptual Fluency on Affective Judgments," *Psychological Science*, 9 (1), 45–48.

Rucker, Derek D., Zakary L. Tormala, Richard E. Petty, and Pablo Briñol (2014), "Consumer Conviction and Commitment: An Appraisal-Based Framework for Attitude Certainty," *Journal of Consumer Psychology*, 24 (1), 119–36.

Signorello, Rosario (2019), "Voice in Charismatic Leadership," in *The Oxford Handbook of Voice Studies*, ed. Nina Eidsheim and Katherine Meizel, New York, NY: Oxford University Press (165–89).

Stone, M. (1978). Cross-validation: A review. *Series Statistics*, *9*(1), 127–139.

Street Jr, Richard L., Robert M. Brady, and William B. Putman (1983), "The Influence of Speech Rate Stereotypes and Rate Similarity or Listeners' Evaluations of Speakers," *Journal of Language and Social Psychology*, 2 (1), 37–56.

Swartz, Teresa A. (1984), "Relationship between Source Expertise and Source Similarity in an Advertising Context," *Journal of Advertising*, 13 (2), 49–54.

Tibshirani, R. (1996). Regression shrinkage and selection via the lasso. *Journal of the Royal Statistical Society. Series B, Statistical Methodology*, 267–288.

Tigue, Cara C., Diana J. Borak, Jillian J. M. O'Connor, Charles Schandl, and David R. Feinberg (2012), "Voice Pitch Influences Voting Behavior," *Evolution and Human Behavior*, 33 (3), 210–16.

Tormala, Zakary L. and Richard E. Petty (2004), "Source Credibility and Attitude Certainty: A Metacognitive Analysis of Resistance to Persuasion," *Journal of Consumer Psychology*, 14 (4), 427–42.

Wheeler, S. C., Petty, R. E., & Bizer, G. Y. (2005). Self-schema matching and attitude change: Situational and dispositional determinants of message elaboration. *Journal of Consumer Research*, *31*(4), 787–797.

Wiener, Hillary J. D. and Tanya L. Chartrand (2014), "The Effect of Voice Quality on Ad Efficacy," *Psychology and Marketing*, 31 (7), 509–17.

Wilson, Elizabeth J. and Daniel L. Sherrell (1993), "Source Effects in Communication and Persuasion Research: A Meta-Analysis of Effect Size," *Journal of the Academy of Marketing Science*, 21 (2), 101–12.

Winkielman, Piotr and John T. Cacioppo (2001), "Mind at Ease Puts a Smile on the Face: Psychophysiological Evidence That Processing Facilitation Elicits Positive Affect," *Journal of Personality and Social Psychology*, 81 (6), 989–1000.

Zhang, P. (1993). Model selection via multifold cross validation. *Annals of Statistics*, *21*(1), 299–313.

Consumer Behavior Meets Machine Learning

Chairs: Siham El Kihal, Frankfurt School of Finance & Management, Germany
A. Selin Atalay, Frankfurt School of Finance & Management, Germany

Paper #1: Using Natural Language Processing to Investigate the Role of Syntactic Structure in Persuasive Communication

A. Selin Atalay, Frankfurt School of Finance & Management, Germany

Siham El Kihal, Frankfurt School of Finance & Management, Germany

Florian Ellsaesser, Frankfurt School of Finance & Management, Germany

Paper #2: Scalable Content Curation: Learning from Human Effort

Pavel Kireyev, INSEAD, France

Artem Timoshenko, Northwestern Kellogg School of Management, USA

Cathy Yang, HEC Paris, France

Paper #3: The Power of Brand Selfies in Consumer-Generated Brand Images

Jochen Hartmann, University of Hamburg, Germany

Mark Heitmann, University of Hamburg, Germany

Christina Schamp, University of Mannheim, Germany

Oded Netzer, Columbia Business School, USA

Paper #4: Black-Box Emotion Detection: On the Variability and Predictive Accuracy of Automated Emotion Detection Algorithms

Francesc Busquet, University of St. Gallen, Switzerland

Christian Hildebrand, University of St. Gallen, Switzerland

SESSION OVERVIEW

In a recent paper, Proserpio and colleagues (2019) highlight how advances in machine learning research help marketing researchers estimate models that predict extremely well and that are able to leverage the power of new data sources such as images, text, audio, and video. At the same time, they raise how machine learning research needs a "soul" which should capture competitors' reactions in complex markets as well as consumer theories to be able to capture the complexity of consumer behaviors, their needs and preferences.

The papers in this special session "Consumer Behavior Meets Machine Learning" aim at improving our understanding of consumer behavior and attitudes by combining advanced machine learning techniques with behavioral theories. The papers contribute to answering the following high-level questions:

- How can machine learning enhance our understanding of consumer attitudes and behaviors?
- How can behavioral theories help machine learning researchers open the prediction black-box and generate more interpretable features?

Using Natural Language Processing to Investigate the Role of Syntactic Structure in Persuasive Communication

EXTENDED ABSTRACT

How to use language, that is, how to formulate marketing communications so that they are persuasive, is a decision problem most marketers face. Language, spoken and written alike, is a fundamental element of marketing messages. Language is used in various contexts such as political debates, product reviews, product descriptions and brand communications with the goal of persuading the recipi-
ent. Today, the use of email, social media posts, live chats and blogs provides unprecedented opportunities to reach consumers with verbal messages in addition to existing channels such as TV, radio or newspaper ads.

Extant literature in marketing suggests that the language used influences the persuasive outcomes in various marketing contexts. For instance, language used in news articles reflects the emotions and legitimacy of the article, and influences consumers' attitudes toward the article as well as their likelihood of reading or sharing the article (Berger and Milkman 2012; Humphreys and LaTour 2013; Berger, Moe, and Schweidel 2019). Language used in movie scripts reflects the theme, scenes, and emotion in the movie and thus predicts the box office success (Eliashberg, Hui, and Zhang 2007). Language used in songs impacts the songs' success on the market as the typicality of the lyrics impacts the popularity of a song (Berger and Packard 2018). Elaborateness and the emotionality of tweets about political debates influences which topics get consumers' attention and are shared with others (Berman et al. 2019). Even though a large stream of recent literature is dedicated to understanding the role of language used in marketing contexts (see Berger et al. 2020 for an overview), most of this research is dedicated to the content of the message communicated (i.e., choice of words). Tools for understanding what makes the language used in marketing messages persuasive independently of the content are still missing.

In the current research, we seek to understand what makes marketing messages persuasive independently of the message content. In that, our focus is on the impact of the syntax of the language used (i.e., grammar) on the persuasiveness of the message communicated. Following a natural language processing (NLP) approach, we posit that the syntactic structure of a message influences its persuasiveness (Gibson 1998). We develop and test a novel approach to measuring syntactic structure in a series of three studies, and identify the specific syntactic elements, referred to as dependencies, which impact the persuasiveness of a marketing message. In our main study, using a dataset consisting of 134 debates with 129,480 sentences, we develop an NLP-based measure of syntactic structure. In this study, we show that the syntactic structure of the language used in the debates impacts the attitude change caused by the debates. Using our measure, we identify the specific syntactic elements that affect the persuasiveness of a marketing message. Our measure captures syntactic structure more systematically and better in terms of predicting the persuasiveness of a message than past measures of syntax.

We validate our measure of syntactic structure and the impact of the specific syntactic elements that affect the persuasiveness of a marketing message in two experiments that follow the main study: First, we conduct a laboratory experiment where we manipulate the syntactic structure of a marketing message using the specific syntactic elements identified in our main study. The context is a persuasive message about the benefits of wearing a bike helmet. We show that when the syntactic structure of the message is changed according to our findings, the persuasiveness of the message is increased. Second, we conduct a field experiment on Facebook, where we improve the syntactic structure in the copy of an advertisement designed by a marketing agency using the specific syntactic elements identified in our main study, and measure click through rates for the ad. We show that when the syntactic structure of the ad language is improved using the specific syntactic elements we identified, the persuasiveness

of the ad is increased: The click-through rate for the ad increased significantly by 40% compared to the baseline ad version, which was designed by the marketing agency. This experiment also demonstrates how marketers can use our method to improve their marketing messages to make them more persuasive.

Our work contributes to marketing research by developing a novel approach of measuring and modifying syntactic structure, allowing for a more precise way of formulating persuasive marketing communications. Additionally, our work contributes to marketing practice by providing a tool that marketers can use to efficiently improve the persuasiveness of their messages as well as any other communication that uses language as a medium.

Scalable Content Curation: Learning from Human Effort

EXTENDED ABSTRACT

Many firms rely on the crowdsourcing platforms to generate new product and advertising ideas. For example, Colgate-Palmolive, a large consumer products firm, collaborated with a digital creative agency to generate ideas for one of its most visible advertising campaigns. The firm organized an ideation contest - members of the agency's innovation platform submitted ad ideas, and the winning ideas were used to develop an ad that was shown to over 109 million viewers of the Super Bowl - one of the world's most popular television events. Major advertisers such as P&G and Unilever generate ideas for new products and advertising campaigns either using internal crowdsourcing platforms or through specialized creative agencies. Crowdsourced ideas can be more creative than internal solutions. The firm may uncover an unexpected extreme-value solution thanks to a large number of opinions from diverse participants. Crowds can also identify niche consumer interests which can lead to valuable innovations that the firm would not have considered otherwise.

Crowdsourcing campaigns can yield thousands of submissions that firms cannot exhaustively and carefully evaluate. For example, our data provider attracted 74,436 ideas over 153 ideation contests. The scale of these campaigns raises the important question of how to identify the best ideas efficiently. Current approaches involve using either the crowd itself or a set of internal employees to prescreen ideas. However, the crowd-based approach is infeasible if the firm prefers to keep submissions confidential. In this research, we focus on the case where the firm uses internal evaluators to maintain submission confidentiality and thereby abide with data protection laws or withhold the submissions it receives as a competitive advantage. In our field setting, each idea was evaluated once by several employees of the crowdsourcing platform in a prescreening stage, which resulted in a total of 186,111 evaluations and consumed about 14 workdays per month of human effort in the median month.

Our research aims to develop an efficient approach to identify the best ideas from crowdsourcing contests using data on the behavior of internal evaluators, whom we refer to as "voters", idea characteristics and text, and the selection of winning ideas by the clients, whom we refer to as "sponsors". We develop a model to reconcile the difference between the sponsor's selection of finalist ideas and the evaluations of voters who prescreen the ideas. In our field setting, the platform sorts ideas based on their average voter score before presenting them to the sponsor. A model that transforms voter scores and incorporates idea characteristics and text can yield a better score to sort ideas, thereby reducing the number of ideas that a sponsor must review to identify all finalists by 7-18%, depending on the specific evaluation approach. Equivalently, the platform can reduce the workload of its employees by 8-25% while maintaining the same quality of the idea ranking for the sponsor.

We find that voters exhibit persistent differences in their "importance", or the extent to which their votes help identify finalists. As a result, a model trained on one set of contests can extend to future contests even if ideation topics differ across contests. We define a metric for measuring the importance of a voter as the deterioration in the quality of the idea ranking when we remove this voter. Interestingly, voter importance may differ depending on whether a model is used or not. We call this phenomenon "predictable inaccuracy" – a voter may be more predictive of the sponsor's choice if her votes are properly transformed. Moreover, two voters who are similarly important when the platform uses average score to rank ideas may differ significantly in their importance when a model is used, suggesting that different voters can exhibit different levels of predictable inaccuracy. Voter "redundancy", or the extent to which voters are correlated with each other, can also lead to varying levels of predictably inaccuracy. Our results suggest that a firm interested in identifying its most valuable voters may arrive at different conclusions depending on whether it assesses voter performance jointly with a statistical model or independently of a model based on the initial ranking criteria.

We complement our findings with a survey based on a product design contest organized by an open innovation platform called Lego Ideas. The survey allows us to design simulations to study the generalizability of our findings, recover ground-truth measures of idea quality that are not available in the field data, and study how voter characteristics may relate to voter importance. We capture voter heterogeneity through differences in brand appreciation and generate a sponsor score from a subset of the available votes. We find that even if voters do not influence sponsor choices, and sponsor preferences are representative of voter preferences, certain types of voters still emerge as more important than others. A statistical model with text data yields improvements in the survey setting as well, but there is only subtle evidence of predictable inaccuracy in the particular simulation we study because of limited nonlinearities in the relationship between voter and sponsor scores. The survey confirms that a statistical model can exploit varying voter importance and redundancy, thereby reducing evaluation effort in this alternative setting, even when there are no significant preference differences between voters and the sponsor.

Overall, our findings suggest that firms can enhance their content curation processes, even if they crowdsource ideas on different topics over time. In assessing the performance of different voters, firms must consider how the voters perform in conjunction with a model as opposed to independently. The "predictable inaccuracy" of certain voters, if it is present, can alter their relative importance.

The Power of Brand Selfies in Consumer-Generated Brand Images

EXTENDED ABSTRACT

Every day more than 5 billion images are shared on social media networks such as Facebook, Twitter, or Instagram. Of particular interest to marketers are images that feature brands and consumption experiences that contribute approximately 1% of all social media images, resulting in 50 million social media images featured with brand logos daily. At the same time, one of the biggest trends introduced by smartphone cameras and social media are selfies. Today, more than 383 million images with the hashtag #selfie exist on a single photo-sharing platform such as Instagram. The emergence of selfies merits

the question of how brands appear in selfie images and how observers respond to this type of social media brand images.

In fact, recent marketing practice attempts to capitalize on the selfie phenomenon, mainly by actively encouraging consumers to post selfies of their product encounters. Brand images are also of interest to managers when passively listening in to social media posts. Among other things, companies track brand logo presence on social media to understand social media popularity, rank consumer-generated images on their social media brand page, or use such images as part of their own marketing campaigns.

However, not all brand logo appearances are created equal. Some may generate more valuable consumer-brand engagement than others. Accordingly, the objective of this research is to investigate how brands appear in consumer-generated images and to examine the effectiveness of different types of social media brand images on generating engagement among consumers. Specifically, we investigate both sender engagement objectives in terms of how brand images may generate image engagement (i.e., likes or comments) and brand engagement objectives in terms of how brand images may generate brand engagement (i.e., brand-related comments such as expressed purchase intent).

Academic research provides ample evidence for the effectiveness of images in advertising (e.g., Hanssens and Weitz 1980; Xiao and Ding 2014). Recent studies have also explored the motivations to share content and take photos and how this affects subsequent sender behavior (e.g., Barasch, Zauberman and Diehl 2018; Grewal, Stephen and Coleman 2019). However, little is known about how observers respond to brand images in social media.

Using both manual annotations of a sample of images and convolutional neural networks (CNN) for automated image classification of nearly half a million brand images related to 185 different brands that were posted on Twitter and Instagram, we identify three types of user-generated brand images that differ in terms of human and facial presence. Consumers post either images of products in isolation or holding products themselves (i.e., selfies). We find that these brand-related selfies exist in two forms with consumers either visible (their face) or invisible to the viewer (e.g., first-person point of view of the product). We name the former consumer selfie and the latter brand selfie to indicate the focus in brand selfies is exclusively on the product and differentiate it from consumer selfies where the face of the sender is visible[1]. This results in the following typology of brand images:

1. Brand Selfies: branded products held by an invisible consumer,
2. Consumer Selfies: visible consumer faces together with a branded product,
3. Packshots: standalone images of branded products.

The CNN algorithm accurately classified images into these three categories with a hold-out accuracy level of > 80%. In both datasets, we find that consumer selfies have the lowest fraction of all types, suggesting that consumers are reluctant to post photos of themselves with the brand on their own accord. At the same time, consumer selfies are the image type most often encouraged by corporate communication campaigns, and face images, akin to consumer selfies, are ubiquitous in print advertising (Xiao and Ding 2014).

---

[1] Note, we distinguish brand and consumer selfies based on the visibility of consumer faces. Conceptually, the term selfie suggests the person on the image took the photo herself. Yet, in some cases, a third person may have photographed the sender (e.g., < 3% of brand selfies and < 39% of consumer selfies in our Twitter data). This can be difficult to distinguish empirically for both the human eye and an automated image classifier.

Whether consumer selfies are well suited as a user-generated media content is an open question, which we attempt to answer in this research.

Analyzing consumers' response to the different types of brand images in terms of likes and comments, we find that consumer selfies, in which a person appears with the brand, generate the highest level of engagement towards the image or the sender in terms of the number of likes and comments on the image. However, these simple engagement measures, while encouraging for brands in terms of user potential, may be misleading. Examining the content of the user comments, using both dictionary-based and machine learning text mining tools, we find that consumer selfies generate fewer self-brand mentions and stated purchase intentions of receivers in response to the original image post. These results are consistent with research from traditional advertising and information systems, which indicate that, on the one hand, images with faces catch more attention than those without faces (Bakhshi, Shamma and Gilbert 2014; Xiao and Ding 2014), but, on the other hand, may detract attention away from the brand itself (Erfgen, Zenker and Sattler 2015).

These results are consistent for both the Twitter and Instagram dataset, suggesting that the effects are not driven by different consumer motives of the respective platforms. We complement these results with a lab experiment, which allows us to control for the prominence of the brand in the image and collect purchase intent ratings, as well as to

test the underlying potential psychological mechanism that may trigger consumers' varying reaction to different brand image types. The results of the experiment further suggest that brand selfies have a superior impact on perceived purchase intent compared to consumer selfies. In addition, it suggests the differential impact of brand selfies is related to easier and more accessible self-reference and mental simulation offered by these image types.

Black-Box Emotion Detection:
On the Variability and Predictive Accuracy
of Automated Emotion Detection Algorithms

EXTENDED ABSTRACT

Automated emotion detection from facial expressions refers to the use of algorithms that detect facial landmarks in pictures to classify people's discrete emotions (Liu et al. 2014; Wood et al. 2016). These automated emotion detection systems classify discrete positive emotions such as happiness or surprise to negative emotions such as anger and fear. A computer vision algorithm first identifies facial landmarks in a picture and then assigns each picture a discrete emotion label based on the features or composition of the existing facial landmarks (Fox et al. 2000; Pantic and Rothkrantz 2000) development of an automated system that accomplishes this task is rather difficult. There are several related problems: detection of an image segment as a face, extraction of the facial expression information, and classification of the expression (e.g., in emotion categories. Companies such as Microsoft, Google, or GfK provide platforms to perform such automated emotion detection with recent industry reports suggesting a CAGR of 32.7% and a market size of 25 billion by 2020, highlighting the importance and dominance of these AI-powered technologies for the future of marketing. Despite the increasing availability of automated emotion detection systems, fundamental methodological questions arise. Are automated emotion detection systems valid? Is the same picture classified correctly across emotion detection systems? These questions are important as emotion detection systems are using pre-trained algorithms to classify discrete emotions from facial expressions in a way that is unknown to

the user of these systems. Thus, it is likely that the same picture is assigned a different discrete emotion conditional on the type of emotion detection system being used. To the best of our knowledge, both a formal test of this hypothesis is non-existent as is a formal analysis that unravels under which conditions emotion detection algorithms would increase in predictive accuracy. The current paper fills this gap by providing a tightly controlled validation study comparing the effectiveness (i.e., in terms of predictive accuracy) of major automated emotion detection systems across discrete emotions, dependencies on the modelling technique being used, the stimuli set, and ways to improve predictive accuracy by combining feature sets or using ensemble methods.

We used a standardized picture set with objective ground truth, i.e. knowledge about the discrete emotion that is displayed by actors in a standardized picture set. Specifically, we used the Chicago face database (Ma, Correll, and Wittenbrink 2015) to evaluate automated emotion detection systems. The Chicago face database contains photos from 597 male and female targets of varying ethnicity between 18 and 40 years under standardized conditions. For a subset of 158 targets, images display either a neutral, angry, fearful, or two positive emotional states (happy face with either an open or closed mouth). Each of these images of the 158 subjects displaying various emotions was classified using five major automated emotion detection systems via an Application Programming Interface (API): Microsoft Cognitive Services, Google ML, Sightcorp, Kairos, and the GfK EmoScan. The data was normalized across emotion detection systems to provide meaningful comparisons in the following analyses.

To set a baseline, we evaluated the effectiveness of the different emotion detection systems by predicting each image emotion label via the corresponding emotion measure (i.e., predicting happy faces using the happiness feature of each emotion detection system). A multinomial logit model revealed substantial variation across emotion detection systems with the highest, cross-validated (CV) prediction accuracy for Google ML with a test accuracy of 58.94% and a test Kappa of 40.25%, compared to the lowest prediction accuracy for GfK EmoScan with a test sample accuracy of 49.81% and a test Kappa of 36.88%. Positive emotions were predicted consistently better compared to the substantial variation across negative emotion labels (variability across emotion detection systems: $\sigma_{happy\ open}$ = 3.81, $\sigma_{neutral}$ = 6.89 σ_{fear} = 14.98, σ_{anger} = 30.9) and overall lower predictive power for negative emotions than for positive and neutral emotions (average balanced accuracy for the different emotion classes: $\mu_{happy\ open}$ = 78.97, $\mu_{neutral}$ = 79.97 μ_{fear} = 65.45, μ_{anger} = 44.3). These findings were robust even after controlling for all other emotion features.

Next, we aimed at further improving prediction accuracy in two ways. First, by increasing the feature space through combining the entire set of features across all emotion detection systems. Second, by using more flexible model estimation and machine learning techniques. Specifically, recent advances in deep learning might further improve predictive accuracy by increasing the number of layers and / or boosting a model by aiming at predicting misclassified cases. In short, increasing the feature space resulted in a greater test accuracy with an averaged accuracy of 85.73% and a Kappa of 81.02%.

Next, we aimed at further improving prediction accuracy by using more flexible machine learning techniques. Parameters were selected through grid search in the parameter space. Lowest performance was achieved by Support Vector Machines with radial basis kernel resulting in a test accuracy of 84.41% and a test Kappa of 79.33%. Highest performance was achieved by using Random Forests and LogitBoost achieving 92.02% test accuracy, 89.25% test kappa and 93.60% accuracy, 91.34% kappa, respectively. These changes led to a significant increase in predictive power also for neg-

ative discrete emotions and substantially reduced variation across positive, neutral and also negative emotion labels ($\sigma_{happy\ open}$ = 2.71, $\sigma_{neutral}$ = 1.36, σ_{fear} = 5.32, σ_{anger} = 4.61).

To the best of our knowledge, this is the first systematic study demonstrating the striking variability in automated emotion detection systems across discrete emotions and we provide two easy to implement modelling strategies to improve prediction accuracy across automated emotion detection systems.

REFERENCES

Bakhshi, Saeideh, David A. Shamma and Eric Gilbert (2014), "Faces Engage Us: Photos with Faces Attract More Likes and Comments on Instagram," in *Proceedings of the ACM Conference on Human Factors in Computing Systems*, Toronto, Canada: ACM, 965–974.

Barasch, Alixandra, Gal Zauberman and Kristin Diehl (2018), "How the Intention to Share Can Undermine Enjoyment: Photo-Taking Goals and Evaluation of Experiences," *Journal of Consumer Research*, 44 (6), 1220–1237.

Berger, Jonah, Ashlee Humphrees, Stephen Ludwig, Wendy Moe, Oded Netzer, and David Schweidel (2020), "Uniting the Tribes: Using Text for Marketing Insight," *Journal of Marketing*, 84 (January), forthcoming.

Berger, Jonah, and Grant Packard (2018), "Are Atypical Things More Popular?" *Psychological Science*, 29 (7), 1178–84.

Berger, Jonah, and Katherine L. Milkman (2012), "What Makes Online Content Viral?" *Journal of Marketing Research*, 49 (2), 192–205.

Berger, Jonah, Wendy W. Moe, and David A. Schweidel (2019), "What Makes Stories More Engaging? Continued Reading in Online Content," *Working Paper*.

Berman, Ron, Shiri Melumad, Colman Humphrey, and Robert Meyer (2019), "A Tale of Two Twitterspheres: Political Microblogging During and After the 2016 Primary and Presidential Debates," *Journal of Marketing Research*, 56(6), 895–917.

Eliashberg, Jehoshua, Sam K. Hui, and Z. John Zhang (2007), "Assessing Box Office Performance Using Movie Scripts: A Kernel-Based Approach," *IEEE Transactions on Knowledge & Data Engineering*, 26 (11), 2639–48.

Erfgen, Carsten, Sebastian Zenker and Henrik Sattler (2015), "The Vampire Effect: When Do Celebrity Endorsers Harm Brand Recall?", *International Journal of Research in Marketing*, 32 (2), 155–163.

Fox, Elaine, Victoria Lester, Riccardo Russo, R. J. Bowles, Alessio Pichler, and Kevin Dutton (2000), "Facial expressions of emotion: Are angry faces detected more efficiently?," *Cognition and Emotion*.

Gibson, Edward (1998), "Linguistic Complexity: Locality of Syntactic Dependencies," *Cognition*, 68(1), 1–76.

Grewal, Lauren, Andrew T. Stephen and Nicole V. Coleman (2019), "When Posting About Products on Social Media Backfires: The Negative Effects of Consumer Identity Signaling on Product Interest," *Journal of Marketing Research*, forthcoming.

Hanssens, Dominique M. and Barton A. Weitz (1980), "The Effectiveness of Industrial Print Advertisements Across Product Categories," *Journal of Marketing Research*, 17 (3), 294–306.

Humphreys, Ashlee, and Kathryn A. LaTour (2013), "Framing the Game: Assessing the Impact of Cultural Representations on Consumer Perceptions of Legitimacy," *Journal of Consumer Research*, 40(4), 773–795.

Liu, Ping, Shizhong Han, Zibo Meng, and Yan Tong (2014), "Facial expression recognition via a boosted deep belief network," in *Proceedings of the IEEE Conference on Computer Vision and Pattern Recognition*, 1805–12.

Ma, Debbie S, Joshua Correll, and Bernd Wittenbrink (2015), "The Chicago face database: A free stimulus set of faces and norming data," *Behavior research methods*, 47(4), 1122–35.

Pantic, Maja, and Leon Ü M. Rothkrantz (2000), "Automatic analysis of facial expressions: The state of the art," *IEEE Transactions on Pattern Analysis and Machine Intelligence*.

Proserpio, Davide and Hauser, John R. and Liu, Xiao and Amano, Tomomichi and Burnap, Alex and Guo, Tong and Lee, Dokyun (DK) and Lewis, Randall A. and Misra, Kanishka and Schwartz, Eric M. and Timoshenko, Artem and Xu, Lilei and Yoganarasimhan, Hema, Soul and Machine (Learning) (September 16, 2019). Available at SSRN: https://ssrn.com/abstract=3454294 or http://dx.doi.org/10.2139/ssrn.3454294

Wood, Adrienne, Magdalena Rychlowska, Sebastian Korb, and Paula Niedenthal (2016), "Fashioning the Face: Sensorimotor Simulation Contributes to Facial Expression Recognition," *Trends in Cognitive Sciences*.

Xiao, Li and Min Ding (2014), "Just the Faces: Exploring the Effects of Facial Features in Print Advertising," *Marketing Science*, 33 (3), 338–352.

AI Agents in Consumer Service – Tools or Partners?

Chairs: Marat Bakpayev, University of Minnesota Duluth, USA
Ann Kronrod, University of Massachusetts Lowell, USA

Paper #1: Consumer Interactions with Artificial Intelligence Agents – a Historical Perspective

Marat Bakpayev, University of Minnesota Duluth, USA
Russell Belk, York University, Canada

Paper #2: Are Robots in Service of the Environment? The Role of Service Robots in Socially Responsible Business Practices

Marina Puzakova, Lehigh University, USA
Amir Grinstein, Northeastern University, USA

Paper #3: The Impact of Humans and Robots on Consumer Behavioral Intentions in Medical Contexts

Ilana Shanks, Stony Brook University, USA
Martin Mende, Florida State University, USA
Maura L. Scott, Florida State University, USA
Jenny van Doorn, University of Groningen, The Netherlands
Dhruv Grewal, Babson College, USA

Paper #4: AI Service Agents, Figurative Language, and Conversational Cooperativeness

Marat Bakpayev, University of Minnesota Duluth, USA
Ann Kronrod, University of Massachusetts Lowell, USA

SESSION OVERVIEW

Consumers are increasingly interacting with AI agents, asking for suggestions from chatbots, talking to service robots at hotels or restaurants, and telling their AI assistants - be it Alexa, Siri, or Cortana – "I love you" (Belk 2019; Belk, Humayun, and Gopaldas 2020; Novak and Hoffman 2018; van Doorn et al. 2017; Mende et al. 2019). The nature of these interactions is not yet fully explored. Therefore, this session is aimed to bring together works that explore interactions with AI agents from a multifaceted, multimethod point of view.

We see AI agents from the perspective of slaves, masters, friends, partners, or tools (Elder 2017; Breazeal et al. 2004; Grudin 2017; Schweitzer et al. 2019). The consumer research literature mostly examines AI agents as tools, as well as the tendency of people to humanize/anthropomorphize machines. The papers in this session explore a broader range of roles and perspectives that consumers take toward intelligent machines. In line with the spirit of the conference, the four papers integrate multiple perspectives and methods, examining aspects of interactions with AI agents via a historical lens, a socially responsible business lens, a medical lens, and a linguistic lens. Together, these papers illustrate how robots and AI agents take on different roles in the lives of consumers – as tools or as partners.

Bakpayev and Belk open the session with a historical overview of interactions with robots and AI. The authors conceptualize types of interactions that people have or would have with machines, and discuss the changing landscape of seeing machines as servants, masters, monsters, or friends. Next, Puzakova and Grinstein focus on robots in socially responsible business practices. Across three experiments, the authors demonstrate and explain the negative effect of employing service robots (vs. humans) on consumers' willingness to engage with the brand in socially responsible practices, as well as consumers' perceptions of the brand as being socially responsible. Third, Shanks, Mende, Scott, van Doorn, and Grewal focus on robots as partners in a medical context and examine the effect of a robot taking more or less prominent roles in medical environments. This research examines the underlying mechanisms that impact consumer

behavioral intentions, as robots shift away from operating as tools to being partners in decision making. Finally, Bakpayev and Kronrod take a linguistic perspective on conversations with AI agents. Looking at the use of figurative language (humor, metaphor) by AI/human service agents and perceptions of conversational cooperativeness, the authors find that while human agents are expected to use figurative language because they are perceived as cooperative speakers, AI agents are harmed when they employ figurative language.

Taken together, the papers in this session will examine the same topic of AI agents as tools or partners but from different perspectives. They collectively contribute to the discussion about the role of AI in consumer service from a historical, CSR, medical, and linguistic perspectives. We, therefore, expect the session to attract a wide variety of attendees interested in the integration of artificial machines in consumer service in various contexts.

Consumer Interactions with Artificial Intelligence Agents – a Historical Perspective

EXTENDED ABSTRACT

"Replicants are like any other machine. They're either a benefit or a hazard. If they're a benefit, it's not my problem."

Rick Deckard, *Blade Runner*.

Historically, whether in fiction or fact, humans were captivated by the idea of creating human-like entities (Belk 2016; Kang 2011; Mayor 2018; Nocks 2008; Riskin 2016). Replicants, as depicted in the movie *Blade Runner* (1982), are just one example of artificial beings that appear identical to human beings. Philip Dick (1968) in his novel *Do Androids Dream of Electric Sheep?* – which serves as a primary source for the film – refers to them as "andys" or androids (Greek root "man-like"). Both the novel and the film portray a future circa 2020; that is, now.

While machines in our time are not yet the replicants or androids imagined in Dick's science-fiction, some of them are remarkably human-like and engage us in interactions that are increasingly human in nature. For example, consumers voice commands to their digital assistants like Alexa; consumers chat with AI friends like Replika; consumers look into the "eyes" of the robot Pepper, who greets them in service environment, and reply "Hello!"

Overall, across multiple studies, consumer researchers highlight anthropomorphic aspects of technology when these nonhumans are endowed with human-like traits (Epley 2018). *But what are the origins and consequences of humanizing AI?* While the literature provides various scenarios and results, there is still a great deal to be learned as science fiction becomes science fact. Taking a historical perspective, we look at the nature of our relationships with human-like machines and the consequences of humanizing them.

The term "robot" comes from a science-fiction stage play. Karel Čapek (1920/2004) wrote R.U.R. (*Rossum's Universal Robots*) one-hundred years ago. In the play, robots and robotesses are artificial people, forced into labor as secretaries, postmen, and workers. "Robot" derived from Old Slavic "rab" or slave. The serving purpose was quite prevalent in the early history of artificial life. While not referred to as "robots" yet, humans were developing figurines, statues, mechanical knights, stone giants, and automatons that served more as tools (Belk 2016; Kang 2011; Mayor 2018; Nocks 2008; Riskin 2016). Researchers have traced other perspectives as well.

Belk, Humayun, and Gopaldas (2020) explore the history of Artificial Life (AL) and connect it to four cultural myths: Pygmalion (AL as a product of human desire), Golem (AL as a product of human survival), Frankenstein (AL as a product of human curiosity), and Metropolis (AL as a product of human politics). These myths show deeper insights into our fears and fascinations with artificial beings. While there is a degree of tool-oriented practicality in these visions, there are also deeper orientations toward perfection and immortality.

The idea of the creation of human-like machines took a new turn with the development of computers. During a nearer period in history referred to as the "AI Spring" in the 1940s and 1950s, machines for the first time seemed intelligent. Drawing on early computing and Norbert Weiner's cybernetics, Alan Turing proposed a test (the Turing Test) that could determine when human-like AI was able to pass for being human. The field of Human-Computer Interaction started to develop (Grudin 2017; Haenlein and Kaplan 2019). Machines - and technology in general - were stills tools, more like extensions of our arms, eyes, and minds. However, as AI went into "Summer" and "Winter" (the 1960s and 1970s), consumers realized that their grand expectations for the machines failed.

Similarly, in recent years, with the second "AI Spring" and the threat of a second "AI Winter," reactions to computers started to change. Arguably, we are in the stage of Human-Computer Symbiosis, where machines are seen more like partners (Breazeal et al. 2004; Grudin 2017). Designed to facilitate social interactions, they can be our companions and friends (Elder 2017; Schweitzer et al. 2019). Nevertheless, at the end of his career, Weiner warned that like the Golem of the Rabbi of Prague, we might be creating machines that threaten our continued existence. Slaves could become masters (Schweitzer et al. 2019). Ideological tensions develop as we increasingly humanize AI. As depicted in the opening quote from *Blade Runner*, further development of AI agents could indeed lead to potential benefits for humankind (Markoff 2015), as well as hazards, noted by some visionaries like Bill Gates, Stephen Hawking, and Elon Musk. Huang and Rust (2018; 2020) specify types of service jobs that AI can take on – mechanical, analytical, intuitive, and empathetic – leading to mechanical AI, thinking AI, and feeling AI. Indeed, despite significant accomplishments and progress in AI, or perhaps *due to* the progress, research confirms concerns regarding AI, finding that reactions to humanoid service robots can be discomforting (Mende et al. 2019) and uncanny (Kim, Schmitt, and Thalmann 2019). It appears that consumers resist automation, especially if it threatens their identity (Leung, Paolacci, and Puntoni 2018).

In sum, while past perspectives toward human-like machines focused on ways in which they serve to boost humanity, existential fears about AI seem to be rising in recent years. We worry that algorithms threaten our privacy, security, wealth, and opportunity. We fear that robots will displace us in the workforce and that our machines will become smarter and stronger than us – in the end, taking over, and even extinguishing the human species. Based on historical perspectives and scenarios involving AI agents, the authors consider the possible implications of current transformations in consumer interactions with artificially intelligent agents. Consumers are apt to regard these machines as servants, friends, monsters, or masters. As a result, interactions may be functional or social, calming or frightening, successful or failed. Such developments contribute to further discussions on ethical, moral, legal, and existential questions that are critically important for future consumer research.

Are Robots in Service of the Environment? The Role of Service Robots in Socially Responsible Business Practices

EXTENDED ABSTRACT

Two of the most meaningful societal trends today involve the introduction of robots in services (Mende et al. 2019) and brands' increased engagement with socially responsible practices (i.e., CSR; Mishra and Modi 2016). Importantly, the two trends have not been studied jointly but we argue that they are intertwined and can alter consumption. Here, we aim to fill this gap and address multiple unanswered research questions: How the introduction of a service robot (vs. human) impact: (a) consumer perception of and (b) consumer engagement with the brand's socially responsible practices? What is the underlying mechanism that drives consumer response to a service robot?

Research on consumer reactions to service robot providers is an emerging inquiry and has discussed, for example, the impact of service robots on consumers' social surroundings and service outcomes (e.g., van Doorn et al. 2017), and consumption patterns (e.g., Mende et al. 2019). In turn, the literature on consumers' reactions to brands' CSR practices suggests that consumers believe that business bears responsibility for driving positive social change, and they encourage firms to improve society and the environment while achieving firm goals (Porter and Kramer 2011). Supporting this trend, research shows that in general consumers perceive brands' CSR efforts positively (Luo and Bhattacharya 2006). Relatedly, some research studies situations where brands wish to engage consumers in socially responsible behavior (e.g., recycle, donate; Goldstein et al. 2008, Lichtenstein et al. 2004) and the conditions under which consumers are more likely follow the brand's requests (Romani and Grappi 2014). Overall, how would consumers be influenced by service robots in the context of brands' social responsibility?

Relatively to humans, robots are perceived as more efficient, productive, and generally less warm. Although technological developments imbue robots with increasing automated social presence and humanness (van Doorn et al. 2017), robots are still perceived only as partial social actors and less warm than humans (Heerink et al. 2010). Here, we argue that introduction of service robots can lead to a greater experience of psychological coldness compared to situations when customers are served by humans. Given service robots represent and reflect on the brand, brands that use service robots (vs. humans) will be perceived as colder. This process can have unintended consequences for consumers' perceptions of socially responsible business practices. That is, prior work establishes the negative relationship between psychological experience of coldness and prosocial behaviors (Zhong and Leonardelli 2008). Thus, we postulate that a "colder" experience will result in consumers' less positive views on a brand's social responsibility practices and their own willingness to engage with the brand on social responsibility.

H1: Brands' use of service robots (relatively to humans) is negatively related to consumer (a) perception of the brand's social responsibility, and (b) engagement with the brand's socially responsible practices.

H2: The influence of service robots (relatively to humans) on consumer reaction is mediated by lower brand warmth perceptions.

We test these hypotheses in three studies. Study 1 (N=226, students) used the context of a hotel bellman service. Participants were prompted to imagine that upon their check-in, they were greeted by a hotel bellman (by a service robot) that assisted carrying their luggage and accompanied them to their rooms. After respondents were assisted by a hotel's bellman (robot), they further imagined finding a card on their desk describing that the Ario hotel (a fictitious brand)

partnered together with a local charity organization "the Feed the Hungry Foundation", after which respondents indicated their inferences about the sincerity of the company's motives for pursuing the CSR activity (Yoon et al. 2006), rated brand warmth (Aaker et al. 2010), and the service novelty.

The results of study 1 (a one-way (robot vs. human service) ANCOVA with the novelty of service experience as the covariate) revealed that experiencing a robot (vs. human) service decreased consumers' perceptions of the sincerity of the hotel's motives to engage in CSR (M_{robot}=4.88 vs. M_{human}=5.54; $F(1,223)$ = 7.45, p = .007). The decrease in the sincerity of the motives was driven by lowered perceptions of brand warmth (b=–.46, 95% CI[–.77, –.17]).

Next, study 2 (N=206, MTurk participants) replicates the effect with a different social responsibility domain (environmental concerns) and examines whether robot (human) service also decreases consumer engagement with the brand's socially responsible practices (i.e., willingness to pay an extra-fee for sustainable breakfast). The results of this study revealed that being assisted by a service (human) robot decreased consumers' own desire to engage in sustainable behavior (M_{robot}=3.62 vs. M_{human}=4.28; $F(1,203)$ = 4.47, p < .036). We also found that consumers perceived the motives as less sincere for a service robot (M_{robot}=4.95 vs. M_{human}=5.57; $F(1,203)$ = 7.29, p < .008). Both of these effects were driven by lower brand warmth (lower desire to engage in sustainable consumption: b=–.23, 95% CI [–.50, –.004]); sincerity of the motives: b=–.60, 95% CI [–.94, –.34]).

Study 3 (N=196, MTurk participants) rules out alternative processes through perceived self-efficacy and uncertainty (Chen 2016; van der Wal et al. 2018). Replicating results of studies 1 and 2, the findings revealed that being assisted by a service (human) robot led to lower inferences of the motive sincerity (M_{robot}=4.69 vs. M_{human}=5.78; $F(1,193)$ = 19.28, p < .007) and reduced consumer engagement with a brand's socially responsible practices (M_{robot}=4.01 vs. M_{human}=4.71; $F(1,193)$ = 7.48, p < .007). Next, testing parallel mediators (i.e., brand warmth, self-efficacy, uncertainty; model 4; Hayes 2013) revealed a significant indirect path through brand warmth (sincerity of the motives: b=–.73, 95% CI [–1.08, –.46]; consumer engagement with CSR: b=–.41, 95% CI [–.69, –.18]), with both self-efficacy and uncertainty being nonsignificant.

Overall, this research identifies important consequences of introducing robots into service contexts. In particular, three studies demonstrate that a robot (vs. human) service lowers consumers' perceptions of the sincerity of the motives for the CSR activity and reduces consumers' own engagement with the brand's CSR practices. Our work sheds light on the underlying process through reduced attributions of brand warmth, while also ruling out alternative explanations through self-efficacy and uncertainty.

The Impact of Humans and Robots on Consumer Behavioral Intentions in Medical Contexts

EXTENDED ABSTRACT

As the use of robots in the marketplace increases, both the marketing and robotics literatures have examined how consumers will respond. The literature has mostly examined this phenomenon from the lens of a robot in the position of a tool. However, technological advances are resulting in robots that can begin to assume an increased variety of roles in marketing settings. As robots shift away from being merely tools that assist consumers, it is important to understand how consumers will respond.

We examine this phenomenon in a medical context, as research suggests positive outcomes of the increased use of robots including a decrease in post-surgical complications and shorter hospital stays (Kalis, Collier, and Fu 2018; Marr 2018). Previous research has proposed several mechanisms that may impact consumer response including anxiety (Broadbent et al. 2011; Mende et al. 2019; Mori 1970), social dimensions (van Doorn et al. 2017; Wirtz et al. 2018), and various dimensions of robotic threat (Stein, Liebold, and Ohler 2019; Złotowski, Yogeeswaran, and Bartneck 2017). The use of advanced technology, such as artificial intelligence (AI), in healthcare settings similarly results in adverse consumer reactions due to a belief that AI is less able to adjust for individual situations (Longoni, Bonezzi, and Morewedge 2019). Moreover, this research examines the underlying mechanisms that impact consumer behavioral intentions as robots shift away from operating as tools. An examination of boundary conditions investigates various effects of risk acceptance, power, and anthropomorphism on consumer behavioral intentions.

Nine studies examine the effect of a robot in a more or less prominent role in medical environments; two studies involve live interactions with an actual robot. Study 1A examines the effectiveness of a human-robot team. Patients at an elderly care facility participated in exercise sessions with either a robot with a human physical therapist or a human physical therapist alone. Participants had an unfavorable reaction to the human-robot team (vs. human), rating the exercises as less favorable (p < .01) and reporting lower behavioral responses (p = .04). Study 1B replicates these findings. Participants imagined going to a doctor for an examination while viewing a picture of a human or a human-robot medical team. Participants again had an unfavorable reaction to the human-robot team, and lower ratings of loyalty intentions (p < .001), warmth (p < .001), and competence (p = .02).

Study 2 examines the effect of a human-robot team on a consumer's response to a robot-led team. Participants received a nutritional counseling session from a live, in-person human-robot team with either the human or the robot as the team leader. The results revealed that loyalty intentions (p < .001), and perceptions of warmth (p < .001) and competence (p = .03) were lower when the team was led by a robot (vs. a human).

Study 3 examines the moderating role of risk acceptance (measured) using a video of a human-robot team. The results revealed that participants with low levels of risk acceptance showed a decrease in loyalty intentions and ratings of warmth and competence to the robot-led team (vs. human). The effects were attenuated for participants high in risk acceptance.

Study 4 examines the moderating role of power distance belief (PDB). Power distance belief was measured. Participants watched the same video as in Study 3. The results revealed an increase in unfavorability to a robot-led team for participants low in PDB and an attenuation for participants high in PDB.

Studies 5A and 5B examine the role of perceived choice on response to a human-robot team. In Study 5A, participants chose the robot used in the medical team in the choice condition and were unable to choose the robot used in the control condition. In the control condition, participants had lower loyalty intentions to the robot-led (vs. human-led) team. This was attenuated in the choice condition. Study 5B examined the role of choice on upgrading behavior, finding greater interest in paying to upgrade to a human-human team when the initial team was led by a robot.

Studies 6A and 6B generalize the effect to anthropomorphized robots. Although the results did not reveal effects of anthropomorphism, participants had lower loyalty intentions and ratings of warmth and competence to the robot-led team (vs. human-led), consistent with our previous studies.

The current research uncovers insights into how consumers respond to robots as they move away from the role of tools. Our findings have implications for marketing strategy as we demonstrate that this shift results in an unfavorable consumer response and strategies to mitigate this negative response.

AI Service Agents, Figurative Language, and Conversational Cooperativeness

EXTENDED ABSTRACT

Firms are improving AI service agents' conversational capacities, striving to make their language more natural and more similar to that of humans (e.g., Google's Meena, the open-domain chatbot, Adiwardana et al. 2020). But how do consumers react to this human-like conversational ability? Previous research examined reactions to AI with external similarity to humans (Davenport et al. 2020; van Doorn et al. 2017; Huang and Rust 2020; Mende et al. 2019). To date, research has not inquired into the effect of conversational similarity – one of the most distinctive human capacities – on perceptions of AI agents, and their effects on service.

Addressing this question, we examine reactions to AI service agents employing human-like conversation. Specifically, we compare reactions to the use of figurative language (metaphor, humor) – a distinctly human capacity - by human and AI service agents.

Figurative language requires the speaker to be conversationally cooperative, making assumptions about the other person's understanding (Grice 1975). We suggest that consumers expect human service agents to be conversationally cooperative, but not AI service agents. These conversational expectations, in turn, attenuate the positive effect of using figurative language by AI service agents, compared to literal language, and compared to human agents. Formally, we suggest that:

Hypothesis 1:   *AI service agents who use figurative language evoke less positive reactions than human service agents who use figurative language.*

Hypothesis 2:   *AI service agents who use figurative language evoke less positive reactions than when they use literal language.*

Hypothesis 3:   *These differences are driven by perceptions of the agents' conversational cooperativeness: AI service agents are perceived as significantly less conversationally cooperative than human service agents.*

We explore this effect via four studies. In Study 1, a preliminary test, we compared reactions to human and artificial service agent humorous response to a customer's inquiry. 205 MTurk participants read a brief dialogue between the customer (themselves) and a human/AI hotel booking agent, which ended with the agent making a joke. Participants then reported intentions to book a room with the agent, their comfortableness with and trust towards the agent, and how funny was the joke. T-tests comparing the two groups on the different variables revealed no significant differences in booking intention ($p=.103$), but overall participants were more likely to book with the human (M=5.64) rather than the artificial agent (M = 5.33). We found marginal differences in trust ($p=.098$), comfort ($p=.099$) and satisfaction with the conversation ($p=.083$). Across all variables, the human agent was rated higher than the artificial agent.

The purpose of Study 2 was to compare reactions to serious or humorous answers by human or artificial agents. 427 MTurk participants were randomly assigned to one of 4 conditions in a 2 (human/artificial agent) by 2 (serious/humorous answer) between-subjects design. 2-way ANOVA revealed a significant interaction of agent (human/artificial) and answer (humorous/serious) on booking intention ($F(1,423)=7.47$, $p=.007$), and on answer humorousness ($F(1,423)=8.7$, $p=.003$). Planned contrasts showed that while for human agents there was no significant difference in booking intention whether the agent was joking (M=5.66) or serious (M=5.78, $F(1,423)=.35$, $p=.55$), when the agent was artificial, booking intention was significantly lower when the agent was joking (M=4.77) than when the agent was serious (M=5.65, $F(1,423)=19.9$, $p<.001$). These results support H1 and H2.

In Study 3, we aimed to measure the mediation of conversational cooperativeness expectations. 202 MTurk participants imagined interacting with a human(artificial) service agent, for example, calling a company to book a hotel, or having an online chat to solve a technical problem with a product (e.g., kitchen appliance) and rated their expectations about the agent's behavior in the conversation. Respondents expected human agents to be more cooperative (M=5.58) than artificial agents (M=5.09, $F(1,200)=7.389$, $p=.007$). They also had significantly higher expectations from human agents than artificial agents on Communication Openness ($F(1,200)=6.145$, $p=.014$) and General Cooperativeness ($F(1,200)=4.288$, $p=.040$). To explore the effect of agent type (human/artificial) and cooperativeness expectations on language expectations, a multiple regression was executed. The overall model was significant ($F(3,198)=10.297$, $p<.001$; $R^2=13.5\%$, adjusted $R^2=12.2\%$), suggesting that AI agents are expected to be less cooperative than human agents.

Finally, Study 4 introduces a boundary condition: in a situation of negative service conversations (e.g., complaints), the differences between human and AI service agents are attenuated. 809 MTurk participants were randomly assigned to one of 8 conditions in a 2(human/artificial agent) by 2(metaphorical/literal language) by 2(positive/negative conversation) between-subjects design. Participants read a conversation excerpt where they (the consumer) were talking with a human (AI) customer service agent who used literal language/metaphor in a positive/negative context (choosing a free t-shirt/replacing a wrong t-shirt). They then indicated a likelihood to shop again, rated the retailer and agent's cooperativeness. We found a three-way interaction on likelihood to shop again ($F(1,801)=8.337$, $p=004$), retailer rating ($F(1,801)=10.162$, p=.001) and conversation cooperativeness ($F(1,801)=6.047$, $p=.014$). Contrast analyses within the positive interaction condition showed, as before, that while for human agents language did not influence behavior intentions, retailer evaluation and cooperativeness, for AI agents behavior intentions, and retailer evaluation were significantly lower when they used metaphor versus literal language However in the negative condition this effect disappeared. Mediation analyses showed that agent conversational cooperativeness mediates this effect ($B=.289$, $SE=.064$, $t=4.56$, $p=.0001$, 95%CI: [.165,.414]).

To sum, research on conversational norms in consumer research suggests that adherence to conversational norms, and specifically using figurative language, is positively perceived (e.g., Kronrod and Danziger 2013; Xu and Wyer 2010; Zhang and Schwarz 2012). We discover that when it comes to AI service agents – this relation is moderated. We also find that the negative effect of using figurative language by AI agents is at least partially due to consumers not perceiving them as cooperative conversation partners. Future work can further explore AI agents as conversation partners in various consumer service situations and inform marketers on the way to avoid

unwelcome outcomes of the race towards human-like AI conversation.

REFERENCES

Adiwardana, Daniel, Minh-Thang Luong, David R. So, Jamie Hall, Noah Fiedel, Romal Thoppilan, Zi Yang (2020), "Towards a Human-like Open-domain Chatbot," arXiv preprint arXiv:2001.09977.

Belanche, Daniel, Luis V. Casaló, Carlos Flavián, and Jeroen Schepers (2019), "Service Robot Implementation: a Theoretical Framework and Research Agenda," *The Service Industries Journal*, (2).

Belk, Russell (2016), "Understanding the Robot: Comments on Goudey and Bonnin," *Recherche et Applications en Marketing (English Edition)*, 31(4), 83-90.

Belk, Russell (2019), "Machines and Artificial Intelligence," *Journal of Marketing Behavior,* 4(1), 11-30.

Belk, Russell (forthcoming), "Ethical Issues in Service Robotics and Artificial Intelligence," *Services Industries Journal*.

Belk, Russell, Mariam Humayun, and Ahir Gopaldas (2020), "Artificial Life," *Journal of Macromarketing.*

Breazeal, Cynthia, Jesse Gray, Guy Hoffman, and Matt Berlin (2004), "Social Robots: Beyond Tools to Partners," In *RO-MAN 2004. 13th IEEE International Workshop on Robot and Human Interactive Communication (IEEE Catalog No. 04TH8759)*, 551-556, IEEE.

Broadbent, Elizabeth, In Lee Yong, Rebecca Q. Stafford, I. Han Kuo, and Bruce A. MacDonald (2011), "Mental Schemas of Robots as More Human-Like Are Associated with Higher Blood Pressure and Negative Emotions in a Human-Robot Interaction," *International Journal of Social Robotics*, 3(3), 291–97.

Čapek, Karel (1920/2004), *R.U.R. (Rossum's Universal Robots)*, New York, NY: Penguin.

Chen, Mei-Fang (2015), "Self-efficacy or Collective Efficacy within the Cognitive Theory of Stress Model: Which More Effectively Explains People's Self-reported Proenvironmental Behavior?," *Journal of Environmental Psychology*, 42, 66-75.

Davenport, Thomas, Abhijit Guha, Dhruv Grewal, and Timna Bressgott (2020), "How Artificial Intelligence Will Change the Future of Marketing," *Journal of the Academy of Marketing Science*, 48(1), 24-42.

van Doorn, Jenny, Martin Mende, Stephanie M. Noble, John Hulland, Amy L. Ostrom, Dhruv Grewal, and J. Andrew Petersen (2017), "Domo Arigato Mr. Roboto: Emergence of Automated Social Presence in Organizational Frontlines and Customers' Service Experiences," *Journal of Service Research*, 20(1), 43-58.

Elder, Alexis (2017), *Friendship, Robots, and Social Media: False Friends and Second Selves*, Routledge.

Epley, Nicholas (2018), "A Mind like Mine: The Exceptionally Ordinary Underpinnings of Anthropomorphism," *Journal of the Association of Consumer Research*, 3(4), 591-98.

Goldstein, Noah J., Robert B. Cialdini, and Vladas Griskevicius (2008), "A Room With a Viewpoint: Using Social Norms to Motivate Environmental Conservation in Hotels," *Journal of Consumer Research*, 35(3), 472-482.

Grice, Herbert P (1975), "Logic and Conversation," *Speech Acts*, 41-58, Brill.

Grudin, Jonathan (2017), "From Tool to Partner: The Evolution of Human-Computer Interaction," *Synthesis Lectures on Human-Centered Interaction,* 10(1).

Haenlein, Michael, and Andreas Kaplan (2019), "A Brief History of Artificial Intelligence: On The Past, Present, and Future of Artificial Intelligenc," *California Management Review*, 61(4), 5-14.

Heerink, Marcel, Ben Kröse, Vanessa Evers, and Bob Wielinga (2010), "Relating Conversational Expressiveness to Social Presence and Acceptance of an Assistive Social Robot," *Virtual Reality*, 14(1), 77-84.

Hoffman, Donna L., and Thomas P. Novak (2018), "Consumer and Object Experience in the Internet of Things: An Assemblage Theory Approach," *Journal of Consumer Research*, 44(6), 1178-1204.

Huang, Ming-Hui, and Roland T. Rust (2018), "Artificial Intelligence in Service." *Journal of Service Research,* 21(2), 155-172.

Huang, Ming-Hui, and Roland T. Rust (2020), "Engaged to a Robot? The Role of AI in Service," *Journal of Service Research*.

Kalis, Brian, Matt Collier, and Richard Fu (2018), "10 Promising AI Applications in Health Care," Harvard Business Review, http://www.ajronline.org/doi/abs/10.2214/AJR.11.7522.

Kang, Minsoo (2011), *Sublime Dreams of Living Machines*, Harvard University Press.

Kaplan, Andreas, and Michael Haenlein (2019), "Siri, Siri, in my Hand: Who's the Fairest in the Land? On the Interpretations, Illustrations, and Implications of Artificial Intelligence," *Business Horizons,* 62(1), 15-25.

Kim, Seo Young, Bernd H. Schmitt, and Nadia M. Thalmann (2019), "Eliza in the Uncanny Valley: Anthropomorphizing Consumer Robots Increases their Perceived Warmth but Decreases Liking," *Marketing Letters*, 30(1), 1-12.

Kronrod, Ann and Shai Danziger (2013), "Wii Will Rock You!" The Use and Effect of Figurative Language in Consumer Reviews of Hedonic and Utilitarian Consumption," *Journal of Consumer Research,* 40(4), 726-739.

Leung, Eugina, Gabriele Paolacci, and Stefano Puntoni (2018), "Man versus Machine: Resisting Automation in Identity-based Consumer Behavior," *Journal of Marketing Research,* 55(6), 818-831.

Lichtenstein, Donald R., Minette E. Drumwright, and Bridgette M. Braig (2004), "The Effect of Corporate Social Responsibility on Customer Donations to Corporate-supported Nonprofits," *Journal of Marketing*, 68(4), 16-32.

Longoni, Chiara, Andrea Bonezzi, and Carey K. Morewedge (2019), "Resistance to Medical Artificial Intelligence," *Journal of Consumer Research*, 46 (4), 629-50.

Luo, Xueming, and Chitra Bhanu Bhattacharya (2006), "Corporate Social Responsibility, Customer Satisfaction, and Market Value," *Journal of Marketing*, 70(4), 1-18.

Markoff, John (2015), *Machines of Loving Grace: The Quest for Common Ground Between Humans and Robots*, New York: HarperCollins.

Marr, Bernard (2018), "How Is AI Used In Healthcare - 5 Powerful Real-World Examples That Show The Latest Advances," Forbes, https://www.forbes.com/sites/bernardmarr/2018/07/27/how-is-ai-used-in-healthcare-5-powerful-real-world-examples-that-show-the-latest-advances/#62a1c1f75dfb.

Mayor, Adrienne (2018), *Gods and Robots: Myths, Machines, and Ancient Dreams of Technology*, Princeton University Press.

Mende, Martin, Maura L. Scott, Jenny van Doorn, Dhruv Grewal, and Ilana Shanks (2019), "Service Robots Rising: How Humanoid Robots Influence Service Experiences and Elicit Compensatory Consumer Responses," *Journal of Marketing Research*, 56(4), 535-56.

Mishra, Saurabh, and Sachin B. Modi (2016), "Corporate Social Responsibility and Shareholder Wealth: The Role of Marketing Capability," *Journal of Marketing*, 80(1), 26-46.

Mori, Masahiro (1970), "The Uncanny Valley," *Energy*, 7(4), 33–35.

Nocks, Lisa (2007), *The Robot: The Life Story of a Technology*, Greenwood Publishing Group.

Porter, Michael E., and Mark R. Kramer (2011), "Creating Shared Value: How to Reinvent Capitalism – and Unleash a Wave of Innovation and Growth," *Harvard Business Review*, January-February, 1-17.

Riskin, Jessica (2016), *The Restless Clock: A History of the Centuries-long Argument Over What Makes Living Things Tick*. University of Chicago Press.

Romani, Simona, and Silvia Grappi (2014), 'HowCcompanies' Good Deeds Encourage Consumers to Adopt Pro-social Behavior," *European Journal of Marketing*, 48(5/6), 943-963.

Schweitzer, Fiona, Russell Belk, Werner Jordan, and Melanie Ortner (2019), "Servant, Friend, or Master? The Relationships Users Build with Voice Controlled Smart Devices," *Journal of Marketing Management*, 35(7/8), 693-715.

Stein, Jan-Philipp, Benny Liebold, and Peter Ohler (2019), "Stay Back, Clever Thing! Linking Situational Control and Human Uniqueness Concerns to the Aversion Against Autonomous Technology," *Computers in Human Behavior*, 95(June), 73–82.

Van der Wal, A. J., Arianne J., Femke van Horen, and Amir Grinstein (2018), "Temporal Myopia in Sustainable Behavior under Uncertainty," *International Journal of Research in Marketing*, 35, 378–393.

Wirtz, Jochen, Paul G. Patterson, Werner H. Kunz, Thorsten Gruber, Vinh Nhat Lu, Stefanie Paluch, and Antje Martins (2018), "Brave New World: Service Robots in the Frontline," *Journal of Service Management*, 29(5), 907–31.

Xu, Alison Jing, and Robert S. Wyer Jr. (2010), "Puffery in Advertisements: The Effects of Media context, Communication Norms, and Consumer Knowledge," *Journal of Consumer Research*, 37(2), 329-343.

Yoon, Yeosun, Zeynep Gürhan-Canli, and Norbert Schwarz (2006), "The Effect of Corporate Social Responsibility (CSR) Activities on Companies with Bad Reputations," *Journal of Consumer Psychology*, 16(4), 377-390.

Zhang, Y. Charles, and Norbert Schwarz (2012), "How and Why 1 Year Differs from 365 Days A Conversational Logic Analysis of Inferences from the Granularity of Quantitative Expressions," *Journal of Consumer Research*, 39(2), 248-259.

Zhong, Chen-Bo, and Geoffrey J. Leonardelli (2008), "Cold and Lonely: Does Social Exclusion Literally Feel Cold?," *Psychological Science*, 19(9), 838-842.

Złotowski, Jakub, Kumar Yogeeswaran, and Christoph Bartneck (2017), "Can We Control It? Autonomous Robots Threaten Human Identity, Uniqueness, Safety, and Resources," *International Journal of Human-Computer Studies,* 100(April), 48–54.

The Promise and Perils of Networks and Crowds:
New Perspectives on Collective Consumer Beliefs
Need Chairs

Paper #1: The Limits of Collective Intelligence: Group Dynamics of Binary Choice and Belief Formation

Joshua Becker, Northwestern University, USA
Douglas Guilbeault, University of Pennsylvania, USA
Ned Smith, Northwestern University, USA

Paper #2: The Statistical Self-Fulfilling Selection Fallacy: When Markets Inadvertently Reinforce False Beliefs

Yeonjeong Kim, Massachusetts Institute of Technology, USA
Christopher Olivola, Carnegie Mellon University, USA

Paper #3: In Groups (vs. Markets) We Trust: Relying on Groups or Information Markets to Aggregate Knowledge

Boris Maciejovsky, University of California Riverside, USA
David Budescu, Fordham University, USA

Paper #4: Peer-Predicted-Preference Conjoint Analysis: Tapping Into Consumers' Knowledge of their Peers' Preferences to Improve Market Share Estimates

Sonja Radas, The Institute of Economics, Zagreb, Republic of Croatia
Drazen Prelec, Massachusetts Institute of Technology, USA

SESSION OVERVIEW

Consumer behavior, and marketing more generally, is increasingly driven by collective beliefs regarding the popularity of brands, the quality of products, etc. The growing availability of product reviews and rapid dissemination of opinions about brands via social media have created more opportunities than ever before, for both consumers and marketers, to aggregate information about products and brands. Whereas recent research has emphasized the benefits of trusting aggregate opinions (the 'wisdom of crowds'), this session provides a more nuanced perspective on collective beliefs, by also showcasing their limitations. The four papers in this session reveal novel insights into the strengths and weaknesses of collective beliefs, while addressing important questions: How are erroneous beliefs formed and why are they maintained? When are collective beliefs more (vs. less) accurate? How can we leverage consumers' social networks to improve predictions?

The first two papers examine how consumer social networks and market selection processes can bias consumer beliefs.

The authors of **Paper #1** demonstrate an important limitation of social belief aggregation (e.g., the revision of beliefs through word-of-mouth information transmission). In particular, they show that, whereas social (e.g., word-of-mouth) information transmission can improve the accuracy of beliefs regarding continuous numerical values ("how long will this product last?"), it often fails to improve beliefs regarding binary choice decisions ("should I purchase?").

The authors of **Paper #2** identify an important, yet previously unrecognized, marketplace source of erroneous belief maintenance and propagation: the *statistical self-fulfilling selection fallacy*. They show how multi-stage market selection processes (e.g., the decisions to first purchase, and later return, a product) that are inadvertently biased by erroneous beliefs can produce evidence that seems to support those beliefs, thereby reinforcing them. Critically, this fallacy occurs even without motivations to maintain those beliefs.

The next two papers consider the relative benefits of relying on groups (vs. markets) and social networks to improve predictions.

The authors of **Paper #3** compare the ability of groups versus information markets to aggregate information effectively. They show that groups outperform markets in the absence of conflicts of interest, whereas markets outperform groups when conflicts of interest are present. Moreover, they show that people do not anticipate these results and generally trust groups more than markets, unless they have acquired experience with information markets.

The authors of **Paper #4** propose a new variant of conjoint analysis: Instead of eliciting consumers' personal choices and preferences, it asks them to predict those of their peers. They show that such peer-choice conjoint analyses, which tap into consumers' knowledge of their peers, produce more precise market share estimates.

In sum, the papers in this session offer important, novel insights, from multiple perspectives, regarding the promise, but also perils, of relying on social information transmission and collective beliefs. This session will appeal to researchers interested in better understanding how consumers converge in their beliefs (e.g., regarding products and brands), the extent to which these collective beliefs should (not) be trusted, and how best to utilize social beliefs.

The Limits of Collective Intelligence
Group Dynamics of Binary Choice and Belief Formation

EXTENDED ABSTRACT

Introduction

Consumer behavior is driven by factual beliefs. For example, food choices are driven by both true and false information relating certain foods to health benefits, and other foods to health risks. Relatedly, consumer's beliefs about the potential environmental impacts of their behavior can also drive purchasing decisions (Van de Velde et al. 2009). As a result, understanding the factors that determine beliefs in a population—and particularly belief accuracy—is critical to understanding consumer behavior. The study of belief accuracy is a central area of research on collective intelligence. Although consumer beliefs are heavily shaped by the beliefs of peers in social networks (Katz and Lazarsfeld 1955), which puts populations at the risk of effects such as herding and groupthink (Surowiecki 2004), research on collective intelligence has also found that social influence processes can reliably improve belief accuracy under a wide range of conditions (Becker et al. 2017). However, this research has largely studied beliefs as continuous numeric estimates while individual behavioral decisions are often driven by binary choice estimates. We investigate whether the potential benefits of collective intelligence, i.e. social information processing, extend to binary choice behaviors. We show both theoretically and empirically that the same exact processes which improve belief accuracy for numeric estimates can reduce belief accuracy for binary choices. Remarkably, we find that a group can, in a single conversation, simultaneously improve their numeric estimate accuracy even as their binary choice decision based on that belief becomes less accurate.

Theoretical Results

We study two agent-based models of social exchange in which subjects begin with independent beliefs and then repeatedly revise their beliefs after learning the beliefs of peers in a social network. In the first model ("binary-binary") subjects form binary-choice es-

timates and can observe each other's binary-choice estimates. Proposition 1 shows that under very general assumptions, the majority belief will grow over time—regardless of accuracy.

In the second model ("binary-continuous") subjects form continuous numeric estimates and can observe each other's continuous numeric estimates. Our model is identical to the model used in prior empirical (Becker et al. 2017; 2019) and theoretical (Becker et al. 2017; Golub and Jackson 2010) research on collective intelligence, i.e. the model studied by DeGroot (1974). Here, however, agents are expected to convert their final numeric estimate to a binary choice via a threshold model. E.g., suppose an agent only wants to buy a product that will last at least 5 years before needing to be repaired or replaced; they will first form a numeric estimate ("how long will this product last?") and then make a binary choice estimate ("will it last 5 years?"). Proposition 2 shows that changes in resulting binary choice decisions are decoupled from changes in individual beliefs as measured by averages. This decoupling means that even if the average estimate becomes more accurate, binary choice decisions can still become less accurate—i.e., the number of people making the 'correct' choice can decrease. We demonstrate theoretically the conditions under which this seemingly paradoxical result can occur, finding that these conditions are consistent with typical properties of empirical data. A scenario in which a numeric estimate becomes more accurate and a vote becomes less accurate. Suppose people are estimating the return on an investment, and will choose to purchase if the return is greater than 10%, but the (unknown) true return is actually below 10%. Each point represents the final belief, showing the trajectory from the initial belief. Although the mean belief becomes more accurate, the number of people with the correct vote (i.e. on the correct side of the threshold) decreases.

Empirical Support

Study 1 presents a pre-registered virtual lab experiment in which subjects are asked to make a binary-choice estimate (e.g., "do more than 50% of people think technology is improving our lives?") before and after observing each other's binary choice estimates. We conducted 45 independent trials (15 trials each for 5 unique questions) in which each trial contained 20 subjects answering and reacting to each other in real time, for a total of 900 unique subjects. Study 2 re-analyzes data from similar, previously published experiments in which subjects formed and reacted to continuous numeric estimates. We analyze the change in their responses after subjects react to each other, and compare the change in the collective intelligence (average estimate) accuracy with changes in decisions along hypothetical over/under thresholds. Both Study 1 and Study 2 support our theoretical predictions.

Discussion

We investigated the effects of social exchange on belief formation in order to examine whether prior laboratory results on collective intelligence will be robust to the kind of decision-making that is more likely to determine consumers' behavior. Our theoretical and empirical methods followed the same model and principles as prior research, and yet showed that instead of reliably improving belief accuracy, social information is likely to just amplify initial majorities—regardless of accuracy. Our results offer two important contributions to the understanding of consumer decision-making. First, our findings place an important boundary condition on collective intelligence theory, showing that results for continuous numeric estimates generally do not apply to binary choice decisions. Second, our model and analysis highlights important concerns for how to *measure* beliefs in a population, showing how different methods of mea-

suring consumer beliefs could yield fundamentally different pictures of apparent opinion change.

The Statistical Self-Fulfilling Selection Fallacy When Markets Inadvertently Reinforce False Beliefs

EXTENDED ABSTRACT

People have a surprising capacity to maintain, and even reinforce, erroneous beliefs concerning the nature of relationships between variables (e.g., Gilovich 1991; Gilovich, Griffin, and Kahneman 2002). In particular, they often overestimate the ability of certain variables to predict outcomes of interest. For example, consumers may overestimate the extent to which brand prestige predicts product quality, or overrate the success of particular social strategies (e.g., witness the plethora of widely-shared beliefs concerning predictors of dating success), and market researchers may over-ascribe certain qualities and behaviors to particular segments of the consumer population. Surprisingly, many erroneous beliefs manage to propagate among even well intentioned consumers –i.e., absent any longstanding, ego-boosting motives to hold such beliefs. Given the robustness, prevalence, and widespread impact of such beliefs, an important goal for researchers should be to not only understand their origins, but also to elucidate the processes that allow them to survive, to spread, and (in some cases) to grow stronger over time.

We contribute to this important question by providing a novel explanation for the survival, spread, and strengthening of erroneous beliefs concerning the predictive validity of variables. Specifically, we identify a previously overlooked market mechanism –the *statistical self-fulfilling selection fallacy* (or '*triple-S fallacy*')– that inadvertently produces evidence that appears to confirm an initially hypothesized relationship between two variables (e.g., prestige and quality), or even, in some cases, to inflate it. Critically, this mechanism is separate from (and occurs independently of) previously recognized sources of biased belief maintenance, such as rich-get-richer dynamics (the 'Matthew effect'), the classic self-fulfilling prophecy, and motivated reasoning (e.g., confirmation biases); indeed, the *triple-S fallacy* operates even in the absence of these other biasing pressures.

Using a combination of simulations and analyses of actual data, we demonstrate that the *triple-S fallacy* can easily occur in marketplace with multi-stage selection processes --a fairly common, and broad, set of contexts in which 'candidates' (e.g., potential product purchases, job applicants, financial stock picks, etc.) are initially selected based on indirect and incomplete information, and later either 'retained' or 'let-go' after more direct evidence concerning the outcome of interest (e.g., quality, performance, value, etc.) is observed. Decisions to purchase and return products, for example, exemplify a multi-stage selection process: products are first purchased (i.e., selected) by consumers based on assumed indicators of their quality (e.g., brand prestige, price, etc.), and they are later either kept (i.e., 'retained') or returned (i.e., 'let-go') by those same consumers, depending on their observed quality over a trial period (e.g., a product's warranty period).

We show that a multi-stage selection process (e.g., first deciding whether to purchase a product, then later deciding whether to return it) that is initially biased by erroneous beliefs (e.g., overestimating how strongly brand prestige predicts product quality) will produce evidence that seems to support those initial beliefs, even when everyone is genuinely motivated to hold accurate beliefs concerning the best predictors of the outcome of interest (e.g., product quality). As a result, these beliefs end-up being reinforced, leading to even greater reliance on relatively weak, invalid, or even negative predic-

tors, which produces further deceptively supportive evidence, and so on. The *triple-S fallacy* thus creates a self-reinforcing cycle that helps erroneous beliefs propagate and strengthen over time.

We also show that the *triple-S fallacy* can produce four types of errors concerning the assumed relationship between variables: Depending on the situation, it can lead people to: (i) greatly overestimate the strength of a weak relationship (effect size inflation), (ii) perceive a relationship where none exists (false positive), (iii) fail to see a negative relationship (miss), or even (iv) perceive a negative relationship as being positive (sign-reversal). Moreover, the evidentiary distortion produced by the *triple-S fallacy* can be substantial: our simulations show that uncorrelated variables ($r_{true} = 0$) can appear strongly correlated ($r_{observed} \gg 0$), while negatively correlated variables ($r_{true} < 0$) can appear positively correlated ($r_{observed} > 0$). Interestingly, however, the *triple-S fallacy* mainly works in one direction: to inflate observed correlations. By contrast, it does little to suppress ("deflate") the observation of an existing relationship that nobody initially believes in.

We also show that the *triple-S fallacy* is robust to various assumptions regarding the nature of the selection process (e.g., whether selection categories are discrete or continuous), the characteristics of the variables of interest (e.g., whether they follow normal or uniform distributions), and the relationships between these variables (e.g., whether they are negatively or positively correlated).

We conclude by discussing strategies that consumers and marketers can adopt to mitigate the distorting influence of the *triple-S fallacy*.

In Groups (vs. Markets) We Trust Relying on Groups or Information Markets to Aggregate Knowledge

EXTENDED ABSTRACT

Organizations rely on internal forecasts to guide strategic planning decisions and manage day-to-day operations. Often this process of pooling and aggregating information involves the use of teams and committees, particularly for complex and difficult tasks (Salas, Cooke, and Rosen 2008). Recently, many organizations, like *Ford*, *Google* (Cowgill and Zitzewitz 2015), *Hewlett-Packard* (Gillen, Plott, and Shum 2013), and *Nokia* (Hankins and Lee 2011), started using information markets as an alternative to traditional teams and committees.

The two institutions – groups and markets – differ in many important ways. First, the setting is markedly different. Ad-hoc groups (but also teams and committees) typically operate in face-to-face settings with unregulated communication patterns, whereas markets are highly structured and are usually implemented electronically on network computers. Equally important, the participants' motivations can vary: The implicit assumption for group decision-making is that members have aligned incentives, implying shared goals and cooperation. Markets, on the other hand, are competitive and allow for conflicting goals. Thus, traders may wish to withhold private information that they believe would benefit them during trading. Despite the surging interest in groups and markets, surprisingly little is known about the conditions under which they perform well and the circumstances under which one outperforms the other.

Following a systematic replicate-and-extend strategy, we present the results of three experimental studies that demonstrate that people trust groups more than markets to pool and aggregate information effectively, even when their performance is inferior. In Study 1, N=450 participants were assigned to groups of three, which, in turn, were assigned to one of six between-subjects conditions. We crossed the two *types of institutions* (groups or markets) and the *presence and strength* of explicit manipulation inducing conflicts of interest (no manipulation, weak or strong).

All groups were asked to choose the best of three applicants (labeled A, B, C) for a managerial position. They were given information about five characteristics of the three applicants and were told that all characteristics carry equal weight in the evaluation. Candidate B was objectively the best; Candidate A was the second best applicant and C was the weakest applicant. However, each participant only received information about three of the five relevant characteristics of each applicant.

During the interactive stage, group members discussed the candidates, and market participants traded shares corresponding to the candidates. In the weak (strong) manipulation condition, one (all three) participant(s) was (were) promised side payments if she (they) could affect the group vote to go for A and C, respectively. This information was private. After the interaction, participants privately picked their preferred candidate. If the majority of their group/market (2 or more participants) voted for the best candidate (B), everyone received £4 plus the show-up fee of £5. Otherwise they just received the show-up fee. In the manipulation conditions, the participants who were successful in having Candidate A or C elected received £5 plus the show-up fee. Afterwards, participants were asked on a 7-point Likert scale how much trust they had that the group/market accurately aggregated the available information.

For each group/market we calculated the proportion of (post group or market interaction) votes for the best candidate, B. An ANOVA using the *votes for applicant B* as the dependent variable and *institution* (groups, markets) and *manipulation* (control, weak, strong) as between-subjects factors showed a significant main effect for *manipulation* ($F(4, 140)=11.25$, $p<.001$) and a significant interaction between *institution* and *manipulation* ($F(4, 140)=3.56$, $p=.005$). The interaction suggests that groups outperformed markets in the absence of manipulations, whereas markets outperformed groups in the presence of manipulations. However, people generally trusted groups more than markets ($F(1, 440)=27.33$, $p<.001$; $M_{group}=3.52$ vs. $M_{market}=3.00$).

In Study 2 we sought to generalize these findings and to better understand people's higher trust in groups. Two hundred and twenty-four participants were randomly assigned to one of eight between-subjects conditions with the factors *interaction setting* (group/market), *conflicts of interest* (yes/no), and *task* (hidden profiles/prediction). In all settings participants watched a video of either a group or a market interaction and were asked to indicate how much trust they had that they would aggregate information accurately. Specifically, we asked participants to evaluate groups and markets on eight attributes: transparency, benevolence, efficiency, familiarity, fairness, integrity, predictability, and how natural they perceived them. All items were answered on 7-point Likert scales.

The responses to the 8 attributes were highly correlated, suggesting the existence of a general trust factor. Hence, we computed a composite measure of trust by averaging the 8 items for each participant and used it as the dependent variable in a 2 (*interaction setting*: group vs. market) x 2 (*conflicts of interest*: yes vs. no) x 2 (*task*: hidden profiles vs. prediction) between-subjects ANOVA. The results indicate a significant main effect for *interaction setting* ($F(1, 216)=51.14$, $p<.001$, $\eta^2=.19$), confirming that people trust groups more than markets ($M_{group}=4.95$, $SD_{group}=0.83$, $M_{market}=4.03$, $SD_{market}=1.10$).

In Study 3, we recruited 358 volunteers from the Good Judgment Open Forecasting project (https://www.gjopen.com/) to in-

vestigate how prior experience affects peoples' trust in groups and markets. The participants watched videos of group and market interactions and were asked which institution they would prefer, when assessing job candidates. We analyzed the choices of those participants who previously took part in the Good Judgment Forecasting Tournament as part of singular settings only (as individuals, in teams, in markets). Their responses differed significantly across the three groups ($\chi2(2)$=10.83, p=.004). Whereas participants who took part in the forecasting tournament as individuals or as part of teams generally preferred committees over markets, those participants who took part in markets expressed the opposite preference.

The results of the three studies indicate that people generally trust groups more than markets, even though under conflicts of interest markets outperform groups. Prior experience with markets can reverse this pattern.

Peer-Predicted-Preference Conjoint Analysis Tapping Into Consumers' Knowledge of their Peers' Preferences to Improve Market Share Estimates

EXTENDED ABSTRACT

Typically, market research—including traditional conjoint analysis—begins by asking potential customers for their personal preferences and intentions, and then projects this sample of responses to the entire market. In this paper, we propose a different approach to conjoint analysis: rather than asking consumers about their own likely choices, we instead ask them about the choices that (they predict) others will make, thus utilizing consumers' knowledge about their social peers. More specifically, we ask respondents to predict the percentage of other respondents who will select each option in the choice set. We refer to these judgments as "peer-predictions." Recent research found that people are quite good at predicting others' future choices on the basis of the latter's observed past choices (Velez et al. 2016).

Some prior studies have considered the role of others' preferences in consumer decision-making. For example, Kim et al. (2014) proposed a "group-sourced mechanism" which mimics real-world contexts where the external influence of one's peers shapes consumers' choices. Narayan et al. (2011) also examined peer influence, and found that being exposed to peers' choices prompted consumers to update their preferences in a Bayesian manner. Although these papers considered the influence of peer choices, they nonetheless still estimated preferences on the basis of consumers' *own/personal choices*. One rare exception is a study by Dahan et al. (2011), who examined a market mechanism in which consumers traded concepts on the basis of their perception of others' preferences, to evaluate new product concepts. However, Dahan et al.'s method is distinct from conjoint analysis. No prior studies, to our knowledge, have considered using predictions about others' preferences in conjoint analysis. In the current research, we depart from traditional conjoint analysis by replacing consumers' own/personal choices with their perceptions of their peers' choices, as the inputs into conjoint analysis.

We begin by introducing a model that modifies the standard conjoint analysis approach: rather than considering a consumer's own preferences as inputs, it instead utilizes that consumer's "peer-predicted choice options" —i.e., the alternatives that the consumer believes will be chosen by the majority of his/her peers. The model predicts that using these peer-predicted choices should improve preference share predictions, relative to predictions based on personal choices.

The theoretical foundation for our model extrapolates the reasoning of Rothschild and Wolfers (2013), who assumed that peer-

predictions result from respondents' internal (i.e., mental) polling of their social circle. A personal choice can thus be interpreted as a "degenerate" internal poll based on a "circle of one." We follow this interpretation and adapt it to the binary choice conjoint model, while allowing for possible interdependencies among social circle members. An important implication of our model is that larger social circles will lead to smaller errors in the estimation of utilities.

We conducted four experiments ($N = 402$) to test our models' prediction that conjoint analyses based on peer-predicted choices (vs. own-choices) will more accurately predict preference shares. All of our experiments were performed with online panels, each with a different set of subjects. In each experiment, we compared the traditional own-choice-based conjoint analysis with our new peer-predicted-choice approach. Specifically, we evaluated each approach's out-of-sample choice-share predictions. In Experiments 1-3 we use holdout sets, where part-worths estimated from the own-choice and peer-choice models are utilized to calculate the predicted overall share of an alterative, and those estimates are then compared with the actual share of choices for that alternative. In Experiment 4, instead of holdout sets, we used a validation sample that consisted of a completely different sample of participants.

In line with the predictions of our model, we found that the peer-choice conjoint analysis approach achieved significantly higher predictive accuracy than the traditional (own-choice) conjoint analysis approach. Specifically, the average error of the peer-choice model was significantly lower than that of the own-choice model, both in Experiments 1-3 (pooled-error Wilcoxon signed t-test: $p = .0061$) and Experiment 4 (Wilcoxon signed t-test: $p = .0004$). The errors of the peer-choice model (vertical / y-axis) against the errors of the own-choice model (horizontal / x-axis), in Experiments 1-3 and Experiment 4, respectively. The prediction errors of the own-choice model tend to be larger than those of the peer-choice model for most goods being evaluated (i.e., most data points are on the own-choice side of the line representing equality of errors).

We also show that the accuracy of our peer-choice approach is moderated by the level of choice dependence within respondents' social circles. In particular, information increases as social circle members become mutually more independent, so that smaller independent circles can impart as much information as larger circles in which members' choices are more dependent (i.e., more interrelated). Consequently, our model performs best in situations where social circles are large and diverse. Thus, future research should investigate if the accuracy of our peer-choice conjoint analysis approach can be further improved by screening for respondents who have large and diverse social circles.

Finally, we want to stress that, although we compared peer-only with own-only choices in these studies, our peer-choice method can, in fact, be combined with a traditional (i.e., own-choice) conjoint analysis approach to produce even more accurate estimates of product preference shares. That is, we do not preclude the use of personal choice questions in conjoint analysis, but rather advocate for the addition of peer-choice questions, as doing so will yield more precise overall product preference share predictions while preserving the power of traditional conjoint analysis.

REFERENCES

The Limits of Collective Intelligence roup Dynamics of Binary Choice and Belief Formation

Becker, Joshua, Devon Brackbill, and Damon Centola (2017), "Network Dynamics of Social Influence in the Wisdom of Crowds," *Proceedings of the National Academy of Sciences*, 114 (26), E5070–6.

Becker, Joshua, Ethan Porter, and Damon Centola (2019), "The Wisdom of Partisan Crowds," *Proceedings of the National Academy of Sciences* 116 (22), 10717–22.

DeGroot, M. H. (1974), "Reaching a Consensus," *Journal of the American Statistical Association*, 69 (345), 118–21.

Golub, Benjamin, and Matthew O. Jackson (2010), "Naive Learning in Social Networks and the Wisdom of Crowds," *American Economic Journal: Microeconomics*, 2 (1), 112–49.

Katz, Elihu and Paul F. Lazarsfeld (1955), *Personal Influence: The Part Played by People in the Flow of Mass Communications*, Glencoe, IL: Free Press.

Surowiecki, James (2004), *The Wisdom of Crowds*, New York, NY: Random House.

Van de Velde, Liesbeth, Wim Verbeke, Michael Popp, Jeroen Buysse, and Guido Van Huylenbroeck (2009), "Perceived Importance of Fuel Characteristics and its Match with Consumer Beliefs About Biofuels in Belgium," *Energy Policy*, 37 (8), 3183–93.

The Statistical Self-Fulfilling Selection Fallacy When Markets Inadvertently Reinforce False Beliefs

Gilovich, Thomas (1991), *How We Know What Isn't So: The Fallibility of Human Reason in Everyday Life*, New York, NY: Free Press.

Gilovich, Thomas, Dale Griffin, and Daniel Kahneman, eds. (2002), *Heuristics and Biases: The Psychology of Intuitive Judgment*, Cambridge, UK: Cambridge University Press.

In Groups (vs. Markets) We Trust Relying on Groups or Information Markets to Aggregate Knowledge

Cowgill, Bo, and Eric Zitzewitz (2015), "Corporate Prediction Markets: Evidence From Google, Ford, and Firm X," *Review of Economic Studies*, 82 (4), 1309–41.

Gillen, Benjamin J., Charles R. Plott, and Matthew Shum (2013), "Inside Intel: Sales Forecasting Using An Information Aggregation Mechanism," *Working Paper*, Pasadena: California Institute of Technology.

Hankins, Richard, and Alison Lee (2011), "Crowd Sourcing and Prediction Markets," *CHI*, 11, 1–5.

Salas, Eduardo, Nancy J. Cooke, and Michael A. Rosen (2008), "On Teams, Teamwork, and Team Performance: Discoveries and Developments," *Human Factors*, 50 (3), 540–7.

Peer-Predicted-Preference Conjoint Analysis Tapping Into Consumers' Knowledge of their Peers' Preferences to Improve Market Share Estimates

Dahan, Ely, Adlar J. Kim, Andrew W. Lo, Tomaso Poggio, and Nicholas Chan (2011), "Securities Trading of Concepts (STOC)," *Journal of Marketing Research*, 48 (June), 497–517.

Kim, Hye-Jin, Young-Hoon Park, Eric T. Bradlow, and Min Ding (2014), "PIE: A Holistic Preference Concept and Measurement Model," *Journal of Marketing Research*, 51 (3), 335–51.

Narayan, Vishal, Vithala R. Rao, and Carolyne Saunders (2011), "How Peer Influence Affects Attribute Preferences: A Bayesian Updating Mechanism," *Marketing Science*, 30 (2), 368–84.

Rothschild, David, and Justin Wolfers (2013), "Forecasting Elections: Voter Intentions versus Expectations," *NBER Working Paper*, https://users.nber.org/~jwolfers/papers/VoterExpectations.pdf

Vélez, Natalia, Yuan Chang Leong, Chelsey Pan, Jamil Zaki, and Hyowon Gweon (2016), "Learning and Making Novel Predictions About Others' Preferences," *Proceedings of the 38th Annual Conference of the Cognitive Science Society*, 1–6.

The Value of What's Hidden: Understanding the Process and Consequences of Hiding Information About the Self and Consumption

Chairs: Soo Kim, Cornell University, USA
Peggy J. Liu, University of Pittsburgh, USA
Kate E. Min, Cornell University, USA

Paper #1: Hiding and Spending: Secret Consumer Behaviors and Pro-Relationship Spending

Danielle Brick, University of New Hampshire, USA
Kelley Gullo, Duke University, USA
Gavan Fitzsimons, Duke University, USA

Paper #2: Reminder Avoidance: Why People Hesitate to Disclose Their Insecurities to Friends

Soo Kim, Cornell University, USA
Peggy J. Liu, University of Pittsburgh, USA
Kate E. Min, Cornell University, USA

Paper #3: Hidden in Plain Sight: Consumer Response to Pseudo-Secrets in Marketing

Dafna Goor, Harvard University, USA
Anat Keinan, Boston University, USA
Nir Halevy, Stanford University, USA
Michael I. Norton, Harvard University, USA

SESSION OVERVIEW

With people, there is always more than what meets the eye. Secrets and hidden information are simply part of human life. However, perhaps due to the difficulty of studying what people wish to keep hidden, research on secrets is scarce and generally treats secrets as a stigmatized, negative concept (Slepian, Chun, and Mason 2017), with few exceptions (e.g., Rodas and John 2020).

The three papers in this session seek to allow the audience—consumers and managers alike—to develop a more perceptive understanding of what motivates people to hide or reveal information, and of the unexpected means that offer them a sense of privacy. It also seeks to further destigmatize the concept of secrets and hidden information by discussing the positive interpersonal consequences as well as the marketing impact of secret or pseudo-secret consumption.

The first paper (Brick, Gullo, and Fitzsimons) starts off the session by investigating whether keeping consumer behaviors a secret from one's partner can have positive outcomes for the relationship. Specifically, this paper investigates whether guilt from keeping consumption behaviors hidden can lead to increased pro-relationship spending. Across three studies, the authors find evidence to support this prediction and, using dyadic data from both members of a couple, find that greater pro-relationship spending leads to greater satisfaction with that spending on the part of the partner.

The second paper (Kim, Liu, and Min) follows by identifying one reason people may hide certain information from close others (i.e., friends). Five studies show that, although people normally prefer to self-disclose to friends over strangers, they dampen this tendency when disclosing their personal insecurities. The authors demonstrate that people may be less forthcoming with friends for insecurity-disclosure (vs. other disclosures) due to beliefs that they will be more likely to encounter painful reminders of disclosed contents (i.e., personal insecurities) if disclosed to friends than strangers.

The third paper then pivots to examining the implications of secrets on marketing. Specifically, the third paper (Goor, Keinan, Halevy, and Norton) concludes the session by demonstrating consumers' favorable reactions to "pseudo-secret" products, such as secret menus and "speakeasy" venues. Across six studies, the authors find

that consumption of such "pseudo-secret" products increases consumers' WOM and actual purchases compared to non-secret products, due to pseudo-secret products' capacity to enhance consumers' perception that they are the hub of the information wheel amongst their peers.

To sum, across three papers in advanced stages (14 studies), this session aims to appeal to both consumers and managers who seek to understand the process and the consequences of secrets and hidden nuggets of information.

Hiding and Spending: Secret Consumer Behaviors and Pro-Relationship Spending

EXTENDED ABSTRACT

You had an indulgent lunch, an extra drink with friends, or bought a pair of shoes, and didn't tell your partner about this consumption—it's your little secret. Are these types of secrets bad for relationships? Although a fair amount of research suggests that secrets within relationships are associated with negative consequences, including greater guilt (Caughlin et al. 2009; Kelly and Yip 2006; Lane and Wegner 1995; Simmel 1950), much of this research has focused on emotionally-laden, traumatic, or taboo secrets and ignored the role of consumer behavior in relationships. In line with research that suggests small deceptions can improve relationship outcomes (e.g., white lies: Argo and Shiv 2011), we suggest that secret consumption may actually have positive outcomes for relationships. Specifically, we examine how feelings of guilt from keeping consumption as a secret from a romantic partner can drive pro-relationship spending. Guilt, a "moral" emotion, motivates people to compensate for a perceived transgression (e.g., Tangney and Dearing 2003). We suggest that one way people might respond to guilt from secret consumption is by investing more spending toward the relationship, such as through gifts. This spending can, in turn, make the partner more satisfied.

We test these predictions across several studies. First, in **Study 1**, we recruited couples at a farmer's market to test our premise that people actually keep consumption secrets from their romantic partners. We asked both members of couples (119 couples, 238 individuals, M_{age}=41 years) to describe a recent time when they kept a consumption secret from their partner and their partner still does not know about it. Indeed, 90% of participants were able to provide an example, suggesting that this is a common consumer phenomenon. Further, the majority of responses were about relatively mundane behavior. The next two studies test our predictions about how such consumption secrets within the relationship can affect pro-relationship spending.

In **Study 2**, we manipulated secret consumption using a scenario to tightly test the effects of secret consumption on pro-relationship spending. Specifically, 272 participants (M_{age}=36 years) from MTurk were asked to imagine that they found more money in their Amazon account than they expected, and they decided to buy something online. Depending on randomized condition, participants were then asked to imagine either that they told their partner about the purchase (control condition) or decided not to tell their partner (secret condition). Participants indicated how guilty they would feel (7-point

Likert scale). Next, participants were shown two new subscription services: one was for a "date night" subscription that they could use with their partner and the other was for a personal "hobby" subscription. They were told that they would receive 15 virtual raffle tickets to use toward winning a $50 gift card for one of the services. The amount of raffle tickets put toward the date night subscription served as our dependent variable and measure of pro-relationship spending. Results revealed that people who imagined keeping a consumption secret from their partner put significantly more of their raffle tickets toward the date box than did people who imagined telling their partner ($p<.05$). People in the secret condition reported significantly greater guilt than did people who imagined telling their partner about their purchase ($p< .01$), and mediation analyses revealed that guilt mediated the link between secret consumption and pro-relationship spending.

In **Study 3**, we used dyadic data to examine whether greater guilt from real secret consumer behavior is associated with greater real-life pro-relationship spending, operationalized as spending on the partner for Valentine's Day. In this study, we also examine the downstream consequences of secret consumer behaviors and pro-relationship spending from the partner's perspective. Each member of a romantic couple was recruited by an online sampling panel as part of a larger paid study on relationships. One hundred forty-one individuals successfully completed this study (M_{age}=53 years). Participants were asked to recall and describe a recent time that they engaged in a consumption activity and intentionally did not tell their partner about it. They were then asked how guilty they felt for the consumption activity and how guilty they felt for not telling their partner about it (9-point Likert scales). We next asked participants to think about previous years, and indicate how much money, time, and money spent on gifts they spent on Valentine's Day this year compared to previous years (1=a lot less to 7=a lot more; α=.89). Next, we asked participants how satisfied they were with what they did for their partner and how indulgent were the gifts/activities they gave to their partner. Finally, to assess partner satisfaction with pro-relationship spending, we asked participants how satisfied they were with what their partner did for them for Valentine's Day. Because this is dyadic data, we used multi-level modeling with individuals nested within couples (Kenny, Kashy, and Cook 2006). In line with the findings from study 2, greater guilt from a recent secret consumption activity was significantly associated with greater Valentine's Day spending ($p<.05$). Greater guilt from a recent secret consumption activity was also significantly associated with greater indulgent gifts/activities ($p<.05$) and greater satisfaction with how Valentine's Day went this year ($p<.05$). Using the actor-partner interdependence model (APIM; Kenny et al. 2006), we examined the downstream effects of secret consumer behaviors on the partner. As actors reported spending more on Valentine's Day this year relative to other years, which was significantly related to guilt from keeping their consumption activity a secret, partners reported significantly greater satisfaction with how Valentine's Day went this year ($p<.01$), suggesting additional positive downstream consequences of secret consumption within relationships.

Across three studies, we examine secret consumer behavior in relationships. We find that although keeping a consumption activity from one's partner can lead to greater guilt, this guilt can have positive outcomes for the relationship, specifically in terms of greater pro-relationship spending. Further, using data from couples reporting on real behavior, we found that greater pro-relationship spending was associated with greater satisfaction on the part of the partner, highlighting additional positive downstream consequences of secret consumer behaviors in relationships.

Reminder Avoidance: Why People Hesitate to Disclose Their Insecurities to Friends

EXTENDED ABSTRACT

Many of us try to keep our personal insecurities well-buried. However, they still burden our minds until the burden becomes too large to carry alone, such that we yearn to release them. Indeed, a survey of 100 U.S. residents—conducted as part of this research—reveals that of the 96 people who reported possessing personal insecurities, more than 70% wished they could get their insecurities off their chest and more than 60% wished they could disclose them to another person.

But, to whom could people disclose their insecurities and hopefully unburden themselves of the associated psychological pain? One instinctive audience may be friends. Indeed, people generally turn more to friends than strangers to self-disclose (Chaikin and Derlega 1974; Gaebelein 1976; Jourard and Lasakow 1958) and believe that if they were to disclose hardships, they would more easily receive help from friends than strangers (Deri, Stein, and Bohns 2019). Such promised support seemingly points to the possibility of people self-disclosing their insecurities—self-aspects that likely require support—to friends more than they would for other types of disclosures.

However, Rubin (1975)'s "passing strangers" effect introduces an interesting alternative perspective. In his work, out-of-towners self-disclosed more intimately to an unacquainted research assistant (RA)—a stranger—than local residents. Rubin (1975) speculated that out-of-towners may have disclosed to the RA their intimate personal information they would not even share with people they normally encounter because they could unburden such information without the concern of having to face or think about this RA or the consequences of disclosed information again.

We build upon this perspective and posit that there is something disconcerting about disclosing one's very private personal information, such as personal insecurities, to those one repeatedly interacts with (e.g., friends). That is, disclosing personal insecurities to friends increases the risk of being reminded of these already reminder-prone self-aspects. Friends may encourage the discloser to elaborate on the disclosed insecurities to understand, help, or speculate together (Rose 2002) or repeatedly bring them up over the course of the relationship. All these interactions could escalate the risk of being painfully reminded of the disclosed contents. Hence, we hypothesize and demonstrate in five pre-registered studies that, due to the risk of painful reminders of disclosed contents, people dampen their usual tendency to turn more to friends than strangers for self-disclosure when disclosing personal insecurities (vs. other information).

Study 1 provided initial evidence for our effect in a 2-group (self-disclosure: insecurity, neutral) between-subjects design. 100 friend-pairs (*N*=200) were recruited. Participants in the insecurity condition wrote about self-aspects that make them feel insecure. Those in the neutral condition wrote about their daily routine. They were then told that, as part of this "social interaction" study, they would need to read what they have written to another person and that they could choose between "*another participant who is unacquainted with you*" and "*the friend you came with*" as their disclosure-audience. As hypothesized, participants disclosing their insecurity (vs. neutral personal information) were significantly less likely to choose their own friend as their audience (insecurity:76.2% vs. neutral:91.6%), B=-1.22, *p*=.005.

Study 2 (*N*=608) demonstrated that this effect does not occur for any negatively-valenced self-disclosure using a 2-group (self-disclosure: personal insecurity, societal insecurity) between-subjects design. The personal insecurity condition was the same as in study

1. Participants in the societal insecurity condition wrote about something they read in the news that makes them feel insecure about society (negative but non-personal disclosure). Participants then indicated their preferred disclosure-audience (1=*stranger* to 7=*friend*). As expected, participants disclosing personal (vs. societal) insecurities showed significantly lessened preference for a friend as their audience ($M_{personal}$=4.92 vs. $M_{societal}$=5.60), $F(1, 606)$=18.38, $p<.001$.

Study 3 (*N*=202) conceptually replicated study 1 and provided initial support that the dampened friend-preference for insecurity-disclosure occurs among those more prone to rumination (and thus more likely to wish to avoid disclosed-content reminders), using a 2 (self-disclosure: insecurity, neutral) × rumination-tendency (measured) between-subjects design. Participants wrote about either their insecurities or neutral personal information (recent grocery-trip), completed the Rumination Tendency Scale (Brinker and Dozois 2009), and indicated their disclosure-audience (1=*stranger* to 7=*friend*). Participants disclosing their insecurity (vs. neutral personal information) were again less likely to prefer a friend as their audience ($M_{insecurity}$=4.53 vs. $M_{neutral}$=5.10), B = -.57, p = .06. Furthermore, this effect surfaced for those highly prone to rumination: disclosure topic × rumination-tendency interaction, B=-.70, SE=.28, t=-2.51, p=.013 (Johnson-Neyman point=4.87).

Study 4 (*N*=404) provided further support for our account that anticipated risk of painful reminders of disclosed-content decreases one's preference for friends over strangers as their disclosure-audience via mediation. We used a 2-group (non-disclosure reason: insecurity-trigger, no-opportunity) between-subjects design and measured participants' anticipated pain from reminders. In the insecurity-trigger condition, participants described a personal challenge they have not disclosed because it triggers insecurities; those in the no-opportunity condition described a personal challenge they have not disclosed because they did not yet have the opportunity to do so. Then participants indicated their disclosure-audience (1=*stranger* to 7=*friend*) and indicated how painful reminders of their stories would be (2-item; *r*=.93). Consistent with our theory, participants preferred friends less for personal challenge-stories undisclosed due to insecurity-triggers (vs. no-opportunity), ($M_{insecurity-trigger}$=4.24 vs. $M_{no-opportunity}$=5.14), $F(1, 402)$=15.94, $p<.001$. This effect was mediated by participants' anticipated pain from reminders, B =-.18, SE=.07, 95% CI=[-.34, -.05].

Study 5 (*N*=606) provided further evidence that risk of painful disclosed-content reminders drives our effect. We used a 2-group (self-disclosure: insecurity, neutral) between-subjects design. The self-disclosure procedure was similar to study 3's. However, the choice for disclosure-audience was between two equally-supportive friends differing in one aspect: Friend A who tends to bring up previously-shared stories and Friend B who does not. Participants disclosing insecurities (vs. neutral personal information) were more likely to choose Friend B, who tends not to bring up previously-shared stories (insecurity:78.4% vs. neutral:65.7%), B=.65, $p<.001$.

Altogether, our results contribute to the broad consumer psychology literature on how consumers manage secrets by showing that, when disclosing personal secrets (e.g., insecurities), they turn away from friends because, ironically, even their friendly helping gestures could remind them of the painful disclosed-content.

Hidden in Plain Sight: Consumer Response to Pseudo-Secrets in Marketing

EXTENDED ABSTRACT

The marketing and consumption of secret products and experiences has become an emerging cultural phenomenon in retail, hospitality, food and beverages, fashion and entertainment. Restaurants ranging from gourmet Michelin-starred to mainstream fast-food chains offer secret-menu items, and hidden shops and "speakeasy" bars have camouflaged entrances and secret passcodes. Paradoxically, many of these hidden secret items and places have become famous for being secrets, and interestingly, the majority of secret bars and shops are located in central public areas - hiding in plain sight.

We label these hidden but publicly available products as "pseudo-secrets" and demonstrate their positive impact on word-of-mouth and actual purchase behavior in the marketplace. We demonstrate that this effect is mediated by feelings of social centrality, i.e., the subjective feeling of being connected to others in the network and feeling like information hubs, and moderated by how the information was obtained. Additionally, we explore an important individual characteristic that could moderate consumers' propensities to disseminate information in the marketplace: Market Mavens (Feick and Price 1987).

Six field and lab studies test the pseudo-secrecy phenomenon.

Exploratory interviews (N=33) suggested that pseudo-secrets exist in various product categories. Respondents mentioned examples of hidden shops that were nestled in central shopping areas and secret-menus that were offered by big fast-food chains. They described recurring cues that create a sense of hidden-yet-inviting products and experiences, such as camouflaged entrances of shops which also provided their actual address and products online. Importantly, respondents noted that knowing about pseudo-secrets made them feel "in the know" and like insiders, portraying a phenomenon that is first and foremost a social enterprise.

In a **pilot study** (N=177), we surveyed shoppers at the rapper Kendrick Lamar's pop-up shop, located in a central area. Although the shop did not have a sign or any indication as to what merchandize it was offering, its location, opening dates, and merchandise were available online and on social media. Perceiving the pop-up shop as more secretive increased consumers' intentions to buy branded items (*b*=.169, *t*=2.943, *p*=.004, 95% CI=[.056,.283]).

In **Study 1**, visitors at a university campus tour (N=2,415) received a 15% discount coupon for the university store. Since the store has a small sign at the entrance, we were able to describe it either as a pseudo-secret ("easy to miss") or as visible and conspicuous ("hard to miss"). Overall, 4.7% of the visitors redeemed tour coupons. As predicted, framing the store as pseudo-secret increased actual purchases (redemption rate 6.3%) compared to framing it as well-known (4.2%; χ^2=5.12, *p*=.024) or control condition (4.1%; χ^2=5.93, *p*=.015), indicating that pseudo-secrets increased brand interest.

In **Study 2**, different visitors (N=764) at the same university tour were asked to help improve future tours by expressing their interest in expanding the tour to focus on the university's library. Describing the library's back door as a secret small door (vs. small door) increased visitors' interest in taking its photo to show their friends ($F(1,762)$=24.22, *p*<.001). The manipulation did not affect intentions to show photos of the iconic main door to friends ($F(1,762)$=.12, *p*=.724), indicating that pseudo-secrets (vs. non-secrets) increase WOM intentions about products associated with that information.

Studies 3 and 4 examined the mediating role of feelings of centrality. Participants used a social network heat-map to indicate how central they felt.

Study 3 had four conditions. 324 adults (67.6% women; M_{age}=35.5) read about a pseudo-secret (vs. not-secret) bar. The bar entrance was through a back door of (vs. next to) an ice-cream shop. In two additional pseudo-secret conditions manipulating the source

of information, participants imagined that they heard about the bar directly from a friend (vs. overheard their friends talking). Pseudo-secrets increased both interest in going to the bar (p's<.001) and WOM likelihood (p's<.003) compared to the non-secrets. Learning about the pseudo-secret bar directly from a friend further increased purchase intentions (p's<.044) and WOM intentions (compared to non-secret p=.044). Interestingly, learning about the bar indirectly (overhearing) increased purchase interest (compared to non-secret, p<.001) but decreased WOM intentions (compared to pseudo-secret control, p=.042), highlighting the important role of feelings of centrality. Mediation analyses (PROCESS, Model 4) showed significant effects on purchase interest and WOM via feelings of centrality.

Study 4 had a 2 (pseudo-secret vs. non-secret) × 2 (market-maven) between-subjects design. 439 participants (44.4% female; M_{age}=36.6) imagined that a restaurant near them serves an unlimited number of a secret-menu house burger (vs. house burger) that does not appear (vs. appears) on the restaurant's menu. The results revealed two positive effects of pseudo-secrecy and market mavens on both purchase interest and WOM intentions (p's<.001). The brand information × market maven interaction did not affect purchase interest (p=.473). However, a negative effect on WOM (p=.001) indicated that pseudo-secrets have a stronger effect among non-mavens who scored 5.64 or lower on the 1-to-7 market maven scale, increasing their likelihood to spread WOM. A moderated mediation analysis revealed a significant moderating effect of market mavens on WOM through feelings of centrality (PROCESS, Model 7; a×b=-.0509, SE=.0257, 95% CI=[-.1030,-.0021]).

In addition to the practical implications of understanding how to design pseudo-secret brand information to generate brand engagement, our research makes important theoretical contributions. First, it advances research on secret (i.e., private) consumption (Thomas and Jewell 2019) by demonstrating an opposite phenomenon – products that are designed to offer a secretive experience, but lend consumers with a gift (i.e., seemingly exclusive knowledge) that they can pass on to others rather than hide it. It also contributes to research on social networks (Watts and Dodds 2007) by demonstrating that consumers' subjective experience of feeling socially central, rather than their objective centrality, may drive information flow in networks. Thus, we suggest that beyond their informational value, pseudo-secrets carry an important symbolic social value which can resolve an inherent tension between the desire for exclusive products and affiliations and the discomfort associated with excluding others (Bellezza and Keinan 2014; Legate et al. 2013). Finally, our work extends research on WOM behavior (Berger 2014) by highlighting the influence of the source of the information on WOM.

REFERENCES

Argo, Jennifer J. and Baba Shiv (2011), "Are White Lies as Innocuous as We Think?," *Journal of Consumer Research*, 38 (6), 1093-102.

Bellezza, Silvia and Anat Keinan (2014), "Brand Tourists: How Non–Core Users Enhance the Brand Image by Eliciting Pride," *Journal of Consumer Research*, 41 (2), 397-417.

Berger, Jonah (2014), "Word of Mouth and Interpersonal Communication: A Review and Directions for Future Research," *Journal of Consumer Psychology*, 24 (4), 586-607.

Brinker, Jay K. and David J. A. Dozois (2009), "Ruminative Thought Style and Depressed Mood," *Journal of Clinical Psychology*, 65 (1), 1-19.

Caughlin, John P., Allison M. Scott, Laura E. Miller, and Veronica Hefner (2009), "Putative Secrets: When Information Is Supposedly a Secret," *Journal of Social and Personal Relationships*, 26 (5), 713-43.

Chaikin, Alan L. and Valerian J. Derlega (1974), "Variables Affecting the Appropriateness of Self-Disclosure," *Journal of Consulting and Clinical Psychology*, 42 (4), 588-93.

Deri, Sebastian, Daniel H. Stein, and Vanessa K. Bohns (2019), "With a Little Help from My Friends (and Strangers): Closeness as a Moderator of the Underestimation-of-Compliance Effect," *Journal of Experimental Social Psychology*, 82, 6-15.

Feick, Lawrence F. and Linda L. Price (1987), "The Market Maven: A Diffuser of Marketplace Information," *Journal of Marketing*, 51 (1), 83-97.

Gaebelein, Jacquelyn W. (1976), "Self-Disclosure among Friends, Acquaintances, and Strangers," *Psychological Reports*, 38 (3), 967-70.

Jourard, Sidney M. and Paul Lasakow (1958), "Some Factors in Self-Disclosure," *Journal of Abnormal and Social Psychology*, 56 (1), 91-98.

Kelly, Anita E. and Jonathan J. Yip (2006), "Is Keeping a Secret or Being a Secretive Person Linked to Psychological Symptoms?," *Journal of Personality*, 74 (5), 1349-70.

Kenny, David A., Deborah A. Kashy, and William L. Cook (2006), "The Analysis of Dyadic Data," *New York: Guilford*.

Lane, Julie D. and Daniel M. Wegner (1995), "The Cognitive Consequences of Secrecy," *Journal of Personality and Social Psychology*, 69 (2), 237-53.

Legate, Nicole, Cody R. DeHaan, Netta Weinstein, and Richard M Ryan (2013), "Hurting You Hurts Me Too: The Psychological Costs of Complying with Ostracism," *Psychological Science*, 24 (4), 583-88.

Rodas, Maria A. and Deborah Roedder John (2020), "The Secrecy Effect: Secret Consumption Increases Women's Product Evaluations and Choice," *Journal of Consumer Research*, forthcoming.

Rose, Amanda J. (2002), "Co–Rumination in the Friendships of Girls and Boys," *Child Development*, 73 (6), 1830-43.

Rubin, Zick (1975), "Disclosing Oneself to a Stranger: Reciprocity and Its Limits," *Journal of Experimental Social Psychology*, 11 (3), 233-60.

Simmel, Georg (1950), "The Secret and the Secret Society," in *The Sociology of Georg Simmel*, ed. Kurt H. Wolff, New York: Free Press of Glencoe, 307-76.

Slepian, Michael L., Jinseok S. Chun, and Malia F. Mason (2017), "The Experience of Secrecy," *Journal of Personality and Social Psychology*, 113 (1), 1-33.

Tangney, June Price and Ronda L. Dearing (2003), *Shame and Guilt*, New York: Guilford Press.

Thomas, Veronica L. and Robert D. Jewell (2019), "I Can't Get You out of My Head: The Influence of Secrecy on Consumers' Self-Brand Connections," *Journal of Consumer Psychology*, 29 (3), 463-71.

Watts, Duncan J. and Peter Sheridan Dodds (2007), "Influentials, Networks, and Public Opinion Formation," *Journal of Consumer Research*, 34 (4), 441-58.

Novel Insights for Enduring Concerns: The Wisdom of Lay Theories

Chairs: Gita V. Johar, Columbia University, USA
Shilpa Madan, Virginia Tech, USA

Paper #1: Intergenerational Effects of the Unhealthy = Taste Intuition on BMI: An Exploration of Food Practices and Outcomes

Barbara Briers, Vlerick Business School, Belgium
Young Eun Huh, Korea Advanced Institute of Science and Technology, South Korea
Elaine Chan, Nanyang Technological University, Singapore
Anirban Mukhopadhyay, Hong Kong University of Science and Technology, China

Paper #2: It Isn't Easy Being Green: Lay Theories of Wealth and Happiness Shape Support for the Environment

Shilpa Madan, Virginia Tech, USA
Krishna Savani, Nanyang Technological University, Singapore
Steve Su, VilleFranche Consulting, France
Michael Morris, Columbia University, USA

Paper #3: No Pain, No Gain: Protestant Work Ethic and the Adoption of Autonomous Products

Emanuel de Bellis, University of St. Gallen, Switzerland
Gita V. Johar, Columbia University, USA
Nicola Schweitzer, UBS, Switzerland

Paper #4: Brand Extension Failure and Parent Brand Penalty: The Role of Implicit Theories

Shailendra Pratap Jain, University of Washington, USA
Pragya Mathur, City University of New York, USA
Matthew Isaac, Seattle University, USA
Huifang Mao, Iowa State University, USA
Durairaj Maheswaran, New York University, USA

SESSION OVERVIEW

Consumers are increasingly grappling with challenging consumption-related issues that impact their health (e.g., processed and sugar laden foods), their environment (e.g., plastic bags), their understanding of physical tasks (e.g., autonomous products), and their choices in the marketplace (e.g., too many brand extensions). Building on extant literature that finds lay theories as a crucial determinant of real world consumer outcomes (such as obesity, McFerran and Mukhopadhyay 2013), the four papers in this session examine lay theories that shape responses to consequential issues that not only affect individuals, society, and policymakers, but also have clear implications for brand and marketing strategy. Bringing alive the conference theme of *"Rendezvous,"* this session brings together consumer researchers from three continents to showcase the wisdom of consumers' naive theories in providing novel insights to enduring and significant issues including obesity, environmental degradation, autonomous products, and brand extension failures.

The first two papers focus on how their lay theories can nudge consumers to make better (or worse) choices for their well-being. Briers et al. present a unifying framework to underscore the role that parents' unhealthy = tasty lay belief plays in determining their children's BMI. They identify the use of extrinsic rewards as the psychological process that drives this relationship, while ruling out alternative explanations. Madan et al. uncover a novel antecedent to reduce consumers' resistance to environmental taxes — their lay belief about the relationship between wealth and happiness. Drawing from hedonic adaptation theory, they identify expectations of adjustment as the underlying mechanism and propose recommendations

for policy makers to increase support for environmental taxes on both sides of the partisan divide.

The next two papers take the firms' perspective to ask how lay theories shape consumer choice in emerging domains such as autonomous products and brand extension failures. De Bellis, Johar, and Schweitzer find that one reason behind consumers' lukewarm acceptance of highly efficient and convenient autonomous products is their lay theory that only effort and hard work yield desired outcomes. To drive consumer adoption, they recommend that firms should emphasize the idea that autonomous products can free up time for more meaningful pursuits. Applying the lens of lay theories to study the pervasive issue of brand extension failures, Jain et al. uncover that consumers' lay theories about malleability and fixedness of personality predict the extent to which consumers punish the parent brand when an extension failure occurs. Building on entitativity literature, they suggest that breaking the perception of the brand as a homogenous group can mitigate the risk of extension failure for the parent brand.

This special session integrates several areas of interest highlighted in the call-for-papers (e.g., technology, identity, obesity) under the umbrella of lay theories to highlight the meaningful role that consumers' lay theories play in determining substantive consumer behavior outcomes. We hope to encourage an engaging conversation on the implications of consumer characteristics such as lay theories in influencing consumer behavior and to spark ideas for future research.

Intergenerational Effects of the Unhealthy = Taste Intuition on BMI: An Exploration of Food Practices and Outcomes

EXTENDED ABSTRACT

Childhood obesity is a critical health concern worldwide (WHO 2018), and sets the stage for a lifelong struggle with weight and eating. The influence of parents is considered as primary, given that parents during early childhood act as gatekeepers and role models around food (McCaffree 2003). Previous research has looked at the influence of parents' demographics, parents' nutritional knowledge, general parenting style, and food parenting practices. This research investigates how parents' beliefs about the trade-off between healthfulness and tastiness in food (i.e., the Unhealthy = Tasty Intuition, "UTI"; Raghunathan, Naylor, and Hoyer 2005) affects their children's BMI.

Taste is generally the most important attribute in food choice (Glanz et al. 1998). When parents hold a strong belief that healthy food is not tasty, they may consider that their children need an extra incentive to eat food that is healthy but less tasty. Hence, higher UTI parents may be more inclined to offer their children an extrinsic reward in exchange for eating healthfully. However, this strategy might backfire, as providing external rewards signals that the healthy food consumption is a negative experience that needs to be compensated (Birch et al. 1982). As a result, the use of external rewards might ironically reduce healthy food consumption thereby increasing BMI. Thus, we predict that parents' UTI positively affects their children's BMI, which is mediated by the extent to which parents use an extrinsic reward to induce healthy eating and the amount of healthy

food consumed by their children. We tested this proposition in four studies.

In study 1, 980 MTurk workers who were the main caretaker of a child (age 6-11) participated in the survey. Respondents indicated the child's age, gender, height, weight, their child's fruits and vegetables consumption and their likelihood to offer their child an external reward for eating healthy. Next, we measured respondents' UTI with three items (e.g., "Things that are good for me rarely taste good"; Raghunathan et al. 2005), their own height and weight. Controlling for parents' BMI, children's age and gender, linear regression analysis showed that the more parents believed in UTI, the higher their children's BMI was ($\beta = .86$, $SE = .16$, $t = 5.26$, $p < .001$). Further, bootstrap analyses (Hayes 2013, Model 6) showed that the relationship between the parent's UTI and the child's BMI was serially mediated by the use of an extrinsic reward to induce healthy eating and the amount of fruits and vegetables consumed by the child (a_1 x d_{21} x b_2 indirect effect = .010, bootstrap se = .0053, bias-corrected bootstrap CI [0.0019; 0.0225]).

Study 2 aimed to replicate the results of study 1, while controlling for two other important parental influences on children's BMI: parent's education and how often they exercise. Using a similar survey as in study 1 (N = 938), results reassuringly showed a positive effect of parents' UTI on their child's BMI ($\beta = .25$, $SE = .13$, $t = 1.99$, $p < .05$), serially mediated by the use of external rewards, and the amount of healthy food consumed by the child (a_1 x d_{21} x b_2 indirect effect = .0088, bootstrap se = .0056, bias-corrected bootstrap CI [0.0002; 0.022]).

In study 3, we aimed to find causal evidence for the link between consumers' belief in the UTI and the likelihood to use external rewards for pushing healthier eating among children. We manipulated UTI by means of an article describing scientific research on healthy food being tasty (non-UTI) versus less tasty (UTI). A manipulation check with the same three UTI measures as before showed that it was successful ($\alpha = .89$; UTI = 2.82 versus non-UTI = 2.44, $F(1, 239) = 6.95$; $p = .009$). As dependent measure, we presented respondents with a babysitting scenario in which the 6-year old child refused to eat broccoli. An open-ended question asked the respondents what they would do to make the child eat the broccoli. Answers were coded as providing an external reward (1) versus not (0). Results showed no main effect of UTI on the likelihood to choose a rewarding strategy. Further exploratory analyses revealed that among respondents who had children of their own (i.e., parents), their rewarding strategy was not affected by UTI (UTI= 43.6% versus non-UTI= 51.6%), presumably because they were likely to use their pre-existing strategies to motivate their children (as shown in studies 1 and 2). Interestingly, among those respondents with no children, for whom the babysitting scenario presumably was more realistic, external rewards were more likely to be mentioned in the UTI condition (42.2%) compared to the non-UTI condition (21.7%; $\chi^2 = 5.97$; $p = .02$; overall interaction: $\beta = 1.29$, $p = .02$).

Inspired by study 3, study 4 only included respondents who had no children. This study used the same manipulation ($\alpha = .87$; UTI= 2.88 versus non-UTI= 2.36; $F(1, 205) = 11.06$; $p = .001$) and babysitting scenario. As dependent measure, we asked respondents how likely they were to offer the child an exchange in return for eating the broccoli. Next, we asked them to rate the likelihood of nine different strategies, of which four were related to providing an external reward ($\alpha = .72$): reward and threat with food, reward and threat with non-food, praise, scold, distraction, disguise, and making it fun. In line with our hypothesis, respondents in the UTI condition were marginally more likely to offer an exchange (UTI= 4.81 versus non-UTI= 4.28; $F(1, 205) = 3.60$; $p = .06$) and significantly more likely to offer

or threaten with a reward (UTI= 3.48 versus non-UTI= 3.19; $F(1, 205) = 4.61$; $p = .03$) than respondents in the non-UTI condition. For the other five strategies, we found no differences.

Overall, this research contributes to the literature on lay beliefs (McFerran and Mukhupadhyay 2013) and consumer socialization (Ward 1974; John 1999; Moore, Wilkie and Desrochers 2017). This integration allows us to present a unifying framework of the flow of influence, parents' beliefs → parents' actions → children's behaviors → children's outcomes, thereby sparking suggestions for potential interventions and future research.

It Isn't Easy Being Green: Lay Theories of Wealth and Happiness Shape Support for the Environment

EXTENDED ABSTRACT

A strong majority of Americans believe that the government is not doing enough to protect the environment but many of them are unwilling to support environmentally protective policies (Newport 2018). Many consumers may believe single use plastic is ruining marine life but not support a plastic bag ban (Raskin et al. 2020). For example, carbon emissions from transportation are a major source of greenhouse gases that contribute to climate change. One way to reduce them is to impose substantial tax on gasoline, which would reduce gasoline consumption. A key reason for this gap is that many people endorse environmentalist attitudes because it is socially desirable to do so, but a large fraction do not follow through with consistent actions because it is costly to do so.

What are the psychological levers for nudging consumers to support such environmental consumption taxes (in short *ecotaxes*)? Certainly, the personal and societal costs due to the ecotax are relevant. People's views about the significance of these costs might hinge on their theory about how happiness adapts to changes in wealth, which in this case refers to a reduction in discretionary income as a result of the ecotax. We propose that individuals differ sharply in their assumptions about how people's happiness changes with wealth — some assuming that happiness is dependent on wealth ("the more you have, the happier you are") and others assuming that it largely adapts ("after a certain threshold, changes in wealth do not bring similar changes in happiness").

Popular culture and scientific research provide plenty of evidence for both these points of view. Many believe that wealth brings well-being, and if not constant joy then at least a higher baseline. As Francoise Sagan (Hartley 2015) put it, "Money may not buy happiness, but I'd rather cry in a Jaguar than on a bus." In a survey, 73% Americans forecasted that they would be happier if they had more money (Carroll 2006). However, the belief that happiness adapts to changes in wealth is also widely held. Just as pleasant smells become less pleasurable after continued exposure, people get used to a higher income—the higher wealth becomes the new normal, not a reason for pleasure (Frederick and Loewenstein 1999). We propose that this lay theory is an important antecedent of differences in support for ecotaxes. The more people believe that happiness adapts to wealth, the more likely they are to support environmental consumption taxes because they consider ways in which individuals and organizations would adjust their behavior over time in response to the tax.

Eight studies provide converging support for these hypotheses. We first developed an 11-item scale to measure people's lay theories about wealth and happiness. Several studies established the predictive validity, convergent, discriminant, and test-retest reliability of the scale.

Study 1a tested if people's lay beliefs about wealth and happiness influenced their support for close to 100% increase in gasoline

tax. Four hundred five American citizens on MTurk completed the study. In line with the hypothesis, people who believed that happiness adapts to changes in wealth were more likely to support the policy (β = .22, $t(404)$ = 2.048, *p* = .041)

Studies 1b-1d (N = 198, 199, 205) replicated the findings in Study 1a with a wider variety of consumption taxes such as plastic bag tax, a disposable cup charge, and a processed foods tax. We also controlled for other alternative predictors of people's support for the environment and/or taxes such as environmental concern, political orientation, personal cost incurred due to the tax, materialism, and income. Consumers' lay beliefs about wealth and happiness predicted support for ecotaxes even when controlling for these constructs.

Studied 2a and 2b provided causal evidence for our hypothesis. Participants (N = 326, MTurk) either read an article advocating that happiness adapts to changes in wealth or that happiness changes with changes in wealth. They then indicated their willingness to support a multiple consumption taxes on gasoline, plastic, disposable cups, and processed foods. Consistent with our hypothesis, participants who read the adaptation article were more supportive of the consumption tax ($M_{WealthAdapt}$ = 4.37, $M_{WealthDependence}$ = 4.00, $t(324)$ = -1.99, *p* = .048). Further, the indirect effect through the perception that the society will adjust its consumption habits in response to the tax was significant [B =.32, SE =.12, 95%CI [.09,.56]).

Study 3 provided additional evidence for adjustment as the underlying mechanism through mediation by moderation. Specifically, participants were told that funds generated from the tax would either be used to help the society adjust to a higher tax regime or not (e.g., an air ticket tax being used to develop the train network in the state versus being used to upgrade vending machines). We found that wealth-adaptation theorists supported the tax when the proceeds were used to facilitate societal adjustment (B = .71, SE = .29, $t(464)$ = 2.41, *p* = .016), but not when they were not used to support societal adjustment (B = -.35, SE = .24, $t(470)$ = -1.44, *p* = .15).

Finally, Study 4 sought to provide behavioral evidence through an incentive compatible design. We first measured participants' lay beliefs about wealth and happiness. After completing several unrelated tasks, participants were told that 1 out of every 100 participants would be getting a $10 bonus. They were then given the opportunity to divide this bonus between themselves and a lobbying organization working to get ecotaxes mentioned above implemented. We found that a stronger belief in wealth adaptation theory was associated with greater amounts pledged for the lobbying organization (B = .71, *95%* CI [.29, 1.13], SE = .19, $t(262)$ = 3.35, *p* = .001). This was significant even after controlling for age, gender, education, income, social class, and political orientation.

In sum, the present research identifies a novel construct—people's lay theories about wealth and happiness—and shows that it influences consumers' support for environmental taxes. We contribute to the science on lay theories and the antecedents of environmentally conscious behavior. More importantly, we contribute to the limited research in consumer behavior that focuses on curbing consumption.

No Pain, No Gain: Protestant Work Ethic and the Adoption of Autonomous Products

EXTENDED ABSTRACT

Autonomous products have entered our everyday lives. From cleaning the floor to mowing the lawn, consumers are increasingly able to delegate manual tasks to this novel type of technology. Autonomous products allow consumers to free themselves from mundane chores and promise unprecedented levels of efficiency and productivity. At the same time, anecdotal evidence suggests that even the completion of cumbersome tasks can be associated with satisfaction and positive feelings. Do consumers account for these feelings and if so, do they impact the adoption of these new technologies?

Consumer research has demonstrated that consumers experience autonomous products in ambivalent ways. Autonomous products are perceived as increasingly beneficial but risky (Rijsdijk and Hultink 2003; 2009). A recent focus has been on the role of product autonomy, which has been associated with consumer disempowerment and reduced feelings of control (André et al. 2018; Schmitt 2019; Wertenbroch et al. 2019). Autonomous products can also challenge identity-based consumption, as they limit consumers' ability to attribute the outcomes of consumption to themselves (Leung, Paolacci, and Puntoni 2018). Finally, completing a cumbersome task (e.g., a chore such as cleaning that is less central to one's identity) is positively associated with meaning in life (Baumeister et al. 2013).

According to our theorizing, the lay theory that effort and hard work yield desired outcomes—reflected in everyday idioms such as "no pain, no gain" and "nothing ventured, nothing gained"—holds an important key to understanding autonomous product adoption. This notion is ingrained in many cultures and denoted by the protestant work ethic (PWE; Cheng, Mukhopadhyay, and Schrift 2017). We posit that consumers high in PWE should be less likely to adopt autonomous products, as these products go against their core belief that hard work is needed to be successful. Given that the PWE is linked to feelings of meaningfulness (Pogson et al. 2003; Schnell and Becker 2006), we expect that consumers high in PWE derive more meaning from manual tasks, which reduces their willingness to delegate manual tasks to autonomous products.

A series of four studies, conducted in the field, online, and in the lab, shows that high (vs. low) PWE is related to lower adoption of autonomous products. We provide evidence for this effect by measuring and manipulating PWE across four autonomous product domains. Based on the idea that consumers' meaning from manual tasks drives the effect, we derive an intervention for firms to reverse the effect. Specifically, consumers high in PWE tend to choose autonomous over manual products when a meaningful task substitute is provided by highlighting that the use of autonomous products frees up time that can be used for more meaningful activities.

Study 1 explores the relationship between PWE and autonomous product adoption at the country level. We collected aggregated field data on consumers' readiness for automation (Economist Intelligence Unit 2018) and their acceptance of autonomous cars (KPMG 2018), which we correlated with consumers' PWE (Cheng et al. 2017) across major markets. Results showed that PWE is negatively associated with both readiness for automation (b = −14.53, $t(19)$ = 3.18, *p* = .005) and acceptance of autonomous cars (b = −5.49, $t(16)$ = 3.18, *p* = .006), even when controlling for GDP per capita and number of motor vehicles.

Study 2 examines the relationship between PWE and autonomous product adoption at the individual level. We conducted this study with 381 consumers from MTurk who participated in ostensibly two unrelated studies. In the first part, we measured consumers' PWE (Schrift et al. 2016) along with other measures. In the second part, consumers chose an autonomous versus manual product in either of three domains (cooking, cleaning, or lawn mowing). Controlling for desire for control, meaning in life, and domain expertise, we found a negative relationship between PWE and the choice of an autonomous product (b = −.30, z = 2.07, *p* = .04), with the effect being mediated by consumers' meaning from manual tasks.

Study 3 investigates the causal relationship between PWE and the adoption of autonomous products. We randomly assigned 105 consumers from MTurk to an either high or low PWE condition,

employing a quotes-ranking task to induce a temporary state of PWE (Cheng et al. 2017). Subsequently, we asked consumers to choose between an autonomous versus manual cleaning device. Whereas 62.3% of consumers chose the autonomous product in the low PWE condition, only 42.3% did so in the high PWE condition (χ^2(1, 105) = 4.19, p = .04). These results were robust when controlling for identity relevance of the task (Leung et al. 2019).

Study 4 aims at reversing the previously shown effect by providing a meaningful task substitute to consumers. We conducted a lab study with 174 students to explore the effectiveness of this intervention. Participants completed the quotes-ranking task of Study 3, before being randomly assigned to one of two conditions. Whereas the control condition entailed the same product description as in Study 2, the meaningful condition entailed one extra attribute in the autonomous product description (i.e., "allows you to spend time on more meaningful things"). Results showed a significant interaction between PWE and meaningful task substitute (b = .34, z = 2.15, p = .03). In the control condition, more consumers chose the autonomous product in the low PWE condition (52.5%) than in the high PWE condition (44.2%). In the meaningful condition, however, fewer consumers chose the autonomous product in the low PWE condition (38.9%) than in the high PWE condition (63.6%), providing an effective intervention for firms to increase the adoption of autonomous products.

We presented a series of field and experimental studies demonstrating that PWE seems to inhibit the adoption of autonomous products, because high PWE consumers place more emphasis on meaning from manual tasks. In other words, consumers that place more emphasis on the "no pain, no gain" lay theory choose autonomous products less often. The findings contribute to our understanding of the adoption of new technologies and the psychological forces that govern this effect.

Brand Extension Failure and Parent Brand Penalty: The Role of Implicit Theories

EXTENDED ABSTRACT

Companies routinely attempt to leverage the equity of an established parent brand by introducing products with the same brand name in one or more categories (Ourusoff et al. 1992). Although relying on a strong brand can sometimes be an effective strategy when launching new offerings (Aaker and Keller 1990), over 80% of brand extensions fail (e.g., Torelli and Ahluwalia 2011). Given this extraordinary failure rate, it is imperative for companies to understand the consequences of extension failures on established brands. Although previous research has produced valuable insights as to whether such feedback effects are influenced by features of the parent brand and the extension, relatively less work has examined the role of consumer characteristics. To fill this gap, the authors of the present research investigate whether consumers' implicit theory orientation, which is their perspective on whether personality traits are malleable versus fixed, influences the severity of negative feedback effects following an extension failure.

Extant literature has documented that entity theorists, who believe in the fixedness of personality traits, are often less likely to change their existing beliefs than incremental theorists, who believe that personality traits are malleable (Dweck, Chiu, and Hong 1995). As a result of this difference, one might expect that individuals who endorse an entity (vs. incremental) theory orientation to be less likely to change parent brand evaluations after an extension failure. In contrast, we predict that entity (vs. incremental) theorists will be more punitive when they learn about an extension failure. Albeit in contexts unrelated to brand extensions, prior research has shown that individuals' implicit theory orientation determines their reaction to failure (Aronson, Fried, and Good 2002). Because they believe in the pliability of individual characteristics, incremental theorists perceive failure as representative of an opportunity to learn and improve (Hong et al., 1999). In contrast, entity theorists attribute failure to a lack of ability because as they see it, individuals cannot change and so, failure reflects undesirable traits and features of an individual (Cury et al. 2008). Therefore, entity theorists are more likely to penalize themselves and others when they learn about or encounter failure (Haselhuhn et al. 2010).

Recent research has also shown that compared to incremental theorists, entity theorists are more likely to view social groups as coherent and stable units and thus perceive the group to have greater entitativity (Rydell et al. 2007). We expect implicit theories to exert similar influence on consumers' perceptions of a brand's entitativity levels, such that entity theorists are more likely to view products under the same brand name as constituting a meaningful and entitative group (Wheeler and Omair 2016). Following this line of research (e.g., McConnell et al. 1997), we posit that when a brand is perceived as more entitative, consumers will incorporate and integrate extension failure information into their evaluation of the parent brand. As a result, the negative associations of a failed extension are more likely to be transferred to the parent brand and produce greater attitude change (i.e., a steeper penalty for the parent brand).

In sum, we propose that when evaluating a parent brand, entity (vs. incremental) theorists will view the brand as a cohesive group (vs. a loose collection of products). Because of these differences in their perceptions and beliefs about entitativity, we further posit that entity theorists will be more likely to incorporate brand extension failure into parent brand judgments, leading them to revise their evaluation of the parent brand. That is, we predict that brand dilution (i.e., a negative feedback effect) is more likely for entity (vs. incremental) theorists, and this effect is expected to occur through perceived brand entitativity.

We test these predictions in a series of five studies. In study 1A, we measured implicit theory as a dispositional trait and found that entity (vs. incremental) theorists penalize a real parent brand (i.e., Virgin) more after the failure of a brand extension (i.e., smart watches). An OLS regression of the six-item parent brand penalty measure (α = .63) on the implicit theory measure revealed that participants' implicit theory orientation significantly influenced their intention to penalize the parent brand (β = -.21, SE = .10, t(103) = -2.09, p = .039). In study 1B, we replicated this result using another real brand (General Electric) and an established manipulation of implicit theory. In studies 2 and 3, we provided evidence for our follow model by showing that the greater parent brand penalty conferred by entity (vs. incremental) theorists is mediated by perceptions of a parent brand's entitativity.

In study 2, we measured participants' implicit theory and brand entitativity beliefs and found that stronger entity theory orientation led to higher penalties for the parent brand (General Electric) after extension failure (β = -.25, SE = .10, t(498) = -2.42, p = .016). We also found that an entity (vs. incremental) theory orientation led to a higher perception of brand entitativity (β = -.26, SE = .05, t(498) = -4.77, p < .001) and that greater entitativity was associated with higher penalty (β = .20, SE = .08, t(498) = 2.47, p = .014). A mediation analysis revealed that the effect of implicit theory on parent brand penalty was mediated through perceived entitativity (β = -.04, SE = .02, 95% confidence interval [CI] = -.096, -.002). In study 3, we replicated this finding even though we manipulated rather than measured implicit theory and used a fictitious fashion and apparel brand

named Epic that had launched a failed shoe extension. In study 4, we extended these findings by demonstrating an asymmetry in how entity theorists respond to brand extension failure versus extension success, again using the General Electric brand. We found that while entity theorists penalize brands when they encounter brand extension failure, they do not change their parent brand evaluations when the extension is successful.

This work contributes to the literature on implicit theory, brand extensions, and implicates perceived brand entitativity as a determinant of the effects of failed extensions.

REFERENCES

Aaker, David A., and Kevin Lane Keller (1990), "Consumer evaluations of brand extensions," *Journal of Marketing,* 54 (1), 27-41.

André, Quentin, Ziv Carmon, Klaus Wertenbroch, Alia Crum, Douglas Frank, William Goldstein, et al. (2018), "Consumer Choice and Autonomy in the Age of Artificial Intelligence and Big Data," Customer Needs and Solutions, 5 (1-2), 28-37.

Aronson, Joshua, Carrie B. Fried, and Catherine Good (2002), "Reducing the effects of stereotype threat on African American college students by shaping theories of intelligence," *Journal of Experimental Social Psychology,* 38 (2), 113-125.

Baumeister, Roy F., Kathleen D. Vohs, Jennifer L. Aaker, and Emily N. Garbinsky (2013), "Some Key Differences Between a Happy Life and a Meaningful Life," The Journal of Positive Psychology, 8 (6), 505-516.

Birch, Leann L., David Birch, Diane W. Marlin, and Laurie Kramer (1982), "Effects of Instrumental Consumption on Children's Food Preference," *Appetite,* 3 (2), 125-34.

Carroll, Joseph (2006), "American Workers Would be Happier in Same Job With Higher Pay," http://news.gallup.com/poll/24016/american-workers-would-happier-same-job-higher-pay.aspx.

Cheng, Yimin, Anirban Mukhopadhyay, and Rom Y. Schrift (2017), "Do Costly Options Lead to Better Outcomes? How the Protestant Work Ethic Influences the Cost-Benefit Heuristic in Goal Pursuit," Journal of Marketing Research, 54 (4), 636-649.

Cury, François, David Da Fonseca, Ista Zahn, and Andrew Elliot, "Implicit theories and IQ test performance: A sequential mediational analysis," *Journal of Experimental Social Psychology,* 44 (3), 783-791.

Dweck, Carol S., Chi-yue Chiu, and Ying-yi Hong (1995), "Implicit theories and their role in judgments and reactions: A word from two perspectives," *Psychological Inquiry,* 6 (4), 267-285.

Economist Intelligence Unit (2018), "The Automation Readiness Index: Who Is Ready for the Coming Wave of Automation?" http://www.automationreadiness.eiu.com/.

Frederick, Shane and George Loewenstein (1999), "Hedonic adaptation," in *Well-being: Foundations of Hedonic Psychology,* eds. Daniel Kahneman, Ed Diener and Norbert Schwarz, New York, NY: Russell Sage Foundation, 302-29.

Glanz, Karen, Michael Basil, Edward Maibach, Jeanne Goldberg, and D. A. N. Snyder (1998), "Why Americans Eat What They Do: Taste, Nutrition, Cost, Convenience, and Weight Control Concerns as Influences on Food Consumption," *Journal of the American Dietetic Association,* 98 (10), 1118-26.

Hammond, Ross A (2010), "Social Influence and Obesity," *Current Opinion in Endocrinology, Diabetes and Obesity,* 17 (5), 467-71.

Haselhuhn, Michael P., Maurice E. Schweitzer, and Alison M. Wood (2010), "How implicit beliefs influence trust recovery," *Psychological Science,* 21 (5), 645-648.

Hayes, Andrew F. (2013), *An Introduction to Mediation, Moderation, and Conditional Process Analysis: A Regression-Based Approach*, New York: Guilford Press

Heather, Hartley (2015), "Apéritif: Speeding with Françoise Sagan," https://tinhouse.com/aperitif-speeding-with-francoise-sagan/.

John, Deborah Roedder (1999), "Consumer Socialization of Children: A Retrospective Look at Twenty-five Years of Research," *Journal of Consumer Research,* 26 (3), 183-213.

KPMG (2018), "Autonomous Vehicles Readiness Index: Assessing Countries' Openness and Preparedness for Autonomous Vehicles," https://assets.kpmg/content/dam/kpmg/nl/pdf/2018/sector/automotive/autonomous-vehicles-readiness-index.pdf.

Leung, Eugina, Gabriele Paolacci, and Stefano Puntoni (2018), Man Versus Machine: Resisting Automation in Identity-Based Consumer Behavior," Journal of Marketing Research, 55 (6), 818-831.

McCaffree, Jim (2003), "Position of the American Dietetic Association: Integration of Medical Nutrition Therapy and Pharmacotherapy," *Journal of the American Dietetic Association,* 103 (10), 1363-70.

McConnell, Allen R., Steven J. Sherman, and David L. Hamilton (1997), "Target entitativity: Implications for information processing about individual and group targets," *Journal of Personality and Social Psychology,* 72 (4), 750.

McFerran, Brent, and Anirban Mukhopadhyay (2013), "Lay Theories of Obesity Predict Actual Body Mass," *Psychological Science,* 24 (8), 1428-36.

Moore, Elizabeth S., William L. Wilkie, and Debra M. Desrochers (2017), "All in the Family? Parental Roles in the Epidemic of Childhood Obesity," *Journal of Consumer Research*, 43 (5), 824–59.

Newport, Frank (2018), "Americans Want Government to Do More on Environment," https://news.gallup.com/poll/232007/americans-want-government-more-environment.aspx

Ourusoff, Alexandra, Michael Ozanian, Paul B. Brown, and Jason Starr (1992), "What's in a name? What the world's top brands are worth," *Financial World,* 161 (17), 32-49.

Pogson, Corrie E., Alana B. Cober, Dennis Doverspike, and James R. Rogers (2003), "Differences in Self-Reported Work Ethic Across Three Career Stages," Journal of Vocational Behavior, 62 (1), 189-201.

Raghunathan, Rajagopal, Rebecca Walker Naylor, and Wayne D. Hoyer (2006), "The Unhealthy=Tasty Intuition and Its Effects on Taste Inferences, Enjoyment, and Choice of Food Products," *Journal of Marketing,* 70 (4), 170-84.

Raskin, Sam, Bensimon, Olivia, and Weissman, Ruth (2020), "New Yorkers want to bag the new plastic ban,"https://nypost.com/2020/02/29/new-yorkers-want-to-bag-the-new-plastic-ban/

Rijsdijk, Serge A. and Erik Jan Hultink (2003), "'Honey, Have You Seen Our Hamster?' Consumer Evaluations of Autonomous Domestic Products," Journal of Product Innovation Management, 20 (3), 204-216.

Rijsdijk, Serge A. and Erik Jan Hultink (2009), "How Today's Consumers Perceive Tomorrow's Smart Products," Journal of Product Innovation Management, 26 (1), 24-42.

Rydell, Robert J., Kurt Hugenberg, Devin Ray, and Diane M. Mackie. "Implicit theories about groups and stereotyping: The role of group entitativity." *Personality and Social Psychology Bulletin,* 33 (4), 549-558.

Schmitt, Bernd (2019), "From Atoms to Bits and Back: A Research Curation on Digital Technology and Agenda for Future Research," Journal of Consumer Research, 46 (4), 825-832.

Schnell, Tatjana and Peter Becker (2006), "Personality and Meaning in Life," Personality and Individual Differences, 41 (1), 117-129.

Schrift, Rom Y., Ran Kivetz, and Oded Netzer (2016), "Complicating Decisions: The Work Ethic Heuristic and the Construction of Effortful Decisions," Journal of Experimental Psychology: General, 145 (7), 807-829.

Torelli, Carlos J., and Rohini Ahluwalia (2012), "Extending culturally symbolic brands: A blessing or a curse?," *Journal of Consumer Research,* 38 (5), 933-947.

Ward, Scott (1974), "Consumer Socialization," *Journal of Consumer Research,* 1 (2), 1-14.

Wertenbroch, Klaus, Rom Y. Schrift, Joseph W. Alba, Alixandra Barasch, Amit Bhattacharjee, Markus Giesler, et al. (2019), "Autonomy in Consumer Choice," Marketing Letters, forthcoming.

Wheeler, S. Christian, and Akhtar Omair (2016), "Potential growth areas for implicit theories research," *Journal of Consumer Psychology,* 26 (1), 137-141.

World Health Organization (2018), "Obesity and Overweight," 16 February 2018, (accessed November 15, 2018) [available at http://www.who.int/mediacentre/factsheets/fs311/en/].

Feeling Unique and Grounded: Psychological Drivers and Consequences of Customer Engagement in Product Creation

Chairs: Rocío Alarcón López, University of Murcia, Spain
Anne-Kathrin Klesse, Erasmus University, Rotterdam School of Management, The Netherlands
Martin Schreier, WU Vienna, Austria

Paper #1: You're One in a Million: Strict Uniqueness of Mass-Customized Products

Pia Burghartz, University of St. Gallen, Switzerland
Emanuel de Bellis, University of St. Gallen, Switzerland
Franziska Krause, EBS University of Business and Law, Germany
Nikolaus Franke, WU Vienna, Austria
Gerald Häubl, University of Alberta, Canada

Paper #2: When I Share, I Feel Unique: Sharing one's Customization Experience Increases Feelings of Pride

Rocío Alarcón López, University of Murcia, Spain
Anne-Kathrin Klesse, Erasmus University, Rotterdam School of Management, The Netherlands
Salvador Ruiz de Maya, University of Murcia, Spain
Inés López López, University of Murcia, Spain

Paper #3: Me, me, me: Customization, Uniqueness, and Entitled Behavior

Ulrike Kaiser, WU Vienna, Austria
Martin Schreier, WU Vienna, Austria
Chris Janiszewski, University of Florida, USA

Paper #4: How Self-Production Increases Feelings of Groundedness

Arnaud Monnier, Cornell University, USA
Isabel Eichinger, WU Vienna, Austria
Martin Schreier, WU Vienna, Austria
Stijn van Osselaer, Cornell University, USA

SESSION OVERVIEW

Instead of buying readily available products off the shelf, consumers frequently engage in the product creation process and customize offerings or self-produce products. For instance, consumers may customize a birthday card by choosing their own colors, fonts, and symbols, or create the card completely from scratch. Engaging consumers in the product creation process has several positive consequences for companies, such as more positive product evaluations (Bendapudi and Leone 2003), higher individual demand (Franke, Schreier, and Kaiser 2010) and greater willingness to pay (Norton, Mochon, and Ariely 2012), as well as for consumers, such as feelings of competence (Dahl and Moreau 2007) and accomplishment (Norton et al. 2012).

This special session is intended to deepen our knowledge on the consequences for consumers by focusing on two specific benefits of customer engagement: feeling unique and grounded. Whereas all four papers share the emphasis on psychological benefits, they differ in the specific perspective they take. The first two papers focus on need for uniqueness as a salient motivation to customize products and examine strategies that companies can utilize to boost feelings of uniqueness. The first paper by **Burghartz et al.** examines providing uniqueness feedback and the option to block customers' creation as strategies to increase consumers' valuation of the customized product. Similarly, the second paper by **Alarcón et al.** documents that sharing one's customization experience with others (e.g., in a personal message) increases the subjective value of the customized prod-

uct (i.e., consumers feel more proud), because sharing one's choices with others provides consumers with the possibility to express their unique identity.

Rather than examining drivers of consumer engagement, the remaining two papers discuss consequences of engaging in the product creation process. The third paper by **Kaiser, Schreier** and **Janiszewski** reveals that feelings of uniqueness prompted by customizing or producing one's own product give rise to entitled behavior. This may have positive (such as donating more money to charity) or negative outcomes (such as demanding higher salaries). Relatedly, the fourth paper by **Monnier et al.** documents that engaging in self-production leads to feelings of groundedness (i.e. feelings of deep connectedness to one's social, historical, and physical environment). Additionally, the authors explore ways in which companies can prompt vicarious feelings of self-production and, in doing so, increase feelings of groundedness.

Taken together, the four papers in this session answer the following questions: What are psychological benefits of engaging customers in the product creation process? How can companies facilitate these benefits? Importantly, the papers utilize multi-method approaches, combining data from online, lab, and field studies to explore the robustness and generalizability of the proposed effects. Broadly, this session speaks to ACR's call for sessions on the topic of identity by highlighting how customer engagement in the product creation process can allow consumers express their unique identity and help them feel reconnected with themselves. Thus, we believe that this session should not only be of interest to scholars working on customization and self-production, but also to those interested in identity-related topics, such as self-expression, uniqueness, and groundedness.

You're One in a Million: Strict Uniqueness of Mass-Customized Products

EXTENDED ABSTRACT

In this research we investigate extensions of mass customization (MC) systems that highlight the uniqueness of a configured product. It examines the behavioral consequences of informing consumers that they are the first ever to have created a particular product configuration (strict uniqueness *feedback*) and in addition assuring that this product configuration will remain unique (strict uniqueness *blocking*).

Past research has identified preference fit (Dellaert and Stremersch 2005) and process-related benefits (Troye and Supphellen 2012) as sources of consumer value in MC systems. Our findings shed light on the role of product uniqueness (Franke and Schreier 2008) as a value-generating force in MC systems. We conceptualize a strictly unique product as a product that is literally one of a kind—a combination of features that exists only once. This expands our understanding of the construct of product uniqueness, and of how consumers respond to it, beyond products that are merely rare but not strictly unique (Lynn and Harris 1997). Whereas prior research focused on non-automated social feedback, our findings reveal that automated feedback on strict product uniqueness can be a significant driver of consumer value (Franke and Hader 2014).

We propose that feedback on the strict uniqueness of a product ("Your product configuration has never been created before") creates value for consumers and that being informed that the strictly unique product configuration was blocked ("Your configuration will be blocked for future customers") creates additional value.

Hypothesis 1a: *Feedback on strict product uniqueness increases consumers' valuation of their customized products.*

Hypothesis 1b: *Blocking strict product uniqueness further increases consumers' valuation of their customized products.*

Moreover, this research theorizes that perceived exclusivity—i.e., the perception that a product is not available to others—can be a key driver of consumers' valuation of a product. We propose that strict uniqueness feedback and (to a larger extent) strict uniqueness blocking should trigger perceptions of exclusivity which in turn should create value for consumers.

Hypothesis 2:   *Strict uniqueness feedback and strict uniqueness blocking increase consumers' valuation of their customized products via the perception of greater exclusivity.*

We further propose that consumers' valuation of strict uniqueness is attenuated when the (large) number of possible product configurations in MC systems is made transparent to them. By making the solution space of MC systems transparent to consumers the subjective value they attribute to their configured product likely decreases.

Hypothesis 3:   *The effect of strict uniqueness feedback and strict uniqueness blocking on consumers' valuation of their customized products is attenuated when the number of possible product configurations is made transparent.*

We conducted three experiments across different samples and product domains. We also employed different study designs and types of dependent variables to test our hypotheses. Experiment 1 examines whether strict uniqueness feedback has a positive effect on the subjective value that consumers attribute to customized cereal in a field setting (measured as conversion rate; H1a). Analyzing the conversion rates across conditions indicates that uniqueness feedback on the customized product creates value for customers. Specifically, we found a significant difference in conversion rates between the uniqueness feedback and the no feedback condition of 2.24% ($\chi^2(1, 33{,}001) = 16.50$, $p < .001$). This increase in conversion approximates to €1,145,601 in additional yearly revenue for the cereal producer.

Experiment 2 examines whether strict uniqueness blocking, in addition to strict uniqueness feedback, can drive the subjective value consumers attribute to their customized sunglasses (measured as WTP; H1b). Further, it tests whether the additional value consumers attribute to their configured product is mediated by perceived exclusivity (H2). The findings indicate that both uniqueness feedback and uniqueness blocking significantly increased WTP using a between-subject design with non-uniqueness feedback as a third treatment condition. A one-way ANCOVA, with strict uniqueness as factor, WTP as dependent variable, and brand attitude, status consumption, age, gender, and income as covariates showed a signifi-

cant effect of strict uniqueness on WTP. We found a significant effect of strict uniqueness on WTP ($M_{unique\_blocking}$ = US$50.02, $M_{unique\_feedback}$ = US$43.94, $M_{nonunique\_feedback}$ = US$35.47; $F(2, 169) = 10.46$, $p < .001$). Planned contrasts showed a significant difference in WTP between the non-uniqueness and uniqueness feedback (p=.024) and the uniqueness feedback and blocking condition (p=.002).

The results also demonstrate that the effect of uniqueness feedback and uniqueness blocking on WTP is mediated by perceived exclusivity. We conducted two mediation analyses with a categorical predictor (PROCESS Model 4; Hayes 2013). The results show that uniqueness feedback, blocking and non-uniqueness feedback indirectly influence WTP through perceived exclusivity. The effect between uniqueness feedback and non-uniqueness feedback and between uniqueness feedback and blocking on WTP is positive and significant (a = 1.86, $p < .001$; a = 1.05, $p < .001$); in support of the indirect effect (ab < .001), the bias-corrected 95% confidence interval based on 1,000 boot-strapped samples (marginally) excludes 0 ([.08, .34]; [-.00, .19].

Experiment 3 examines whether making the (large) number of sneaker configuration possibilities transparent to consumers attenuates the effect of uniqueness feedback and uniqueness blocking on consumers' product valuation (H3). The findings demonstrate that the effect of uniqueness feedback and uniqueness blocking on WTP is moderated by solution space transparency. A one-way mixed design ANCOVA with solution space transparency as between-subjects factor, strict uniqueness as within-subject factor, WTP as dependent variable, and brand attitude, status consumption, age, gender, and income as covariates showed a significant interaction between solution space transparency and strict uniqueness ($M_{nontransparent\&no\_feedback}$ = €78.94, $M_{transparent\&o\_feedback}$ = €81.82, $M_{nontransparent\&unique\_feedback}$ = €86.90, $M_{transparent\&unique\_feedback}$ = €89.13, $M_{nontransparent\&blocking}$ = €100.02, $M_{transparent\&blocking}$ = €96.73; $F(2, 926) = 4.62$, $p = .010$). While planned contrasts showed significant effects in the non-transparent (p=.005, p<.001), they showed non-significant effects in the transparent conditions (p=.11, p=.14).

The reported findings have important practical implications in that they identify an inexpensive way for firms to create consumer value by capitalizing on the fact that MC systems naturally promote consumers' creation of products that are strictly unique. It appears to be a promising and easy-to-implement way to enhance the value consumers obtain from configuring products.

When I Share, I Feel Unique: Sharing one's Customization Experience Increases Feelings of Pride

EXTENDED ABSTRACT

Nowadays, product customization is omnipresent. Enabled by technological advances, companies (e.g., Nike, Nissan, Gucci) recently began to explicitly encourage customers to share their customization experience with others. For instance, Ralph Lauren offers customers the possibility to share their customization experience with friends via email immediately after they completed the customization process. Prompting customers to share their experience is uniquely suited to customization processes because consumers feel proud of their creations (Franke et al. 2010; Gandhi et al. 2014).

We explore whether the mere act of sharing one's customization experience with others can boost affective reactions (i.e., pride) toward the customized product. When engaging in product customization, customers typically make choices that allow them to express their unique identity (D'Angelo et al. 2019; Ratner and Kahn 2002). We argue that sharing these choices with others (e.g., in a personal message) provides customers with the possibility to express their

unique identity even before they obtain the customized product. Since most consumers have a strong need to differentiate themselves from others (see Ariely and Levav 2000), being able to express one's unique identity should strengthen customers' feelings of pride toward the customized product.

One pilot study and four experiments test our predictions. For the pilot study, we collected data in a KitKat pop-up store that offered customers the possibility to customize their own chocolate by completing a number of steps (base chocolate, toppings, package design). Once participants (n = 121) handed in their customization choices and before they received the chocolate, they participated in a brief survey. Whereas some participants first shared their customization experience (i.e., their choices and how they felt about them; n = 80[1]) and then reported how tasty they expected their chocolate to be (0 = not tasty at all, 10 = very tasty), other participants (n = 41) immediately indicated their taste perceptions. We find that sharing one's customization experience increased the subjective value of the chocolate (M = 9.19) compared to not sharing it (M = 8.59, $F(1,119)$ = 7.43, p = .007).

Then, in study 1, participants (n = 171, prolific) customized a muesli by choosing a base, ingredients, a design for the muesli box, and adding a personalized message. Afterward half of the participants prepared a message to a friend to share their experience by explaining what choices they made and how they felt while customizing the muesli. The other half engaged in an unrelated word-puzzle task (n = 87). We measured participants' feelings of pride toward the customized muesli using a two-item scale: "I am proud of my customized muesli", and "My customized muesli makes me feel proud" (0 = strongly disagree, 10 = strongly agree[2]). Sharing one's customization experience increased feelings of pride (M = 7.27) compared to not sharing it (M = 6.39, $F(1,169)$ = 8.29, p = .005). In study 2 (n = 173, prolific), we utilized the same muesli paradigm but compared sharing one's customization experience to an introspection condition (i.e., participants were instructed to think about their customization experience in private). We replicate our effect so that sharing one's customization experience results in greater feelings of pride (M = 7.57) than merely thinking about it (M = 6.78; $F(1,171)$ = 7.23, p = .008). This provides direct evidence that social sharing rather than simply deliberating on the customization experience prompts feelings of pride.

In studies 3 and 4, we test theoretically derived boundary conditions. First, we predict that sharing one's customization experience only prompts greater feelings of pride if the customization task allows for expressing one's identity but not if it is functional in nature (Kaiser et al. 2017). Students in the laboratory (n = 325) customized their own fitness tracker; participants were randomly assigned to a self-expressive customization task (e.g., choosing the strap color) or a functional task (e.g., choosing the size for the wrist brand). Afterward participants either shared their customization experience by sending a message to a friend or engaged in a word-puzzle task and then reported pride towards the fitness tracker. The results document a marginally significant interaction effect ($F(1,321)$ = 3.68, p = .055). As expected, simple contrasts highlight that sharing one's customization experience (M = 5.97) increases feelings of pride compared to not sharing it (M = 5.12; $F(1,321)$ = 5.17, p = .024) for the self-expressive customization. However, consumers who share their functional customization experience (M = 5.55) feel equally proud

---

[1] Note that some participants (N = 41) shared their experience in writing whereas others (N = 39) shared it orally. Since there was no difference between these groups, we merged the two conditions.
[2] We used the same dependent measure in all subsequent studies.

than those who keep it to themselves (M = 5.69; $F(1,321)$ = 0.16, p = .69).

Study 4 tests whether the effect is pronounced for consumers with high need for uniqueness (NFU) but attenuated (or reversed) for those with low NFU. 215 females customized their own earrings by choosing different hoops and charms; afterward participants either shared their customization experience with a friend or shared an unrelated experience (i.e., their Summer holiday). Finally, everyone indicated their feelings of pride and responded to the NFU measure by Chernev et al. 2011 (three items; e.g., "I would like to be perceived as different from the general population"; 0 = strongly disagree, 10 = strongly agree). We find a significant interaction effect (β=.37, $t(211)$ = 3.27, p = .001). Sharing one's customization experience results in higher feelings of pride for participants high in NFU (i.e., values ≥ 7.99) but prompts lower feelings of pride for participants low in NFU (i.e., values ≤ 4.51).

This work contributes to existing research on product customization by highlighting an easy-to-implement strategy (i.e., encouraging social sharing of customization experiences) that companies can utilize to further boost feelings of pride, which are essential predictors for repurchasing intentions (Septianto et al. 2019) and self-brand connections (Williams et al. 2018).

Me, me, me: Customization, Uniqueness, and Entitled Behavior

EXTENDED ABSTRACT

Psychological entitlement – that is, a person's "pervasive sense that one deserves more and is entitled to more than others" (Campbell et al. 2004, p. 31) – has become a major topic of interest to both the general public and scholars. Entitled individuals believe they are special, and they expect others to treat them this way (Zitek and Vincent 2014). Entitlement does not involve any reciprocity (e.g., "I deserve a higher salary because I performed well"), but is experienced regardless of one's effort or performance relative to others (Campbell et al. 2004).

Most research to date has studied entitlement as an individual differences characteristic. There is a large body of research on different facets of entitlement, how it is related to other traits (e.g., narcissism, self-esteem, etc.), and on generational differences (Twenge and Campbell 2009). There is also an emerging body of research on behavioral consequences. For example, entitlement is associated with selfish choices, unethical behavior, unforgiveness, or lack of perspective taking (Campbell et al. 2004, Exline et al. 2004, Vincent and Kouchaki 2016). While most research has focused on negative outcomes, Zitek and Vincent (2014) are the exception. They show that a boost in entitlement can increase creativity, mediated by a higher need for uniqueness associated with entitlement.

In this paper, we focus on the less studied antecedents of entitlement. In particular, we are interested in exploring causal triggers that lie outside the individual. To our knowledge, we are the first to demonstrate that uniqueness cues that are ubiquitous in the marketplace (think of customized products, limited editions, or advertising claims that tell consumers how unique and special they are) lead to entitled behaviors. We report five experiments that establish the link between perceived uniqueness and entitled behavior.

In study 1 (n = 280, lab, undergraduates) we introduced a clothing style quiz. After completing the quiz, participants received feedback that either stated that their style was "in many respects unique and special" or "similar to others". Next, we measured salary demanded to complete a job as a known proxy for entitled behavior. Participants were told that they could work on an extra task in return

for payment. We described the task in more detail (it was about a blog entry), and participants were then asked to indicate the minimum payment to complete the job. Their choices had real economic consequences. Findings show that the uniqueness feedback resulted in higher average salary requests (M_{Unique} = 16.35 euro vs. $M_{Control}$ = 14.28 euro, p = .01).

In study 2 (n = 182, Amazon Mechanical Turk) we used a similar quiz to manipulate uniqueness, but instead of salary request, we measured prosocial behavior as a proxy for entitled behavior. After participants received the uniqueness feedback ("your style is unique" vs. "similar to others"), they were told that we would randomly pick one participant to get a bonus payment of $ 25. Participants were asked to indicate how much of the bonus payment they would like to receive on their MTurk account, and how much they would like to donate to Doctors Without Borders (conditional on winning). Again, their choice had real economic consequences. Results show that the uniqueness feedback increased donations (M_{Unique} = $ 8.89 vs. $M_{Control}$ = $ 6.01, p = .03). We argue that this is because their generosity served as a means to express that they are unique and special (Lee, Gregg, and Park 2013).

In study 3a (n = 97, MTurk) and 3b (n = 201, MTurk), we replicate the effect on donation, using two different uniqueness manipulations. In study 3a, we used a writing prime. Participants were asked to write a short text about "what makes you unique and special" vs. "similar to others". The dependent variable was the same as in study 2. Results show that perceived uniqueness increases donations (M_{Unique} = $ 8.89 vs. $M_{Control}$ = $ 6.01, p = .03). Study 3b was a scenario study in which participants learned about a uniquely designed watch. They were either asked to imagine wearing the watch or seeing another person wearing it. Next, we assessed their intention to donate to Doctors Without Borders (in this study, we used intentions instead of real behavior). Again, in the experimental condition, donation intentions were higher (M_{Unique} = $ 6.90 vs. $M_{Control}$ = $ 5.44, p = .08).

Study 4 (n = 222, lab, undergraduates) is a 2 x 2 experiment that employed a real customization task (self-customize vs. control). The second factor was whether participants donated to charity in private or in public. Students participated in a lip balm workshop and either received a self-customized product or a standard product. After answering some filler questions, they were thanked for their participation and received their monetary compensation. We paid 8 euro in coins. Participants were invited to donate all or some of the money to a charity. The donation box was either placed in a cubicle (private) or next to the experimenter (public). Findings show that after receiving the self-customized product, participants donated more when the donation was done in private (M_{Unique} = 1.19 euro vs. $M_{Control}$ = 0.65 euro, p = .01), but not when they donated in public (M_{Unique} = 1.12 euro vs. $M_{Control}$ = 1.25 euro, $n.s.$). In the private setting, being more generous served as means to express their uniqueness. In the public setting, this effect is attenuated due to social desirability effects.

Taken together, five experiments show that marketplace-induced feelings of uniqueness (e.g., through customization) lead to entitled behaviors. We also show that entitlement is not only associated with self-centered and selfish behaviors (e.g., demand higher salary), but that it can also lead to favorable behaviors (e.g., prosocial behavior).

How Self-Production Increases Feelings of Groundedness

EXTENDED ABSTRACT

In an increasingly fast-paced, urbanized, and digitized world, individuals often feel uprooted from their environment. Accordingly, many frequently experience a need for reconnection (Asimov 2017;

Binkley 2008; Brooks 2018; Husemann and Eckhardt 2019; Steiner 2005). We propose and show that engaging in self-production generates feelings of groundedness, defined as feelings of deep connectedness to one's physical, social, and historical environment.

Previous research has established that self-production increases product valuation (Franke, Schreier and Kaiser 2010; Norton, Mochon and Ariely 2012). This literature has also delineated some of the psychological implications of engaging in self-production. For individuals, these include feelings of competence (Dahl and Moreau 2007; Mochon, Norton, and Ariely 2012), feelings of accomplishment (Franke et al. 2010; Norton et al. 2012), and task enjoyment (Dahl and Moreau 2007). At the product level, implications include the transfer of positive self-views to the product, through a process of associative self-anchoring (Gawronski, Bodenhausen, and Becker 2007; Troye and Supphellen 2012).

Across lab and field studies conducted on two continents and utilizing diverse product categories, this research documents a novel psychological benefit of engaging in self-production: increased feelings of groundedness. We further demonstrate how evoking the realm of self-production enables brands to generate vicarious feelings of self-production, and subsequently increase groundedness.

In a first preregistered experiment, we tested the basic effect of self-production versus mere consumption of a product on feelings of groundedness. We randomly assigned 293 US students to one of two conditions (self-production vs. control). In the self-production condition, participants were instructed to make apple juice with local apples. The procedure involved selecting, cutting and juicing the apples. In the control condition, participants were simply provided with the same apple juice made from local apples. All participants tasted the apple juice and answered our three-item groundedness scale (α = .88). The three items include two verbal statements ("I feel deep-rooted", "I feel well-grounded") and a pictorial item, "How well does the following picture describe your feelings at this moment?"). We found a main effect of self-production on feelings of groundedness ($F(1,291)$ = 10.38, p =.001). Participants felt significantly more grounded in the self-production condition ($M_{Self-production}$ = 4.74, $M_{Control}$ = 4.25).

Study 2 tested whether merely consuming a product that evokes the realm of self-production can also elicit vicarious feelings of self-production and, in turn, feelings of groundedness. We hypothesized that artisanal products that resemble self-made goods would increase feelings of groundedness compared to industrial products, but less so than self-producing. We further posited that this occurs through vicarious feelings of self-production. To explore this, we randomly assigned 251 European students in a lab to one of three conditions. Participants in the first two conditions were asked to inspect a real bar of soap that was either industrial or artisanal (i.e., locally made by hand from organic ingredients and wrapped in a craft packaging). They were asked to imagine having just purchased the bar of soap. Participants in the third condition were asked to imagine having made a bar of soap themselves. All participants answered our groundedness scale (α = .91), as well as feelings of self-production (three items, e.g., "In a certain way, it almost feels as if I were the producer of the soap", α = .97). We found a significant treatment effect on feelings of groundedness $(F(2,248)$ = 21.30, p < .001). Participants who inspected the artisanal soap reported higher feelings of groundedness ($M_{Artisanal}$ = 4.32) compared to those who inspected the industrial soap ($M_{Industrial}$ = 3.35, p < .001). Participants in the self-production condition reported even more pronounced feelings of groundedness (vs. the artisanal condition, $M_{Self-production}$ = 4.77, p = .037). We also found a significant treatment effect on feelings of self-production ($F(2,248)$ = 106.71, p < .001). Participants who inspected

the artisanal (vs. industrial) soap reported higher feelings of self-production ($M_{\text{Artisanal}}$= 2.92, $M_{\text{Industrial}}$ = 1.63, $p < .001$). Participants in the self-production condition had even higher feelings of self-production (vs. the artisanal condition, $M_{\text{Self-production}}$ = 5.05, $p < .001$). The groundedness effect was mediated by feelings of self-production for both the artisanal versus industrial (*indirect effect* = .64, $CI_{95\%}$: .39, .94) and the self-production versus artisanal comparison (*indirect effect* = .71, $CI_{95\%}$: .44, 1.06).

Study 3 aimed to replicate our findings in a field setting, using yet another product category (i.e., birthday cards). Additionally, we examined plausible alternative explanations such as mood and perceived quality. The study was conducted in a large museum in a European city (n = 269 museum visitors). In one condition, participants were given a blank card and color pencils, and asked to self-produce a birthday card. Two additional conditions exposed participants to an either industrial or artisanal birthday card. All participants read that other museum visitors would receive these cards. Beyond feelings of groundedness (α = .91) and feelings of self-production (α = .97), we captured alternative accounts: time on the task, perceived quality, mood, thoughts about close others and thoughts about birthdays. We found a main effect of condition on feelings of groundedness that parallels that of Study 2 ($M_{\text{self-production}}$ = 4.71, $M_{\text{Artisanal}}$ = 3.98, $M_{\text{Industrial}}$ = 3.08, $F(2,252)$ = 28.86, $p < .001$). The same pattern emerged on feelings of self-production. We found a main effect of condition ($M_{\text{self-production}}$ = 6.11, $M_{\text{Artisanal}}$ = 3.24, $M_{\text{Industrial}}$ = 1.42, $F(2,254)$ = 222.31, $p < .001$). The groundedness effect was again mediated by feelings of self-production for both the artisanal versus industrial (*indirect effect* = .55, $CI_{95\%}$: .31, .87), and the self-production versus artisanal comparison (*indirect effect* = .40, $CI_{95\%}$: .06, .79). Regarding alternative accounts, mood was higher in the self-production condition, but did not vary between the two others. Perceived quality significantly differed across conditions, but the mediation held when adding quality as covariate. No other measure varied across conditions.

Our research demonstrates a robust effect of self-production on feelings of groundedness, and illuminates how brands can also beget such feelings. We thus identify groundedness as a distinct and critical psychological need that consumers fulfil when engaging in self-production.

REFERENCES

Ariely, Dan and Jonathan Levav (2000), "Sequential Choice in Group Settings: Taking the Road Less Travelled and Less Enjoyed," *Journal of Consumer Research*, 27 (3), 279-290.

Asimov, Eric (2017), "Much Excitement on the Oregon Trail," *New York Times*, September 20, D4.

Bendapudi Neeli and Robert P. Leonne (2003), "Psychological Implications of Customer Participation in Co-Production," *Journal of Marketing*, 67 (1), 14-28.

Binkley, Sam (2008), "Liquid Consumption: Anti-Consumerism and the Fetishized De-Fetishization of Commodities," *Cultural Studies*, 22 (5), 599-623.

Brooks, Arthur C. (2018), "Loneliness Is Tearing America Apart," *New York Times*, November 24, A25.

Campbell, W. Keith, Angelica M. Bonacci, Jeremy Shelton, Julie J. Exline, and Brad J. Bushman, (2004), "Psychological Entitlement: Interpersonal Consequences and Validation of a Self-Report Measure," *Journal of Personality Assessment*, 83, 29–45.

Chernev, Alexander, Rebecca Hamilton, and David Gal (2011), "Competing for Consumer Identity: Limits to Self-expression and the Perils of Lifestyle Branding," *Journal of Marketing*, 75 (3), 66-82.

D'Angelo, Jennifer K., Kristin Diehl, and Lisa A. Cavanaugh (2019), "Lead by Example? Custom-Made Examples Created by Close Others Lead Consumers to Make Dissimilar Choices," *Journal of Consumer Research*, 46 (4), 750-773.

Dahl, Darren W. and C. Page Moreau (2007), "Thinking Inside the Box: Why Consumers Enjoy Constrained Creative Experiences," *Journal of Marketing Research,* 44 (3), 357-369.

Dellaert, Benedict G. C. and Stefan Stremersch (2005), "Marketing Mass-Customized Products: Striking a Balance Between Utility and Complexity," *Journal of Marketing Research*, 42 (2), 219–27.

Exline, Julie Juola, Roy F. Baumeister, Brad J. Bushman, and W. Keith Campbell, and Eli J. Finkel (2004), "Too Proud to Let Go: Narcissistic Entitlement as a Barrier to Forgiveness," *Journal of Personality and Social Psychology,* 87 (6), 894-912.

Franke, Nikolaus and Christopher Hader (2014), "Mass or only "Niche customization"? Why we Should Interpret Configuration Toolkits as Learning Instruments," *Journal of Product Innovation Management*, 31 (6), 1214–34.

Franke, Nikolaus and Martin Schreier (2008), "Product Uniqueness as a Driver of Customer Utility in Mass Customization," *Marketing Letters*, 19 (2), 93–107.

Franke, Nikolaus, Martin Schreier, and Ulrike Kaiser (2010), "The "I Designed it Myself" Effect in Mass Customization," *Management Science,* 56 (1), 125-140.

Gandhi, Anshuk, Carmen Magar, and Roger Roberts (2014), "How Technology Can Drive the Next Wave of Mass Customization," Business Technology Office, 1-8.

Gawronski, Bertram, Galen V. Bodenhausen, and Andrew P. Becker (2007), "I Like it, Because I Like Myself: Associative Self-Anchoring and Post-Decisional Change of Implicit Evaluations," *Journal of Experimental Social Psychology,* 43 (2), 221-232.

Hayes, Andrew F. (2013), *Methodology in the Social Sciences. Introduction to Mediation, Moderation, and Conditional Process Analysis. A Regression-Based Approach.* New York, USA: Guilford Press.

Husemann, Katharina C. and Giana M. Eckhardt (2019), "Consumer Deceleration," *Journal of Consumer Research,* 45 (6), 1142-1163.

Kaiser, Ulrike, Martin Schreier, and Chris Janiszewski, (2017), "The Self-Expressive Customization of a Product can Improve Performance," *Journal of Marketing Research*, 54 (5), 816-831

Lee, Seung, Aiden Gregg, and Seong Park (2013), "The Person in the Purchase: Narcissistic Consumers Prefer Products That Positively Distinguish Them," *Journal of Personality and Social Psychology*, 105 (2), 335-352.

Lynn, Michael and Judy Harris (1997), "The Desire for Unique Consumer Products: A New Individual Differences Scale," *Psychology & Marketing*, 14 (6), 601–16.

Mochon, Daniel, Michael I. Norton, and Dan Ariely (2012), "Bolstering and Restoring Feelings of Competence via the IKEA Effect," *International Journal of Research in Marketing*, 29 (4), 363-369.

Moreau, C. Page, Leff Bonney, and Kelly B. Herd (2011), "It's the Thought (and the Effort) that Counts: How Customizing for Others Differs from Customizing for Oneself," *Journal of Marketing*, 75 (5), 120-133.

Norton, Michael I., Daniel Mochon, and Dan Ariely (2012), "The IKEA Effect: When Labor Leads to Love," *Journal of Consumer Psychology,* 22 (3), 453-460.

Ratner, Rebecca and Barbara Kahn (2002), "The Impact of Private versus Public Consumption on Variety-Seeking Behaviour," *Journal of Consumer Research*, 29 (2), 246-257.

Septianto, Felix, Jake An, Tung Moi Chiew, Widya Paramita, and Istiharini Tanudharma (2019), "The Similar versus Divergent Effects of Pride and Happiness on the Effectiveness of Loyalty Programs," *Journal of Business Research,* 99, 12-22.

Steiner, Rudolf (2005), *What is Biodynamics: A Way to Heal and Revitalize the Earth*, Fair Oaks, CA: Steiner.

Troye, Sigurd Villads and Magne Supphellen (2012), "Consumer Participation in Coproduction: "I Made it Myself" Effects on Consumers' Sensory Perceptions and Evaluations of Outcome and Input Product," *Journal of Marketing*, 76 (2), 33–46.

Twenge, Jean M. and W. Keith Campbell (2009), *The Narcissism Epidemic: Living in the Age of Entitlement*. New York: Free Press.

Vincent, Lynne C. and Maryam Kouchaki (2015), "Creative, Rare, Entitled, and Dishonest: How Commonality of Creativity in One's Group Decreases an Individual's Entitlement and Dishonesty," *Academy of Management Journal*, 59 (4), 1451-1473.

Williams, Patti, Nicole Verrochi Coleman, Andrea C. Morales, and Ludovica Cesareo (2018), "Connections to Brands that Help Others versus Help the Self: The Impact of Incidental Awe and Pride on Consumer Eelationships with Social-Benefit and Luxury Brands," *Journal of the Association for Consumer Research*, 3 (2), 202-215.

Zitek, Emily M. and Lynne C. Vincent (2015), "Deserve and Diverge: Feeling Entitled Makes People More Creative," *Journal of Experimental Social Psychology*, 56, 242–248.

Antecedents of and Remedies to the Spread of False Information in the Social Media Era

Chair: Gizem Ceylan, University of Southern California, USA

Paper #1: Look What I am Re-Sharing: How Self-Presentation Goals Impact What Consumers Spread on Social Networks

    Gizem Ceylan, University of Southern California, USA
    Norbert Schwarz, University of Southern California, USA

Paper #2: Impression Management in the Echo-Chamber: How Self-Censorship Biases Evidence-Sharing

    Ike Silver, University of Pennsylvania, USA
    Deborah Small, University of Pennsylvania, USA
    Geoff Goodwin, University of Pennsylvania, USA

Paper #3: Understanding and Reducing the Spread of Misinformation Online

    Gordon Pennycook, University of Regina, Canada
    Ziv Epstein, Massachusetts Institute of Technology, USA
    Mohsen Mosleh, Massachusetts Institute of Technology, USA
    Antonio A. Arechar, Massachusetts Institute of Technology, USA
    Dean Eckles, Massachusetts Institute of Technology, USA
    David G. Rand, Massachusetts Institute of Technology, USA

Paper #4: Factchecking Matters: The Value of Crowdsourcing for Enhanced Accuracy Judgments

    Yu Ding, Columbia University, USA
    Gita V. Johar, Columbia University, USA

SESSION OVERVIEW

There is worldwide concern over false news and the possibility that it can influence political, economic, and social well-being. From 2006 to 2017, false news reached more people and spread faster than truth (Vosoughi, Roy, and Aral 2018). While false information seems to diffuse faster, when asked, consumers overwhelmingly say that it is important for them to share accurate content only (Pennycook et al. 2019). The presentations in this session examine this puzzling phenomenon and identify potential antecedents of and remedies to the spread of false information on social networks. In this session, we explore whether (presentations 1) and how (presentation 2) consumers' self-presentation goals impact what they spread on social networks. Further, we explore potential remedies that can improve the quality of the information consumers share on social media both from the sharer (i.e., consumer; presentation 3) as well as the source (i.e., news media; presentation 4) perspective.

Ceylan and Schwarz explore spreading information (e.g., news) on social media as a strategic form of self-disclosure. They find that individuals with the motivation to fit in share news only if it comes from a high-credibility source or is also shared by many others (high-consensus). However, those motivated to stand out are less sensitive to source credibility and consensus, and may be more likely to contribute to the spread of false information.

Silver, Small, and Goodwin examine a motivated *sharing* effect, suggesting that consumers prefer to omit attitude-incongruent, factual information from conversations with others. The authors predict and find that political allies provide one another with biased information, strategically omitting factual and relevant evidence if it casts doubt on their commitment to a shared cause. This effect is magnified when consumers share information in public versus in private, implicating impression management concerns specifically.

Pennycook et al. directly examine the relationship between accuracy judgments and sharing intentions. They propose that most people do not want to spread misinformation but are distracted from accuracy by other salient motives when choosing what to share. As a remedy to the problem, they suggest that subtly inducing people to think about the concept of accuracy increases the quality of the news they share.

Ding and Johar propose a method to leverage the input of the general population (crowdsourcing), algorithm (supervised learning), and experts (third-party checkers) to detect false information. They suggest that asking readers to compare the opinions and viewpoints of two articles (as opposed to asking them to directly evaluate the source or the articles) can be a way to overcome motivated reasoning among people with different ideologies.

Taken together, these papers document novel and timely insights into important implications of spread of false information. All papers are at an advanced stage of development with multiple studies completed. We expect this session to generate strong interest among researchers studying false information, impression management, social influence and social judgment, as well as social media and word-of-mouth more broadly.

Look What I am Re-Sharing: How Self-Presentation Goals Impact What Consumers Re-Transmit on Social Networks

EXTENDED ABSTRACT

Information spreads fast on social platforms. Consumers re-transmit news on Facebook, re-share others' photos on Instagram, re-tweet the quotes from their beloved companies or political parties (e.g., Chevalier and Mayzlin 2006; Trusov, Bucklin, and Pauwels 2009). These decisions seem to be made in seconds. Consumers seem to be quicker to share than to read the information. A recent Twitter study found that 59 percent of all links shared went unclicked, and presumably unread (Gabielkov, Ramachandran, Chaintreau, and Legout 2016). Instead of attending to central elements (i.e., the quality of information), consumers seem to attend to peripheral cues, such as the source of the information. We suggest that this quick evaluation process may be moderated by consumers' salient self-presentation goals.

Prior research showed that consumers evaluate content differently depending on their salient motivation in their social network. For instance, they seem to share more self-presenting content (vs. useful content) when sharing with multiple others (vs. one other; Barasch and Berger 2014). Our research examines the impact of self-presentation goals on sharing decisions and shows that consumers who want to fit in prefer to share popular (vs. unpopular) information from well-known (vs. unknown) and credible (vs. less credible) sources, whereas consumers who want to stand out are willing to share regardless of the source and popularity of the content. Despite these differences in sharing, both groups of consumers find information more truthful when it comes from a well-know and familiar source, indicating that those who want to stand out are willing to share information they may not consider truthful.

Study 1. Following a 3 (Self-Presentation Goal: Fit-in vs. Stand-out vs. Control) x 2 (Credibility: High vs. Low) x 2 (Consensus: High vs. Low) mixed design, participants (N=152; undergraduates) were randomly assigned to one of the self-presentation goal conditions. They rated four news headlines that were combined with either a high (e.g., New York Time) vs low (e.g., Denver Guardian) credibility source. The news had ostensibly been shared by 790,000

vs. 79 people, resulting in high vs. low perceived social consensus. We assessed participants' willingness to re-share the information on their social network and its perceived truthfulness. Fifty-one participants were removed; 3 of them completed less than 10% of the survey and the remainder failed the attention check.

A repeated measures ANOVA indicated an interaction of goal, credibility and consensus, $F(2, 98)= 5.09$, $p = .01$. As expected, participants who had the goal to fit in reported higher willingness to share under high-credibility/high-consensus conditions ($M=6.70$, $SE=1.95$, $N=21$) than under low-credibility/low-consensus conditions ($M=4.73$, $SE=2.44$, $N=21$); mixed conditions (low-credibility/high-consensus or high-credibility/low-consensus) fell in between ($M=5.76$ $SE=1.83$, $N=21$). In stark contrast, neither source credibility nor consensus information had a significant influence when participants had the goal to stand out (high/high, $M=5.35$, $SD=2.33$, $N=27$; low/low, $M=5.12$, $SD=2.38$, $N=27$; mixed, $M=5.30$, $SD=2.10$, $N=27$). These differences in reported willingness to share could not be traced to differences in truth perception. Independent of self-presentation goal, participants found high-credibility/high-consensus news more truthful ($M=5.46$, $SD=1.18$, $N=98$) than low-credibility/low-consensus news ($M=4.20$, $SD=1.34$, $N=98$), with the mixed conditions falling in between ($M=4.95$, $SD=1.04$, $N=98$), $F(1,118)=69.65$, $p<.001$.

In sum, consumers who have the goal to fit in seem to attend to the likely veracity of information before they share it, which is not the case for consumers who want to stand out. Study 2 provides a conceptual replication of this finding and explores the role of the interest value of the news (boring vs. interesting).

Study 2. Next, we tested (N = 340; undergraduates) whether our results hold when we measured people's need for uniqueness using the scale from Snyder and Fromkin (1980). Since sharing news from low credibility is particularly problematic, we paired news headlines (same with Study 1) with only low credibility sources (e.g., Denver Guardian). We expected and found that as people's need for uniqueness increases, they become more likely to share news headlines coming from low credibility sources (ß=0.7, t=3.8, p<.001). As expected, need for uniqueness was not associated with truth judgment (t<1). Our correlational study provided consistent findings with study 1 when people's uniqueness needs were measured.

Study 3. We wondered whether people with uniqueness need would take interest value of the content into account more so than other people. Following a 3 (Self-Presentation Goal: Fit-in vs. Stand-out vs. Control) x 2 (Credibility: High vs. Low) x 2 (Content: Interesting vs. Boring) between-subjects (N=170; undergraduates) design, participants were randomly assigned to one of the self-presentation goal conditions. They rated four news headlines that were either interesting (pretested, $M=5.14$, $SD=1.55$) or boring ($M=3.65$, $SD=1.86$) and combined with either a high (e.g., New York Time) or low (e.g., Denver Guardian) credibility source.

Replicating the pattern of Study 1, willingness to share depended on motivation and source credibility, $F(2,165)=2.95$, $p=.06$, for the interaction. Participants with a fit-in goal reported greater willingness to share when the news came from a high-credibility ($M=4.06$, $SD=2.28$, $N=29$) rather than low-credibility source ($M=2.78$, $SD=1.60$, $N=25$), $F(1,52)=5.50$, $p=.02$, for the simple effect. In contrast, source credibility did not influence willingness to share when participants had a stand-out goal, $F(1,54)=.05$, $p=.82$; the latter condition did not differ from the control condition, $F(1,58)=1.52$, $p=.22$. In addition, all participants were more willing to share interesting news ($M=4.30$, $SD=2.14$, $N=75$) than boring news ($M=3.43$, $SD=2.09$, $N=90$), $F(1,168)=6.97$, $p=.009$, independent of their self-presentation goal, $F(2,165)=.95$, $p=.39$, for the interaction. With this study, we confirmed our main hypothesis but did not find support

for a relationship between uniqueness need and interest value of the content.

In combination, our findings highlight that consumers' self-presentation motives play a key role in their re-sharing decisions in online networks. People with high need for uniqueness may be less sensitive to credibility cues and share information coming from any source, which may expose them to spread of misinformation. Ongoing studies examine which aspects of information consumers attend to when they want to stand-out. Given the spread of misinformation stemming from less-known and less credible sources, it is important to understand the interplay of consumer motivation and news characteristics.

Impression Management in the Echo-Chamber: How Self-Censorship Biases Evidence-Sharing

EXTENDED ABSTRACT

The free exchange of ideas on the internet has led to the formation of ideological echo chambers, in which attitude-congruent information circulates while attitude-incongruent information is filtered out (Del Vicario et al. 2016). Indeed, people preferentially seek and consume information that aligns with their pre-existing moral and political attitudes about important issues like gun control, climate change, or immigration. In explaining these dynamics, past research has highlighted the roles of prior attitudes and motivated reasoning, which together cause consumers to selectively attend to, believe, and remember attitude-congruent information and to avoid, discredit, and forget attitude-incongruent information (Golman, Haggman, and Lowenstein 2017; Kahan 2012; Kunda 1990). Above and beyond motivated *reasoning*, we report a motivated *sharing* effect: Consumers prefer to omit attitude-incongruent, factual information from conversations with others.

Specifically, we propose that when sharing information with like-minded others, people will selectively omit relevant evidence that might cast doubt on their loyalty to shared causes. For example, we predict that a liberal sharing results from a report on the welfare effects of cutting taxes will strategically omit findings which speak to the effectiveness of stereotypically conservative tax policies. By contrast, a conservative will omit from the same report findings that speak to the effectiveness of stereotypically liberal tax policies. Although both sides purport to be concerned with the actual effects of cutting taxes, individual actors on both sides are also concerned about appearing appropriately committed to their respective political movements.

This phenomenon – a bias towards sharing attitude-congruent vs. attitude-incongruent facts – represents a form of self-censorship, rooted in concerns about impression management (Schlenker 1980). Critically, this bias exerts influence above and beyond processes of motivated reasoning: Even when information is believed to be factual and relevant, worries about the inferences others might make if one *shares* that information will lead consumers to censor it from conversation.

In, study 1 (pre-registered, n=300) participants read a real news article which outlined facts both supporting and undermining the idea that President Trump deserves credit for recent growth in the US economy. After reading, participants were presented sequentially with six specific facts taken from the passage. Three of these facts supported Trump's performance (e.g., 'Early last week, the stock market hit a new all-time high, something that has happened multiple times under President Trump'); while the other three undermined Trump's performance (e.g., 'Job growth has been gradually slowing since Donald Trump's inauguration'). We classified each of

these items as attitude-congruent or attitude-incongruent on the basis of participants' answers to an initial question about their broader attitudes towards Trump's presidency. Participants were asked to imagine having a conversation with a friend or peer who shared their general views about the president and to report how likely they would be to bring up each fact in conversation (7-point likelihood scale). They also rated the extent to which they believed each fact to be true/accurate and the extent to which they believed each to be relevant to understanding Trump's job performance overall. Controlling for these variables in our analyses allows us to isolate self-censorship from other motivated reasoning processes. In line with our predictions, we found that, controlling for their perceptions of accuracy and relevance, participants were much less likely to share attitude-incongruent (M=3.41, 95% CI = [3.26, 3.55]) vs. attitude-congruent facts (M=4.79, 95% CI = [4.65, 4.95]; $t(1557.7)=16.5$, $p<.001$). This effect held for both Trump-supporters and Trump-detractors ($ps<.001$).

Study 2 (preregistered, n=519) aimed to replicate these results in a new context and to tie them specifically to impression management concerns. Study 2 followed a similar procedure to Study 1 with the following differences. In Study 2, participants read a two-sided article about gun control and made judgments about six facts: three supporting and three undermining the case for increased gun regulation in the US. We again classified these facts as attitude-congruent or attitude-incongruent. This time, participants were asked to imagine summarizing what they had read either for their own future use (private condition) or to share with and inform a political ally (public condition). Next, they reported how likely they would be to include each fact in their summary (7-point likelihood scale). We again found that, above and beyond perceptions of accuracy and relevance, participants indicated a lower likelihood of including attitude-incongruent facts (M=4.41, 95% CI = [4.33, 4.49] in their summaries than attitude-congruent ones (M=5.14, 95% CI =[5.06, 5.22]; $t(2738.1)=13.3$, $p<.001$). Importantly, we also detected an interaction, whereby reluctance to include attitude-incongruent facts was significantly stronger for a summary that would be made public than one which would be kept private ($t(2590.7)=5.1$, $p<.001$). That the attitude-incongruence effect was larger in public than in private implicates social-signaling concerns specifically, above and beyond self-signaling or mere dislike of dealing with attitude-incongruent information *per se*. Again, all results held for both pro-gun and anti-gun participants ($ps<.001$).

Consumers typically expect those who share their moral attitudes to be trustworthy sources of information (Haidt 2012). By contrast, we predict and find that political allies provide one another with biased information, strategically omitting factual and relevant evidence if it casts doubt on their commitment to a shared cause. This self-censorship effect can explain, at least in part, the prevalence of political echo-chambers among groups of like-minded consumers: People prefer not to share facts that challenge their image as loyal group members.

More broadly, our results suggest that consumers hoping to gather all of the facts on complex and consequential issues must contend not only with the *presence* of irrelevant and factually inaccurate information in their environment (i.e., fake news; Bago, Rand, and Pennycook 2020) but also with the *absence* of relevant, factual information, particularly when sourcing evidence from political allies.

Understanding and Reducing the Spread of Misinformation Online

EXTENDED ABSTRACT

The spread of misinformation – including blatantly false political "fake news'" – on social media has become a major focus of public debate and academic study in recent years [1]. Here we investigate this willingness to share seemingly unbelievable content, and ask what it can tell us about how to design interventions to reduce the spread of misinformation.

In a series of survey experiments, we provide evidence that the problem is not that people simply cannot tell what news is true versus false, or that people can tell but simply do not care. Instead, it seems that the sharing of misinformation is rooted in a distraction-based failure to *consider* the accuracy of claims. As a result, nudging participants to think about the concept of accuracy by asking them to rate the accuracy of a single non-political headline substantially reduces their self-reported willingness to consider sharing false (but not true) headlines.

To corroborate these findings in an ecologically valid domain, and evaluate the efficacy of potential social media interventions to reduce the spread of misinformation, we conduct a digital field experiment on Twitter.

Specifically, we sent users direct messages from a set of bot accounts asking them to rate the accuracy of a single non-political headline. Our subject pool consisted of N=5,379 Twitter users who had previously (re)tweeted links to Breitbart or Infowars, two leading misinformation sites. To allow for causal inference, we used a stepped-wedge (randomized roll-out) design in which users were randomly assigned to a date on which to receive the treatment message. Within each 24-hour time-window, we then compared the links shared by users who received the treatment message at the beginning of that time window to the links shared by all the users who had not yet been messaged (who thereby represented the control condition). We then combined estimates across dates to arrive at an overall treatment effect (This randomized roll-out approach is required, instead of a more traditional approach where half of the subjects receive treatment at the same time while the other half act as the control, because the rate limits imposed by Twitter forced us to only send a small number of messages per account per day).

To quantify the quality of the news shared in any given tweet, we used a previously published list of 60 news websites whose truthworthiness was rated by professional fact-checkers [2].

As predicted, we find that the intervention leads to a 1.9% increase (p=.009) in the average quality of new sites shared (5% increase when estimating the treatment effect just on users who actually tweet - i.e. excluding "never taker" user-days). Given the complexity of the experimental design and tweet data, there are a multitude of reasonable approaches for assessing whether our intervention successfully increased the quality of news sharing. Thus we computed effect size estimates using 98 different analysis approaches. Considering the analyses in aggregate provides strong evidence that, indeed, the accuracy message significantly increased the average quality of news sources subsequently shared by the users in our experiment. For the large majority of analytic approaches, the increase is statistically significant (p<0.05 in over 80% specifications). Finally, a domain-level analysis provides a more detailed picture of the effect of the intervention.

Our results highlight an overlooked avenue by which social media fosters the spread of misinformation. Rather than (or in addition to) the often-discussed phenomenon of echo chambers and filter-bubbles, social media platforms may actually discourage peo-

ple from reflecting on accuracy. These platforms are designed to encourage users to rapidly scroll and spontaneously engage with their newsfeeds, and mix serious news content with emotionally engaging content where accuracy is not a relevant feature (e.g., photos of babies, videos of cats knocking things off tables for no good reason). Social media platforms also provide immediate quantified social feedback (e.g., number of likes, shares, etc.) on users' posts and are a space which users come to relax rather than engage in critical thinking. These factors imply that social media platforms may, by design, tilt users away from considering accuracy when making sharing decisions. But this need not be the case. Our treatment translates easily into interventions that social media platforms could employ to increase users' focus on accuracy. For example, platforms could periodically ask users to rate the accuracy of randomly selected headlines (e.g. "to help inform algorithms") - thus reminding them about accuracy in a subtle way that should avoid reactance. The platforms also have the resources to optimize the presentation and details of the messaging, likely leading to effect sizes much larger than what we observed here. Such an approach could potentially reduce the amount of misinformation circulating online without relying on a centralized institution to certify truth and censor falsehood.

Factchecking Matters: The Value of Crowdsourcing for Enhanced Accuracy Judgments

EXTENDED ABSTRACT

Misleading information on news media is of key interest to individual readers, publication managers, and policy makers. In recent years, both mass media and social media are rated as more biased than ever before (Pew Research 2018; Garimella and Weber 2017). In fact, online news media were found the most politically polarized in the U.S. compared to other countries (Reuters 2017).

However, most research and industry reports have relied on individual readers' self-reported beliefs and opinions to measure media trustworthiness (Pennycook and Rand 2019; Reuters 2017). For instance, readers are usually asked to answer questions such as "Does [certain news media company] provide accurate and reliable news?" or "How trustworthy is [certain news media company]?" There are two critical issues with this approach which we highlight in our first study. First, the target of these questions is news media (rather than the article content) which is problematic because the names of news media can lead to biased responses based on prior beliefs (Knight Foundation and Gallup 2017). As suggested by research on motivated reasoning (Kunda 1990), the conclusions drawn from readers' belief measures are highly driven by readers' ideology and largely affected by which readers are sampled (Mercier and Sperber 2011; Kahan 2012; Van Bavel and Pereira 2018). So far, neither researchers nor industry practitioners have found a reliable measure of article accuracy. In this research, we propose a new approach to utilizing crowdsourcing to uncover misinformation on news media at the level of individual articles.

We propose a form of cognition-based judgment, similarity judgment, which asks readers to compare how the opinions and viewpoints of two articles are different from or similar to each other. Because our proposed similarity judgment is constructed rather than retrieved (Tversky 1977), such judgment is less likely to be biased by readers' ideology and more likely to reach high consensus among different reader populations, regardless of their prior beliefs or motivations.

Study 1 examines the problems with using evaluation questions to rate accuracy at the media outlet level. This study involved 611,188 online reader votes on 100 mainstream English news media

publishers. Readers and experts separately rated each publisher on its political ideology biases on a 5-point scale from -2 to 2 (-2 = "left", -1 = "left-center", 0 = "least biased", 1 = "right-center", 2 = "right"). We compared the mean of reader voting poll with expert ratings on media political ideology biases. Results revealed that general readers rated the media more left biased than the experts did, $t(99) = 3.30$, $p = .001$, $d = 0.35$. The results also yielded a significant effect of the variance of reader's rating on the reader-expert difference such that the larger the variance among reader's rating, the bigger the discrepancy between reader's rating and expert's rating ($b = 0.34$, Robust $SE = 0.13$, $t(97) = 2.62$, $p = .010$). In other words, readers' ratings of media appear to be affected by their prior beliefs and are not consistent with expert opinion.

Study 2 examines our hypothesis that similarity judgment questions can be effective in judging accuracy of news articles. Participants were instructed to read three news articles that either supported the idea of climate change or disagreed with climate change arguments. Half of the participants were asked to make evaluation judgments (e.g., how trustworthy the argument was in each article); the other half of the participants were asked to make similarity judgments (e.g., how similar are the arguments between two articles). Results revealed that responses to evaluation questions are largely affected by readers' political ideology with correlations varying from 0.73 to 0.83. For example, more liberal participants were more likely to rat an article that is against climate change false, $b = -.37$, $p = .002$; but rate an article that shows evidences of climate change true, $b = .45$, $p < .001$. Importantly, similarity judgment ratings were not affected by political ideology, $ps > .88$. That is, both conservative and liberal participants rated the similarities between articles in the same way regardless of their political ideology. The relationship between question type and participant's cognitive ability showed different patterns. Although political ideology does not affect the Cognitive Reflection Task (CRT) score (Thomson and Oppenheimer 2016), $b = -.06$, $p = .34$, participants with higher CRT score were better able to distinguish articles with opposing arguments, $b = -.56$, $p = .002$. However, the CRT score does not affect the relationship between political ideology and response to evaluation questions. Study 3 replicated the findings in Study 2 with a similar experimental design and another set of news articles.

In the last ongoing study, we are incorporating expert ratings, reader ratings, semantic markers, and the similarity matrix generated from text analysis tools to build a tool that can help make accurate accuracy judgments. We also examine the extent to which crowdsourced similarity judgments can add over and above machine learning tools to judgments of article accuracy. This project utilized tools that span disciplines and is timely, relevant, and critical.

REFERENCES

Bago, Bence, David G. Rand, and Gordon Pennycook (2020), "Fake news, fast and slow: Deliberation reduces belief in false (but not true) news headlines," *Journal of Experimental Psychology: General.*

Barasch, Alixandra, and Jonah Berger (2014), "Broadcasting and Narrowcasting: How Audience Size Affects What People Share." *Journal of Marketing Research, 51* (3), 286-299.

Carroll, J. D., and Green, P. E. (1997). Psychometric methods in marketing research: Part II, multidimensional scaling. *Journal of Marketing research*, *34*(2), 193-204.

Chevalier, Judith A., and Dina Mayzlin (2006), "The Effect of Word of Mouth on Sales: Online Book Reviews." *Journal of Marketing Research, 43* (3), 345-354.

David MJ Lazer et al. "The science of fake news". In: Science 359.6380 (2018), pp. 1094– 1096.

Del Vicario, Michela, et al. "The spreading of misinformation online." *Proceedings of the National Academy of Sciences* 113.3 (2016): 554-559.

Gabielkov, Maksym, Arthi Ramachandran, Augustin Chaintreau, and Arnaud Legout (2016), "Social Clicks: What and Who Gets Read on Twitter?," *ACM SIGMETRICS Performance Evaluation Review, 44* (1), 179-192.

Garimella, V. R. K., and Weber, I. (2017, May). A long-term analysis of polarization on Twitter. In Eleventh International AAAI Conference on Web and Social Media.

Golman, Russell, David Hagmann, and George Loewenstein (2017), "Information Avoidance," *Journal of Economic Literature*, 55(1), 96-135.

Gordon Pennycook and David G Rand. "Fighting misinformation on social media using crowdsourced judgments of news source quality". In: *Proceedings of the National Academy of Sciences* 116.7 (2019), pp. 2521–2526.

Green, P. E., Wind, Y., and Carroll, J. D. (1973). *Multiattribute decisions in marketing: A measurement approach* (Vol. 973). Hinsdale, IL: Dryden Press.

Haidt, Jonathan (2012), *The Righteous Mind: Why Good People are Divided by Politics and Religion*. Vintage books.

Kahan, Daniel M. (2012), "Ideology, motivated reasoning, and cognitive reflection: An experimental study," *Judgment and Decision-Making*, 8, 407-424.

Kunda, Ziva (1990), "The case for motivated reasoning," *Psychological Bulletin, 108*(3), 480.

Mercier, H., and Sperber, D. (2011). Why do humans reason? Arguments for an argumentative theory. *Behavioral and brain sciences*, *34*(2), 57-74.

Netzer, O., Feldman, R., Goldenberg, J., and Fresko, M. (2012). Mine your own business: Market-structure surveillance through text mining. *Marketing Science*, *31*(3), 521-543.

Pennycook, G., and Rand, D. G. (2019). Fighting misinformation on social media using crowdsourced judgments of news source quality. *Proceedings of the National Academy of Sciences,* 116(7), 2521-2526.

Pew Research Center. (2018). Publics globally want unbiased news coverage but are divided on whether their news media deliver. Retrieved from https://www.pewresearch.org/global/2018/01/11/publics-globally-want-unbiased-news-coverage-but-are-divided-on-whether-their-news-media-deliver/

Reuters. (2017). Reuters institute digital news report 2017. Retrieved from https://reutersinstitute.politics.ox.ac.uk/sites/default/files/Digital%20News%20Report%202017%20web_0.pdf

Schlenker, Barry R. (1980), *Impression management*, Brooks/Cole Publishing Company, Monterey, CA.

Trusov, Michael, Randolph E. Bucklin, and Koen Pauwels (2009), "Effects of Word-of-Mouth versus Traditional Marketing: Findings from an Internet Social Networking Site." *Journal of Marketing, 73* (5), 90-102.

Tversky, A. (1977). Features of similarity. *Psychological review*, *84*(4), 327.

Thomson, K. S., and Oppenheimer, D. M. (2016). Investigating an alternate form of the cognitive reflection test. *Judgment and Decision making*, 11(1), 99.

Van Bavel, J. J., and Pereira, A. (2018). The partisan brain: An Identity-based model of political belief. *Trends in cognitive sciences*, *22*(3), 213-224.

Vosoughi, Soroush, Deb Roy, and Sinan Aral (2018). "The spread of true and false news online." *Science* 359 (63801), 146-1151.

The Sense of 'MINENESS': Exploring the Role of Ownership in New Consumer Domains

Chair: Ipek Demirdag, University of California, Los Angeles, USA

Paper #1: Creating Ownership Where Ownership Does Not Exist: Psychological Ownership Increases Enjoyment in Sharing Economy

Ipek Demirdag, University of California, Los Angeles, USA
Suzanne Shu, University of California, Los Angeles, USA

Paper #2: Virtual Touch Facilitates Psychological Ownership of Products in Virtual Reality

Andrea Webb Luangrath, University of Iowa, USA
Joann Peck, University of Wisconsin – Madison, USA
William Hedgcock, University of Minnesota, USA
Yixiang Xu, University of California, Berkeley, USA

Paper #3: "My Brand is Moving Away from Me": When Upgrade Products Leave Consumers Behind

Wonsuk Jung, University of Wisconsin-Madison, USA
Joann Peck, University of Wisconsin-Madison, USA
Mauricio Palmeira, University of South Florida, USA
Kyeongheui Kim, Sungkyunkwan University, South Korea

Paper #4: Heritage Loss: How Connection to the Past Shapes Consumer Valuation in the Present

Kate Christensen, University of California, Los Angeles, USA
Suzanne Shu, University of California, Los Angeles, USA

SESSION OVERVIEW

Buying and owning material and experiential products is indispensable for consumer judgment and decision making. Notwithstanding that initial research on ownership has concentrated on legal ownership's effect on valuation (e.g., Kahneman, Knetsch, and Thaler, 1990), recent research on psychological ownership has examined the effects of regarding something as "mine" in wide variety of areas from digital technology to financial decision making (Peck & Shu, 2018; Pierce, Kostova, & Dirks 2001). The present session gives prominence to the diverse impacts of ownership on consumer behavior.

The emergence of the sharing economy motivates the first paper (Demirdag and Shu) to consider the psychological ownership of these new shared goods and services. The authors document that sharing economy products like Uber rides or Airbnb stays produced a lower sense of psychological ownership than legal car or home ownership. By separately manipulating psychological ownership through intimate knowledge of the target and variety, the authors increase satisfaction with these shared services. Moreover, they demonstrate that collective (vs. individual) experiences reduced tip and satisfaction through reduced psychological ownership, suggesting that experiences in certain sharing economies are inherently solitary.

The second paper (Luangrath, Peck, Hedgcock, and Xu) examines the effect of vicarious touch. The authors study whether observing someone else touch a product increase the psychological ownership of a virtual limb and, hence, increase the psychological ownership of products. They find evidence for this effect, labeled the vicarious haptic effect. They find that vicarious touch leads to the psychological ownership of a product via a sense of body ownership of a virtual limb. This mediation holds under egocentric (from the perspective of oneself) but not allocentric (from the perspective of others) orientation.

The third paper (Jung, Peck, Palmeira, and Kim) investigates an effect of introductions of upgraded products on consumers' brand preference and examine how the effect may differ depending on ownership status. They find that the owners' feeling of being distanced from the brand decrease the owners' preference for the brand. Nevertheless, there is a positive effect of upgraded product for non-owners because without an anchor for self-referencing, non-owners are only positively influenced by the brand's competence signaled by its advanced products.

The final paper (Christensen and Shu) explores ownership felt towards extraordinary goods where ownership is collective, extending the self by connecting owners to history and important traditions. They establish a gap between a seller's willingness to accept from family versus from strangers, which is greater for inherited goods than for purchased goods. In addition, the paper identifies heritage value, that is, the degree to which an object extends the self by connecting the owner to history and traditions. They demonstrate that this heritage value predicts the gap in willingness to accept from family versus strangers.

Ownership is a key corollary of consumption, and this session spotlights its extensive applicability to consumer behavior. The diverse approaches taken by each paper and the varying aspects of ownership investigated will attract a broad range of ACR members interested in ownership, endowment effect, sharing economy, virtual reality experience.

Creating Ownership Where Ownership Does Not Exist: Psychological Ownership Increases Enjoyment in Sharing Economy

EXTENDED ABSTRACT

Since the 1950s, hyper-consumption, and ownership has defined economic security. A 1955 LIFE magazine article celebrated the idea of throwing away items after single-use and advertised several of these items, e.g., single-use barbeque grill, disposa-pan that "eliminates scouring of pots after cooking", and feeding bowl for pets that ends the "washing-up chore" ("Throwaway Living," 1955). Nowadays, we increasingly have a "reduce, reuse, and recycle" mentality. This notable shift away from the "own and dispose" society has laid foundations for the sharing economy. Consumers have come to the realization that legal ownership is not mandatory for consumption. They can access goods and services they cannot afford to purchase or simply do not own at the time of the consumption decision. To an increasing extent, value relies on technology and consumer experience, rather than ownership.

We examine a facet of sharing economy that has not been studied yet: psychological ownership, which is the sense that something is "mine" (Pierce, Kostova, & Dirks, 2001). The sharing economy presents novel ways of accessing goods and services without legal ownership. We suggest that consumption in this domain reduces psychological ownership compared to consumption based around legal ownership. This is problematic, as it can lead to the tragedy of the commons. For instance, shared scooters are vandalized, tossed off buildings, set on fire, and thrown into the ocean (Newberry, 2018). Our studies seek to increase psychological ownership, which could prevent these types of disastrous behavior.

In Study 1 ($N = 321$), we found that ownership of a hypothetical Uber ride is significantly correlated with the consumers' willingness to pay for the ride ($r = .14$, $p < .05$), tip for the Uber driver ($r = .11$, $p < .05$), and ride satisfaction ($r = .19$, $p < .01$). Furthermore, through planned comparisons we showed that real-life car owners

have a greater sense of ride ownership than real-life car leasers (F (1, 605) = 169.2, $p < .001$) and that leasers have a greater sense of ride ownership than Uber riders (F(1, 605) = 166.5, $p < .001$). Similarly, we found that real-life homeowners have a greater psychological ownership of their houses than renters (F (1, 450) = 257.7, $p < .001$) and that renters have a greater psychological ownership than AirBnBers (F (1, 450) = 20.04, $p < .001$). In sum, Study 1 demonstrated that psychological ownership of goods and experiences is lost in the sharing economies, at least in ride-sharing and space-sharing services, but that higher psychological ownership in sharing economies indicate greater satisfaction with experiences in sharing economies.

Study 2 ($N = 132$) was a field study in the domain of a scooter-sharing company, Bird. We found that psychological ownership of a scooter ride was correlated positively with ride satisfaction ($r = .34$, $p < .01$), likeliness of future rides ($r = .40$, $p < .01$), telling others about Bird ($r = .27$, $p < .01$), and general trust towards Bird ($r = .45$, $p < .01$). Although these results are correlational, our field study lays the groundwork for field interventions that augment psychological ownership, with the goal of increasing enjoyment derived from goods and services in the sharing economy.

In Study 3 ($N = 641$), we differential effect of collective (vs. individual) experiences. We found that sharing an Uber ride with a friend led to lower ride ownership (F(1, 639) = 4.591, $p = 0.03$). Moreover, a mediation analysis with 5,000 bootstrapped samples showed an indirect-only mediation for the effect of collective (vs. individual) experience on tip through ride ownership, indirect effect = -.016, 95% CI: [-.035, -.002]. A similar process was revealed for the effect of collective (vs. individual) experience on satisfaction through another mediation analysis with 5,000 bootstrapped samples, indirect effect = -.023, 95% CI: [-.049, -.004]. These results indicate that sharing an Uber ride with a friend reduces psychological ownership, and therefore, enjoyment, suggesting that experiences in ride-sharing are inherently solitary.

In Study 4 ($N = 645$), we aimed to increase psychological ownership. One of the routes of psychological ownership is intimate knowledge of the target (Pierce, Kostova, & Dirks, 2001). We found that providing information about the Uber driver (such as their rating, hometown, compliments they have received, languages they speak, number of years they have been an Uber driver, and the number of trips they have had) increased tip amount (F(1, 638) = 3.96, $p = 0.05$), WTP (F(1, 564) = 5.34, $p = 0.02$), satisfaction (F(1, 643) = 5.26, $p = .02$). Furthermore, this effect was mediated by ride ownership. A mediation analysis with 5,000 bootstrapped samples uncovered an indirect effect of information on tip through ride ownership, indirect effect = .018, 95% CI: [.004, .037]. Similarly, another mediation analysis with 5,000 bootstrapped samples demonstrated an indirect effect of information on satisfaction through ride ownership, indirect effect = .017, 95% CI: [.004, .042]. Thus, information about the driver increased ride enjoyment (specifically *tip* and *satisfaction*) through ride ownership.

In Study 5 ($N = 640$), we increased satisfaction through enhanced psychological ownership by bringing forth variety where the goods are typically identical (e.g., CitiBikes, Lime Bikes, Bird scooters). In a bike-sharing scenario, variety increased the ride enjoyment (indirect effect = .055, 95% CI = [.017, .103]) and willingness to ride in the future (indirect effect = .083, 95% CI = [.024, .149]) through enhanced psychological ownership of the ride.

In conclusion, psychological ownership of experiences is lower in sharing economies than it is in legal-ownership based consumption. Through our lab and field studies, we demonstrated that the higher the psychological ownership, the higher the enjoyment of the experiences. The implications of this research are important. Consumers lack the incentive to take care of the goods they access in the sharing economy, as they do not have to think about the long-term impact of their actions during the short period of time they consume these goods. An enhanced sense of psychological ownership could prevent these ruinous consequences and increase satisfaction with the experiences a sharing economy platform provides.

Virtual Touch Facilitates Psychological Ownership of Products in Virtual Reality

EXTENDED ABSTRACT

Online product videos and virtual reality (VR) interfaces enliven consumer experiences and are a source of product information. Intriguingly, these virtual environments often lack a semblance of "self" in the experience, oftentimes using a cursor rather than a virtual hand. In this research, we investigate vicarious touch, conceptualized as the observation of a virtual hand using a haptic exploratory procedure with a product in an online or virtual environment. Does the vicarious experience of virtual touch affect consumers' perceptions of psychological ownership? That is, does observing someone else touch make a consumer feel as if they, themselves, are touching the product? Previous research demonstrates that people can feel transported to a virtual space by blurring the lines of what is considered one's own body (Slater et al. 2008). A sense of body ownership is the feeling that the body that I inhabit is 'my own' and a part of 'me' (Tsakiris 2010). Psychological ownership, or the feeling that something is 'MINE!' (Pierce, Kostova and Dirks 2001), is often associated with greater product valuation (Peck, Barger, and Webb 2013; Peck and Shu 2009). We conjecture that vicarious touch increases body ownership of a virtual limb, which then increases psychological ownership felt of a product, termed the vicarious haptic effect.

Study 1 tests the main proposition that body ownership drives the effect of vicarious touch on psychological ownership. Participants ($N=208$) were either shown a video of a hand pointing toward a wristwatch or picking up and hefting the wristwatch. Psychological ownership (e.g., "I feel a personal ownership of the watch") and body ownership (e.g., "While viewing the video: 'I felt as if the hand in the video was my hand") were measured. An ANOVA reveals a significant effect of vicarious touch on body ownership ($M_{NoTouch}=1.78$, $M_{Touch}=2.84$, $F(1,194)=31.96$, $p<.001$, $\eta^2=.14$) and psychological ownership ($M_{NoTouch}=1.89$, $M_{Touch}=2.23$, $F(1,194)=3.86$, $p=.05$, $\eta^2=.02$). A mediational model demonstrates that body ownership mediates the effect of vicarious touch on psychological ownership (.3670; $CI_{95\%}=[.2326, .5109]$). These results reveal the vicarious haptic effect.

Given that vicarious touch facilitates a sense of body ownership for the displayed arms, we expect to attenuate this effect by altering the orientation of touch. Authorship processing suggests we leverage cues from the environment to discern whether an event has occurred as a result of oneself (Wegner and Sparrow 2004). Study 2 was a 2 (no touch/touch) x 2 (egocentric/allocentric orientation). MTurk participants ($N=209$) view a video displaying a hand either resting on the table or feeling the texture of the product. This was shown either from the perspective of the self or from the other. Results reveal a significant interaction between touch and orientation on psychological ownership ($F(1,185)=6.43$, $p=.012$, $\eta^2=.03$) such that perceptions of psychological ownership were significantly higher when viewing touch from an egocentric (vs. allocentric) orientation ($M_{EgoTouch}=3.13$, $M_{AlloTouch}=2.32$, $F(1,185)=4.28$, $p=.04$, $\eta^2=.02$) while there was no significant difference in orientation with no touch ($M_{EgoNoTouch}=2.50$, $M_{AlloNoTouch}=3.08$, $F(1,185)=2.29$, $p=.13$, $\eta^2=.01$). A significant mod-

erated mediational model indicates that body ownership mediates the relationship between vicarious touch and psychological ownership under conditions of egocentric orientation but not allocentric orientation (-.5205; $CI_{95\%=}$[-1.0193, -.0310]).

In study 3, we test whether the vicarious haptic effect holds in virtual reality. Further we examine if having one's own hands occupied (i.e., holding onto balls) interferes with feelings of body ownership. We created a 360° virtual reality retail store. The design was a 2 (vicarious touch/cursor) x 2 (hands occupied/hands free). Undergraduates (*N*=255) viewed a VR retail store on Oculus headsets. Participants responded to a variety of additional measures including willingness to pay, product evaluation, and purchase intention. Results of an ANOVA reveal a significant effect of vicarious touch on body ownership (F(1,241)=20.31, *p*<.001, η²=.08). Holding onto something (thereby having one's hands occupied) did not dampen the effect of vicarious touch on body ownership (F(1,239)=.346, *p*=.56). Body ownership mediates the effect of vicarious touch on psychological ownership (.1642; $CI_{95\%}$=[.0855, .2590]), purchase intention (.1320; $CI_{95\%}$=[.0596, .2239]), product evaluation (.1093; $CI_{95\%}$=[.0508, .1828]), as well as willingness to pay (.3320; $CI_{95\%}$=[.1164, .6245]).

A human need for stimulation or activation is one of the fundamental motives that is considered the reason for the existence of the psychological state of ownership (Pierce and Jussila 2011; Pierce and Peck 2018). Heart rate is one physiological manifestation of this individual difference in need for stimulation (Mathias and Stanford 2003). We expect that those highly stimulated by VR would feel stronger effects of vicarious touch on psychological ownership. Undergraduates (*N*=144) viewed a VR retail store while having their heart rate measured on a Biopac MP36. Study design was similar to study 3 with the addition of a no touch condition in which participants saw a hand but it did not touch the product. Viewing the virtual touch, as opposed to no touch and cursor, enhanced feelings of body ownership (F(2,141)=6.55, *p*=.002, η²=.09). Mediational analyses replicate the effects from study 3. There is a significant interaction with vicarious touch and heart rate on psychological ownership (*β* =-.065, *t*(123) = -2.25, *p*=.026). For highly stimulated individuals (+1 sd heart rate change), the effect of vicarious touch on psychological ownership is positive and significant (*t*(123)=-2.17, *p*=.03) while for those low in stimulation (-1 sd heart rate change) the relationship between vicarious touch and psychological ownership is not significant (*t*(123)=-1.096, *p*=.28).

We document the power of virtual touch. Our research demonstrates that vicarious touch increases a sense of psychological ownership of a product, which occurs due to a sense of body ownership of the virtual hands. We find that not only should a virtual hand be present, but it should be engaging haptically with the product. We further show that this effect is attenuated when observing touch from the perspective of another (i.e., allocentric orientation) as opposed to oneself (i.e., egocentric orientation). The effect is robust even if the observer's hand is otherwise occupied. Finally, using the physiological measure of elevation of heart rate, we demonstrate that for those individuals who become highly stimulated in VR, the effect of vicarious touch on psychological ownership is strengthened.

"My Brand is Moving Away from Me":
When Upgrade Products Leave Consumers Behind

EXTENDED ABSTRACT

In today's advanced economies, continual product enhancement through product upgrades is deemed a key component of a firm's success. Despite the increasing prevalence of upgrades, however, only limited research has investigated its implication for consumers' attitudes toward upgrades.

In this research, we aim to broaden an understanding of the emerging but limited body of research on product upgrades. Specifically, we investigate an effect of introductions of upgraded products on consumers' brand preference and examine how the effect may differ depending on ownership status. We propose that the release of an upgraded product has distinct psychological effects on consumers who are current owners of the brand, and that this psychological process would subsequently influence how much they prefer their current brand. Contrary to common intuition, we argue that the introduction of an upgrade could have an undesirable effect on current owners (but not for non-owners). We propose that since owners perceive the product they currently own as a representation of "me" (Weiss and Johar 2013, 2016) and perceive the new upgraded product as an embodiment of "the brand" (John, Loken, and Joiner 1998), the upgrade product would make the owners feel as if the brand has moved away from them just as the new product has advanced away from its previous versions. Feeling distant from a brand results in a less positive consumer-brand relationship, which in turn decrease brand commitment (Park, Eisingerich, and Park 2013). In line with the findings, we propose that the owners' feeling of being distanced from the brand would decrease the owners' preference for the brand. For non-owners, however, we expect to observe a positive effect of upgraded product because without an anchor for self-referencing, non-owners are only positively influenced by the brand's competence signaled by its advanced products (Heath, DelVecchio, and McCarthy 2011).

Four studies support our predictions. Throughout studies, we measured participants' purchase intention and their general attitudes toward the brand as dependent variables. For purchase intention, we measured consumers' willingness to choose the brands for purchasing another product because upgraders are often hindered by mental cost of retiring their current products that are still functional (Okada 2006).

Study 1 examined actual brand owners' and non-owners' responses to the release of upgraded products, and tests the underlying process. To this end, we recruited 344 owners and non-owners of Apple 10th generation iPhone and assessed their responses to the presence of newer generations of iPhones. To manipulate the presence of upgraded products, we manipulated the saliency of the upgrades to make them look either more or less apparent for consumers. The owners and non-owners were randomly assigned to either a control or an upgrade condition and were asked to rate their purchase intention (computer monitor), brand attitude, and perceived relational closeness toward Apple as a process measure using IOS scale (Aron, Aron, and Smollan 1992). The result revealed a significant 2 (upgrade) X 2 (ownership status) interaction (p < 0.01). Participants in the owner (non-owner) condition were less (more) willing to choose Apple when purchasing another product if the upgraded products were made more salient compared to when they were made less salient. The results for brand attitude (α = 0.96) followed the parallel pattern. Moderated mediation analysis suggested that the indirect effect of upgraded products through IOS varies as a function of ownership status (p = 0.08); the conditional indirect effect of upgraded products was significant for owners (p < 0.05) but not for non-owners (p > 0.1).

Study 2 replicates the findings from Study 1 in a more controlled setting with hypothetical scenarios to eliminate prior brand knowledge. As in Study1, results on purchase intention (microwave)

revealed the anticipated 2 (upgrade) X 2 (ownership status) interaction ($p < 0.01$), showing that owners (non-owners) were less (more) willing to choose the brand when the brand released upgraded products. The results for brand attitude ($\alpha = 0.94$) followed the parallel pattern. and the moderated mediation analysis replicated the finding from Study 1 ($p < 0.05$).

Study 3 put the focus on owners and further examined the underlying process using a moderation-of-process approach by manipulating the extent to which the focal brand is manipulated as psychologically close or neutral to one's self. Study 3 also tested an alternative explanation that upgrades makes owners unhappy because they see a frequent release of upgrades as an attempt by brands to entice consumers to unnecessarily spending. To test this account, we incorporated an additional condition in which the interval between the new upgrades is manipulated to be longer. 362 students participated and were randomly assigned to one of six conditions in a 2 (brand-self distance: neutral vs. close) X 3 (upgrade: no-upgrade vs. upgrade vs. upgrade-after-three-years) between-subjects design. The result showed that the brand-self distance moderates the predicted pattern (2, -1, -1 contrast) across the three upgrade conditions ($p < .01$). As predicted, when the brand-self distance was perceived close (neutral), participants were no less (less) likely to choose their current brand in both the upgrade and the upgrade-after-three-years condition than in the no-upgrade condition.

Study 4 complements our experimental results with evidence from a real-world dataset containing vehicle ownership data of 49,998 households across the United States. Using a multilevel model incorporating 30 different automobile brands and 294 different car models nested within the brands, we find that as the number of newer generations of car models that current households own increases in the market, the households become more likely to switch their brand rather than to stay loyal for their next car purchase.

We believe that our research may offer substantive implications in today's ever innovating economies. We suggest that while managers intend to leverage brand equity among consumers through product enhancement, the presence of new upgrades may in fact come with unintended consequences. Therefore, adequate strategy may be needed that pays special attention to current consumers.

Heritage Lost: How Connection to the Past Shapes Consumer Valuation in the Present

EXTENDED ABSTRACT

Heritage – a connection to a shared past – is a fundamental part of human experience, and consumers' interest in connecting to the people who came before them has been growing (Belk 1990; Csikszentmihalyi and Rochberg-Halton 1981)researchers, and students discover, use, and build upon a wide range of content in a trusted digital archive. We use information technology and tools to increase productivity and facilitate new forms of scholarship. For more information about JSTOR, please contact support@jstor.org. Psychology and Things The Manchester seminars on Technology as Skilled Practice brought together perspectives from a number of disciplines, including anthropology, history, and psychology. As an intentionally peripheral psychologist, I thought twice about attending an interdisciplinary meeting willing to include psychologists. Academic psychology throughout its brief history has been remarkably anxious about dem arcating its own exclusive subject — the \"subject\" — and has perpetuated, even ins titutionalized, the traditional dualism within modern science of the objective and subjective. Psychology (along with the other human sciences. From the popularity of heritage travel on Airbnb to the trendiness of heritage fabrics in England,

guochao style in China, consumers have increasingly chosen to buy goods that connect them to a shared past (Achim 2019; Duveau and Dumenil 2018; Killam 2019; Luo 2019; Rapp 2019).

In this project we explore how a connection to this shared past affects consumer valuations in the present. This research on heritage connection builds on the sharing literature, which has introduced the concept of "ours" and called for work on how the aggregate extended self – "us" – affects consumer practices (Belk 2010, 2017; Curasi, Price, and Arnould 2004; Epp and Price 2008; Lastovicka and Fernandez 2005). The current work also extends research on the endowment effect by exploring how collective ownership of the shared past can impact sellers' WTA (Brough and Isaac 2012; Dommer and Swaminathan 2013; Morewedge, Shu, Gilbert, and Wilson 2009; Shu and Peck 2011; Weiss and Johar 2013)a phenomenon called the endowment effect. Loss aversion has typically accounted for the endowment effect, but an alternative explanation suggests that ownership creates an association between the item and the self, and this possession-self link increases the value of the good. To test the ownership account, this research examines three moderators that theory suggests should affect the possession-self link and consequently the endowment effect: self-threat, identity associations of a good, and gender. After a social self-threat, the endowment effect is strengthened for in-group goods among both men and women but is eliminated for out-group goods among men (but not women. We predict that the same factor – heritage connection - increases valuations for both sellers and buyers—but it has the opposite effect that an economist would predict on selling prices. The buyer's heritage connection reduces the seller's WTA.

We define heritage connection as a good's capacity to bridge the gap between the consumer and their heritage by helping the consumer remember where they come from, giving them a sense of history, and connecting them with the people who came before them. In four studies, we find a main effect such that sellers set lower prices for heritage goods when selling to buyers with heritage connection, relative to buyers without heritage connection (i.e., the heritage discount).

In Study 1, we sampled California residents on Mturk ($N = 400$). The study ran online during the 250th anniversary of Monterey, a city in California that is home to California's first constitution, California's first scenic highway, and is the first place where Californians raised the American flag. Monterey also has an aquarium, and visitors come to see it. We informed participants that one person taking the study would receive a Monterey 250th anniversary hat, and that it would be theirs to keep. We endowed participants with the anniversary hat, and we measured participants actual WTA for this heritage good using the Becker DeGroot Marschak test (Becker, Degroot, and Marschak 1964) As predicted, sellers' WTA from a control buyer (visitor to Monterey) was higher than their WTA from the heritage buyer (resident of Monterey), $t(1,364) = 2.32$, $p = .021$. Sellers had a lower WTA for heritage buyers despite indicating that heritage buyers would value the good more ($p < .001$). Further, the effect of heritage held after adding controls for buyers' usage ($p = .030$). Thus, Study 1 provided preliminary evidence for a heritage discount.

Study 2 tested heritage in a new domain using real goods that people have in their homes. Participants ($N = 547$) were randomly assigned to answer questions about either an inherited or a purchased item in their home that would normally cost less than $1000. Participants indicated their WTA from both a close family member and a stranger. As predicted, the simple effect of stranger vs. family for heritage products was larger than the simple effect of stranger vs. family for non-heritage products. The interaction of buyer's identity

and product type (heritage vs. no heritage) was significant, all p's < .001, and sellers' heritage connection to a good moderated the heritage discount with more connected sellers giving larger discounts, $F(1, 545) = 46.20$, $p < .001$. Specifically, we found that the greater the seller's heritage connection, the larger the heritage discount connected buyers received, $B = 1.405$, SE =.175, $t(545) = 8.04$, $p < .001$.

At this point, it seemed like holding the item constant and manipulating heritage connection might provide an even cleaner test of our hypothesis, and we did this in Study 3. We asked participants ($N = 400$) to imagine that they were going through storage and found a watch from their great grandfather. In a between subjects design, we asked them to consider selling this heritage good to a control buyer or a heritage buyer, and we specified usage: both buyers would use the watch as they went about their daily work. Sellers set a lower WTA for heritage buyers than control buyers, $t(386) = 2.50$, $p = .013$. There was no difference in appropriateness of usage between conditions, $p = .714$. We also measured seller's heritage connection, buyer's perceived heritage connection, and we calculated heritage loss (i.e., the difference between a seller's heritage connection and a buyer's heritage connection). Overall, Study 3 provided strong evidence that heritage loss mediates the effect of buyer's identity on the seller's WTA (95%, CI = $127.25, $218.35). Next, we sought to validate these findings in an incentive compatible context.

In Study 4, we sampled the population on the campus of a large American research university ($N = 388$), and endowed participants with a good symbolizing 100 years of the university's history. In a between subjects, fully incentive compatible task, participants indicated their WTA from a heritage buyer (student at their university) or their WTA from a control buyer (stranger with no university connection). As predicted, participants' WTA from a control buyer ($2.65) was higher than their WTA from a heritage buyer ($2.20, $F(1,385) = 6.54$, $p = .011$). Further, we found this effect was mediated by heritage loss.

In conclusion, this research suggests that the shared past affects consumer valuations in the present. In four studies, we quantify the value of this heritage connection, and these findings have significance for marketing practice. Our research has applications to marketers of products that appeal to consumers' desire to connect to their heritage across time as well as markets that involve resale (e.g., housing and collectibles).

REFERENCES

Achim, A.-L. (2019). Market Trends | Successful "Heritage" Marketing Resonates with Consumers in China. Retrieved December 8, 2019, from https://jingdaily.com/successful-heritage-marketing-resonates-with-consumers-in-china/

Aron, Arthur, Elaine N. Aron, and Danny Smollan (1992), "Inclusion of other in the self scale and the structure of interpersonal closeness," Journal of personality and social psychology, 63(4), 596.

Becker, G. M., Degroot, M. H., & Marschak, J. (1964). Measuring utility by a single-response sequential method. *Behavioral Science*, 9(3), 226–232.

Belk, R. (2010). Sharing. *Journal of Consumer Research*, 36(5), 715–734.

———. (2017). Sharing without caring. *Cambridge Journal of Regions, Economy and Society*, 10(2), 249–261. https://doi.org/10.1093/cjres/rsw045

———. (1990). The Role of Possessions in Constructing and Maintaining a Sense of Past. *ACR North American Advances*, NA-17.

Csikszentmihalyi, M., & Rochberg-Halton, E. (1981). *The meaning of things*. *The meaning of things*. Cambridge University Press. https://doi.org/10.1017/cbo9781139167611

Curasi, C. F., Price, L. L., & Arnould, E. J. (2004). How Individuals' Cherished Possessions Become Families' Inalienable Wealth. *Journal of Consumer Research*, 31(3), 609–622.

Duveau, J., & Dumenil, S. (2018). Opinion: Heritage has Become Hip With Chinese Millennials | Jing Daily. *Jing Daily*. Retrieved from https://jingdaily.com/opinion-heritage-has-become-hip-with-chinese-millennials/

Epp, A. M., & Price, L. L. (2008). Family Identity: A Framework of Identity Interplay in Consumption Practices. *Journal of Consumer Research*, 35(1), 50–70.

Heath, Timothy B., Devon DelVecchio, and Michael S. McCarthy (2011), "The asymmetric effects of extending brands to lower and higher quality," Journal of Marketing, 75(4), 3-20.

John, Deborah Roedder, Barbara Loken, and Christopher Joiner (1988), "The negative impact of extensions: can flagship products be diluted?," Journal of Marketing, 62(1), 19-32.

Killam, A. (2019). Check-In to the Trend: Heritage Travel on the Rise. Retrieved November 30, 2019, from https://news.airbnb.com/check-in-to-the-trend-heritage-travel-on-the-rise/

Lastovicka, J. L., & Fernandez, K. V. (2005). Three Paths to Disposition: The Movement of Meaningful Possessions to Strangers. *Journal of Consumer Research*, 31(4), 813–823.

Dommer, S., & Swaminathan, V. (2013). Explaining the Endowment Effect through Ownership: The Role of Identity, Gender, and Self-Threat. *Journal of Consumer Research*, 39.

Luo, J. (2019). Can 'Made in China' be cool? Yes, if the West thinks so | Goldthread. Retrieved December 10, 2019, from https://www.goldthread2.com/culture/made-in-china-guochao-hipster/article/3027942

Mathias, C. W. & Stanford, M. S. (2003). Impulsiveness and arousal: Heart rate under conditions of rest and challenge in healthy males. *Personality and Individual Differences,* 35(2), 355-371.

Morewedge, C. K., Shu, L. L., Gilbert, D. T., & Wilson, T. D. (2009). Bad riddance or good rubbish? Ownership and not loss aversion causes the endowment effect.

Newberry, L. (2018, August 10). Fed-up locals are setting electric scooters on fire and burying them at sea. Los Angeles Times. Retrieved from https://www.latimes.com/local/lanow/la-me-ln-bird-scooter-vandalism-20180809-story.html

Okada, Erica Mina. (2001), "Trade-ins, mental accounting, and product replacement decisions," Journal of Consumer Research, 27(4), 433-446.

——— (2006), "Upgrades and new purchases," Journal of Marketing, 70(4), 92-102.

Park, C. Whan, Andreas B. Eisingerich, and Jason Whan Park (2013), "Attachment–aversion (AA) model of customer–brand relationships," Journal of consumer psychology, 23(2), 229-248.

Peck, J., Barger V. A., & Webb A. (2013). In search of a surrogate for touch: The effect of haptic imagery on perceived ownership. *Journal of Consumer Psychology,* 23 (2), 189-196.

Peck, J. & Shu S. (2009). The effect of mere touch on perceived ownership. *Journal of Consumer Research,* 36 (3), 434-447.

Pierce, J. L., Kostova, T. & Dirks, K.T. (2001). Toward a theory of psychological ownership in organizations. *Academy of Management Review*, 26 (2), 298-310.

Rapp, J. (2019). Heritage rediscovered. Retrieved from https://www.jwtintelligence.com/2019/01/heritage-rediscovered/

Shu, S. B., & Peck, J. (2011). Psychological ownership and affective reaction: Emotional attachment process variables and the endowment effect. *Journal of Consumer Psychology*, *21*(4), 439–452.

Slater, M, Marcos, D.P., Ehrsson, H., & Sanchez-Vives, M. V. (2008). Towards a digital body: The virtual arm illusion. *Frontiers in Human Neuroscience*, 2, 6.

Strahilevitz, M. A., & Loewenstein, G. (1998). The Effect of Ownership History on the Valuation of Objects. *Journal of Consumer Research*, *25*(3), 276–289.

Tsakiris, Manos (2010). My body in the brain: A neurocognitive model of body-ownership. *Neuropsychologia,* 48 (3), 703-712.

Wegner, D. M., & Sparrow, B. (2004). Authorship processing. In M. S. Gazzaniga (Ed.), *The cognitive neurosciences* (pp. 1201-1209). Cambridge, MA, US: MIT Press.

Weiss, L., & Johar, G. V. (2013). Egocentric Categorization and Product Judgment: Seeing Your Traits in What You Own (and Their Opposite in What You Don't). *Journal of Consumer Research*, *40*(1), 185–201.

——— (2016), "Products as self-evaluation standards: When owned and unowned products have opposite effects on self-judgment," Journal of Consumer Research, 42(6), 915-930.

Monetizing the Megaphone: How Consumers and Firms Use Platforms to Conquer the Attention Economy

Chair: Zeynep Arsel, Concordia University, USA
Discussant: Ashlee Humphreys, Northwestern University, USA

Paper #1: Problematizing the Megaphone: The Very Difficult Journey to Becoming an Influencer

Thanh Nguyen, Concordia University, Canada
Pierre-Yann Dolbec, Concordia University, Canada

Paper #2: Aesthetics of Food: The Role of Visual Framing Strategies for Influence Building on Instagram

Shuhan Yang, Rochester Institute of Technology, USA
Jonathan Schroeder, Rochester Institute of Technology, USA
Duygu Akdevelioglu, Rochester Institute of Technology, USA

Paper #3: Orchestrating Pet Influencers: Rhetorical and Visual Strategies in Creating Mediated Platform Content

Ghalia Shamayleh, Concordia University, Canada
Zeynep Arsel, Concordia University, Canada

Paper #4: Marketing Memeification on TikTok: Initiating and Leveraging Consumer Creativity for Commercial Means

Jenna Drenten, Loyola University Chicago, USA
Pilar Castro González, Universidad Loyola Andalucía, Spain

SESSION OVERVIEW

Platforms have allowed ordinary consumers to monetize their creative and expressive pursuits. This session brings together four papers that inquire about the tricky, increasingly complex, and multi-actor world of influencer business and provide conceptual and empirical contributions to understand social media consumption.

Monetization of influence provides fruitful areas of inquiry for researchers. Among these, we uncover 1) entrepreneurial pursuits of ordinary consumers to become influencers, 2) the dialectical tensions between promotion and expression in online content, 3) interactions and relations between the audience, influencers, and firms, 4) codification and framing of content to meet audience and firm expectations. Collectively, the papers in this session provide distinctive insights into these issues.

The first paper revisits the megaphone effect and provides a revision to the theory by demonstrating the struggles of ordinary consumers in their quest for becoming influencers. By acknowledging their struggles, this paper provides a needed corrective to the myth of meritocratic and serendipitous journey of becoming and being an influencer. Findings are expanded to explain why consumers leave fields more generally.

The second paper provides a mixed method analysis of food images on Instagram and explores how different visual framing strategies contribute to the engagement strategies of top-ten food influencers. Combining quantitative and qualitative analysis, the authors show distinct patterns of representation of food using strategic composition and visual framing. These patterns also reflect long-standing distinctions between the raw and the cooked.

The third paper investigates the phenomenon of pet influencers. Through studying account managers who generate platform content around the performances of their pets, the authors uncover visual and rhetorical strategies of their engagement. The participants implement anthropomorphism through intertextual manipulation of the visual and textual content and orchestration of realistic or fantasy performances.

The final paper explores how platform content is shaped by memes that are also controlled and seeded by firms. The authors show how memes are actively initiated, surveilled, and leveraged by firms. They show how companies use sponsored hashtags to entice consumers to engage with brand content through three types of call to action, where paid influencers take the lead, followed by everyday (unpaid) consumers amplifying the message.

Together, the papers in this session tackle the following questions:

1. How do consumers position themselves as influencers in the attention economy?
2. How do consumers invest in and deploy resources to strengthen their positioning?
3. How do consumers use platforms' expressive capacities to create engagement?
4. How do consumers interact with firms to convert attention to value and revenues?

The session provides a meeting point for scholars using different methods (quantitative and qualitative) and complementary perspectives to understand social media. It investigates the role of different actors that participate in the influencer business: pets, firms, and consumers—as both creators and audiences. All papers are in advanced stages with empirical work completed. Papers also use mixed methods which will attract broader attention. Due to the significance and relevance of the substantive context, we expect a range of ACR members to show interest in the session.

Problematizing the Megaphone: The Very Difficult Journey to Becoming an Influencer

EXTENDED ABSTRACT

If we were to listen to the depiction of influencers in the mainstream press and some academic articles, we might conclude that persistent efforts from meritocratic consumers will lead to them becoming influencers. Duffy and Wissinger (2017) refer to this mythologized portrait of the path to become an influencer as 'glamorized.' In reality, becoming an influencer is a difficult project that is unlikely to yield results (Duffy 2016). Despite this acknowledgment of the struggles inherent to becoming and being an influencer, we know surprisingly little of what exactly these struggles are and how they affect ordinary consumers' quest for influence. These are the two research questions we answer in this project.

These research questions are important for many reasons. Centrally, there were more than 3.7 million ads by influencers on Instagram in 2018, and 90% of Instagram campaigns in 2018 used micro-influencers—influencers that have somewhere between 1000 and 100 000 followers (HubSpot, July 15th, 2019; Wired, Apr 22nd, 2019). Micro-influencers represent about 25% of the Instagram user base, or about 250 million people (Mention.com 2018). These developments are giving ordinary consumers—consumers who do not possess a privileged position in social fields (McQuarrie, Miller, and Phillips 2013)—increasing opportunities to capitalize on their (micro) influence. This has translated into an increasing number of ordinary consumers wanting to become influencers: More than 75% of people aged between 5 and 38 state wanting to become one

(DailyMail, May 22nd, 2017; People, Nov 5th, 2019). The glamorized picture of influencers is thus problematic, as it represents a highly biased understanding of this role and the path to become an influencer. Theoretically, this is a glaring omission in a rapidly rising and important role of the digital economy. Practically, this mythologized understanding of what is required to become an influencer can lead consumers to pursue an identity project that is bound to fail.

We answer our research questions by analyzing repeat interviews with 23 micro-influencers with different followings: (1) less than 10k followers, (2) between 10k and 50k followers, and (3) between 50k and 100k followers. We complement these interviews with all Instagram posts and a month of Instagram Stories from our participants, as well as archival data in the form of articles for and on influencers (166 pages).

We leverage McQuarrie, Miller, and Phillips (2013) work and concentrate on three main stages that explains the movement of an ordinary consumer to online influencer: acquiring an audience, maintaining and expanding an audience, and deriving benefits from an audience.

When entering the field and starting to acquire an audience, ordinary consumers face struggles associated with the breadth of expertise required to perform their role and the work demanded to better their expertise to do so. For example, consumers realize that, in addition to being proficient in successfully making risky taste displays (McQuarrie, Miller, and Phillips 2013), they also need to know how to use the Instagram algorithm to their advantage, create thematically related images (vs. only one risky display of taste), and do proper make-up and poses.

When maintaining and expanding their audience, consumers need to address changes in their audience expectations, which now demand continuous content creation. We show how consumers take two strategies to address this: they broaden their expertise to multiple fields (e.g., from fashion to food, travel, and design), or deepen their expertise in their focal field of interest (e.g., from fashion stylist to critic, historian, and tailor). This increases demands in terms of consumer expertise, which exponentially heightens the involvement required to continue pursuing their quest for influence. We also find that consumers become objectified by their audience, which brings its own set of struggles associated with addressing negative and unwanted comments and requests.

Lastly, when converting their audience into benefits, consumers need to understand how to position themselves effectively in the market for influencers (i.e., have an effective positioning from the perspective of brands who might hire them), how to develop their unique brand, and how to deal with commercial clients. Here again, we find that consumers are often ill-equipped to address the scope of tasks asked from them, which have become increasingly removed from what led them to start wanting to be an influencer in the first place.

Each of these stages come with its own set of difficulties, which leads influencers to abandon their project. At least in our sample, these difficulties led to more than half our participants (13 out of 23) to discontinue their influencer activities. And the number of followers did not play a role in convincing influencers to continue their quest: We have many instances of Instagram influencers with more than 50 000 followers who abandoned their quest, for example, because converting their audience was deemed too difficult.

Our work contributes to the literature on influencers and consumer involvement in a consumption field. First, the struggles we identify lead us to provide an important revision as to how ordinary consumers become influencers (cf. Erz and Christensen 2018; McQuarrie, Miller, and Phillips 2013). Second, we use this revised journey to propose an alternative to the dominant theorization of how consumers become influencers. Instead of consumers taking risks when sharing their passion in a consumption, and how they accumulate followers by doing so (see Erz and Christensen 2018; McQuarrie, Miller, and Phillips 2013), we suggest conceptualizing at least a segment of influencers as digital entrepreneurs whose journey to become influencers is active and intentional; For example, they readily create a brand from the get-go, strategically think about their market positioning, and use numerous market resources (e.g., buying followers) to achieve their objective. Lastly, we generalize the struggles we identify to any consumer highly involved in some consumption activity (e.g., see Stebbins 1982 on serious leisure) to provide three main reasons why they leave consumption fields.

Aesthetics of Food: The Role of Visual Framing Strategies for Influence Building on Instagram

EXTENDED ABSTRACT

Social media produces a megaphone effect that offers a mass audience to ordinary consumers (McQuarrie and Phillips 2013). Images of food dominate social media, which has revolutionized the world of gastronomy and food (Allué 2013). Food is a central part of defining identity, as well as shaping collective, cultural identities (Lupton 1996). The transformative, aesthetic aspects of food often reflect social status and prestige. Food and eating, beyond survival and sustenance, can be understood as an aestheticized expression of identity, status, and taste. Such taste expressions can be regarded as a taste regime that helps to explain how individuals gain cultural capital in the marketplace – often via social media (Arsel and Bean 2013). By posting food images and seeking feedback from followers through the "likes", the influencers provide repeated stimuli to control followers' behavior. Owing to the value creation effect, influencers are becoming a taste maker, and building an informal social norm (Hackman 1992) which will influence how followers perceive food.

Food serves as a powerful system of communication. Food and eating connect consumers to their biological and cultural heritage (Allen 2012). Food is the basis of many consumer habits and rituals (Marshall 2005). The aesthetics of food consumption can be traced back to Epicureanism, an individualistic and communal philosophy that emphasizes the central role of pleasure, laying the foundation for aesthetic appreciation, including appreciation of food and taste. French writer Brillat-Savarin introduced the idea of you are what you eat, and articulated a philosophical approach to cooking (Brillat-Savarin 2009). During the twentieth century, food marketing has shifted from nutrition appeals to more hedonic taste appeals. Intrinsic motivation such as seeking leisure becomes the main purpose of participating in online interaction. Perceived enjoyment derived from the theory of reasoned action (TRA) and the technology acceptance model (TAM) significantly influence online community's loyalty (Hsu and Lu 2007), this study, was inspired by these theories to explain how influencers apply visual framing strategies as intrinsic motivation on technology use. To better understand influence marketing in the context of how technology interacts with gastronomy, it is essential to analyze online images that connect taste consumption with visual consumption (Schroeder 2002).

Among different social media platforms, Instagram specializes in efficiently distributing visual rhetoric on a personal or global scale to its over 500 million daily active users (Statista 2018). Food influencers create an informal social norm via the repeat use of a circle loop starting from food preparation decision to feedback collection and post recreation. This value creation process prompts the influencer to become a taste maker considering the preferences of

"visual consumers". In the historical view, this online food images sharing is different from classical business model using their unique virtual "words". It is a complex practice that has relational, social, and cultural significance. However, the visual aspect of these practices, especially as it related to influencer marketing often remains understudied. Therefore, the purpose of this study is to identify framing strategies that influence consumer engagement on social media. The behavior of highlighting certain facets and concealing others is a central tenet of framing theory (Entman 1993). Framing affects how audiences interpret and react to scenarios, images, and text. By taking advantages of various rhetoric tools like symbols, metaphors, and depictions, visual imagery operates as a framing device (Rodriguez and Dimitrova 2011).

The research questions this paper aims to answer are:

* RQ1: What do the top ten most-followed food channel Instagram influencers post on their accounts?
* RQ2: What framing strategies do the top ten most-followed food channel Instagram influencers use to visually represent food posts to facilitate consumer engagement?

The Instagram accounts for this study were selected based on a formal ranking by Statista, which is an online statistic, market research, and business intelligence portal that provides access to data from market and opinion research institutions. Statista presented the most-followed food influencers on Instagram in the United States as of January 2018 (Statista 2018). Based on the reliable external assessment data, this study used content analysis to investigate how different categories of visual framing mutually or independently contribute to the popularity of these top ten food influencers.

Using the food-related images posted by these food influencers from January 1 to December 31, 2017, and selected images that received more than 10,000 "likes" on the influencer`s account. The ten influencers included two men and eight women; one of the accounts did not indicate gender. Images were randomly selected in each influencers' Instagram, one image per month, obtaining a total of N = 120 posts.

Content analysis views data such as images, text, and expressions to be seen and interpreted for their meanings (Krippendorff 2012). We also combined qualitative content analysis with frequency and Chi Square-tests. We developed a codebook of attributes after observing most of the images and divided them into two parts: influencers and food. The coding categories are partially based on the Duncan (1990) study, which offers a visual analysis using contextual readings of visual photographic imagery. Images were analyzed in 13 nominal categories. Acceptable levels of inter-coder reliability via Krippendorff's alpha were achieved and ranged from 0.86 to 1.0 for each variable tested.

The findings show distinct patterns in how food is represented in Instagram posts. Food influencers prefer to post images about cooked food, without little decoration, using high contrast colors and close-up shots. Most posts do not include "background" elements such as clothing, facial expression, or proximity to influencers. Random placement and casual layout are more of a reflection of the influencer's own leisure lifestyle; strategies also reflect influencers' social network identity construction. Raw food images were found to be associated with cluttered composition and far away shoots, whereas cooked food images were associated with high contrast and close-up, especially the top-down camera angle. Cooked food images serve as a justification agent for consumers, "thereby reducing the conflict associated with the subsequent indulgent consumption experience and increasing taste perceptions" (Poor, Duhachek, and Krishnan 2013, 124).

Our analytical categories of raw and cooked food draw inspiration from anthropologist Claude Lévi-Strauss's influential work on the raw and the cooked as basic categories for understanding human culture (1983). Perhaps inadvertently, it appears that influencers' social media posts reflect fundamental, long-standing distinctions of the raw and the cooked. Of course, raw food, when appearing on Instagram, is generally highly aestheticized. However, we find this distinction meaningful, and useful for understanding some basic elements of food posting. Moreover, these factors including social norm, perceived enjoyment, and cultural intermediaries have a significant effect shaping followers' behavior via the value creation process. Our framework emphasizes the importance of how food can be accommodated within the framework of a meal, and how taste could be used as an approach to describe aesthetic norms. The interaction between real-life meal gatherings and social media creates a combined type of "commensal" experience, one that fosters a sense of community, despite occurring online (Bouvier 2018). Food represents an ideal way to achieve such a sense. This study represents a step toward a more cogent understanding of food influencers on Instagram, informed by historical discussion of aesthetics and taste. In addition to implications such as the visual framing effects of advertising for influencer marketing, future studies may investigate and the role of food influencers as 'cultural intermediaries' as described Bourdieu (1984) to help us explain the set of activities and professions in the creation of markets and consumption economies like how music bloggers mediate and orient consumer taste (Arriagada and Cruz 2014).

Orchestrating Pet Influencers: Rhetorical and Visual Strategies in Creating Mediated Platform Content

EXTENDED ABSTRACT

As we are writing this, one of the most popular influencers in the world is not a person but a cat with 4.3 million followers on Instagram. Nala is an 8-year-old cat who became Instagram famous after her human companion created the account to share images with her family who resides overseas. Nala's audience has expanded to other platforms, such as Facebook, YouTube, and Twitter, where she has 2.6M followers, 27K subscribers, and 24.9K followers, respectively, creating a multi-platform megaphone.

Despite the prevalence of pet influencers, there is a paucity of studies on the subject matter. While influencers or microcelebrities who manage their own accounts have been explored by scholars (Abidin, 2015, 2016, 2018; Khamis, Ang, & Welling, 2017; Marwick, 2013, 2015; McQuarrie et al., 2012; Senft, 2008, 2013)—also see papers in this session—, the mediated nature of pet influencers, particularly the ways humans orchestrate their animal companions performatively, manage their online presence, and capitalize on the attention for their pets require further attention. This is important because what sets apart the phenomenon from others is its two boundary conditions: 1) The duality and mutuality of presence of human account managers alongside their pets in social media performances, and 2) The second-degree performance and sociality that is mediated through the pets and with other pet companions. These boundary conditions allow contextualizing a new theorization of the triadic and mediated relationship between humans, their animal companions, and their audience in platforms.

Our method is a combination of interviews and Netnographic observations. We conducted semi-structured interviews with 15 pet account managers with at least 500 followers. We also analyzed the content of pet influencer posts for visual and textual content. Lastly, through a public pet account, we participated in introspective en-

gagement with the practice. We performed iterative and inductive analytical procedures in analyzing our data.

Our findings first demonstrate that Instagram is home to a loosely networked bundle of micro-communities of cat accounts, centered around feline appreciation and fandom. These connected micro-communities are built around hashtags singling out breeds, colors, and micro-interests with frequent overlaps and blurring of community boundaries. Through a shared language (now coined as Meowlogisms by Podhovnik, 2018), collective celebration of milestones, and collective action to support each other such as fundraising, pet account managers (PAMs) exemplify the three tenets of community (Muniz and O'Guinn 2001): consciousness of kind, rituals and traditions, and moral responsibility.

Second, we show that within this nexus of micro-communities, PAMs are motivated to create and maintain engagement for two primary reasons: connections or fame. These findings mirror and revise existing typologies on social media communities (Kozinets 1999; Martineau and Arsel 2017).

Third, we show that regardless of their goals, PAMs create anthropomorphic performances for their pets through intertextual storytelling, switching back and forth between engaging with the pets through proxy conversations and engaging with their human companions more directly.

Our data shows that storytelling can be either realistic (staying within the boundaries of the sociomaterial capacities of animals), or fantastical (expressing imaginary or impossible situations). When choosing to make posts on their accounts, PAMs can simply display the raw images they capture by camera, such as their cat sitting on a couch, or they can decide to superimpose the original image onto another one which showcases different settings or characters, such as their cat playing golf. Additionally, the same can occur for the textual content: it could simply reflect the literal or figurative content of the actual image, such as: "my cat sits on the counter," or integrate intertextual narratives which may expand the literal object: "my cat slayed the dragons and conquered the seven kingdoms." These storytelling techniques frame their pet as not only having human emotionality and physicality but also allows the PAMs leverage on shared tropes and narratives such as the case of Game of Thrones to boost engagement and familiarity. Textual cues are frequently supported by visual manipulation, such as editing images to make the cat look like a knight. Lastly, PAMs deliberately choose the account's voice (human versus cat) to supplement this storytelling. Building on the patterning of these strategies, we develop a typology of PAM account management styles.

Our work aims to contribute to a growing body of literature on performances in social media (Abidin, 2017; boyd, 2011; Burgess and Green, 2008; García-Rapp, 2017; Marwick, 2013; Strangelove, 2010; Senft, 2013). We show how social media enables performative mediated interactions and mediated connections between humans through their pet companions, how animals are orchestrated for attention economy, and how this shifts humans' connections with their pets and other humans. Furthermore, we develop a typology of performative orchestration of Instagram pets. Our typology also provides firms tools for identifying and recruiting the most appropriate influencer based on their performance style.

Marketing Memeification on TikTok: Initiating and Leveraging Consumer Creativity for Commercial Means

EXTENDED ABSTRACT

In a saturated digital advertising space, brands increasingly desire 'viral' content (Berger and Milkman, 2012). One form of viral content are internet memes—defined as "(a) a group of digital items sharing common characteristics of content, form, and/ or stance, which (b) were created with awareness of each other, and (c) were circulated, imitated, and/or transformed via the Internet by many users" (Shifman, 2014, p. 41). Internet memes are a form of cultural rhetoric (Grundlingh, 2018; Milner, 2013) and are unique given "the speed of their transmission and the fidelity of their form" (Davidson, 2012, p. 122). Internet memes can build report with online consumers and foster consumer engagement (Gelb, 1997). Previous research highlights the convivial nature of internet memes, which act as a type of digital leisure shared by internet insiders (Bauckhage, 2011). However, this form of leisure can also represent a lucrative opportunity for influencers and brands alike through monetizing the attention economy (Drenten, Gurrieri, and Tyler, 2020; Soha and McDowell, 2016). Most research to date explores how consumers create memes, separate from marketing intervention. In contrast, our study explores brand-generated internet memes. We ask, how do brands create and capitalize upon internet memes for commercial means?

To explore our research question, we turn to the context of TikTok, a social media platform (formerly Musical.ly) which allows users to create and share short-form videos, using a library of "sounds" (e.g., music, user-generated sounds, television/movie clips). With over 1.5 billion app downloads and nearly 105 million in January 2020 alone, TikTok is rapidly growing (Sensor Tower, 2019; 2020). For this study, we specifically focus on sponsored hashtags, a paid advertising placement option in which brands pay for custom sponsored hashtags to drive engagement in marketing campaigns. Sponsored hashtags are placed on the app's discovery-oriented 'for you page' to engage consumers immediately upon opening the TikTok app. Data collection began in April 2019 and was conducted by a cross-cultural research team. The researchers identified sponsored hashtags via daily monitoring of the 'for you page' on TikTok and created a database of sponsored hashtags and accompanying visual- and text-based content. Data collection resulted in a sample of 102 sponsored hashtags from 87 companies, such as Nike, Chipotle, Burberry, and other multinational brands. Data were managed and analyzed through qualitative social media methods (Sloan and Quan-Haase, 2017), using both Nvivo 12 Plus software and manual coding.

Preliminary findings offer a framework of marketing memeification wherein brands initiate the reproduction of content through three types of calls to action: impersonation, transformation, and self-expression. Marketing memeification unfolds on a continuum of individual creativity in which consumers are increasingly encouraged to insert their own creative ideas when developing content in conjunction with a sponsored hashtag. In each case, paid influencers set the exemplary creative standard, while everyday consumers engage with marketing memeification as a form of unpaid consumer leisure. Our study suggests TikTok is unique in using sounds, or sonic anchors, to drive the marketing memeification process.

First, brands initiate marketing memeification through impersonation-based calls to action, which require little to no individual creativity. Impersonation involves movement-oriented actions (e.g., dance, lip-sync) with specific guidelines for the performance. For example, to advertise Season 3 of Netflix's Chilling Adventures of Sabrina, the media company created the #StraightToHell hashtag accompanying a short, easy to replicate dance with the song "Straight to Hell" by Sabrina Spellman as the sonic anchor. Through impersonation, consumers are mobilized to recreate content, exemplified by influencers, directly as it is shown. While some users may perform the dance moves differently, due to ability and style, the brand-related hashtag does not directly invoke creativity.

Second, through transformation-based calls to action, which give more narrative and creative leeway to consumers. Transformation involves transition-oriented stories, wherein consumers are asked to show a change or evolution. For example, in promoting the re-release of Wendy's 'spicy chicken nuggets', the brand encouraged consumers to demonstrate transformational stories using the #SpicySnap hashtag challenge and the song "Snap Yo Fingers" by Lil Jon as the sonic anchor. Through transformation, consumers are mobilized to interpret the brand's call to action and tell their own creative stories loosely related to the branded product. For this challenge, influencers prominently feature Wendy's food products in their content; however, everyday consumers use the suggested sound and hashtag to show their own creative transformations.

Third, through self-expression-based calls to action, which inspire consumers to reflect their personal points of view. Self-expression involves identity-oriented displays of uniqueness in which consumers are asked to interpret the hashtag, with open-ended parameters. For example, beauty retailer Ulta Beauty created the #BeautyIs hashtag campaign, with the song "Here I Am" by Fleur East as the sonic anchor, inviting consumers to broadly define beauty in their own terms. Through self-expression, influencers and everyday consumers promote their own unique viewpoints and perspectives, using the brand as a launching point. User videos range in diversity in messaging, format, and content creators themselves (e.g., gender, ethnicity, age). Thus, on the marketing memeification continuum of creativity, branded hashtags and accompanying sounds increasingly become a pathway for consumers to share their own authentic self-expression, while indirectly promoting the brand itself.

While previous work focuses on the organic evolution of memes as user-generated content (Bigley and Leonhardt, 2017), our findings extend existing research to better understand how marketing intervention spurs memeification for commercial means and to demonstrate how brands leverage the status and visibility of social media influencers to set creative standards. Partitioning devices including sonic anchors and branded hashtags are initiated by the brand; however, marketing memeification decentralizes control of the brand in the process. In line the theoretical perspective of memes (Shifman, 2014), our study suggests meaning is created on TikTok during the transmission of cultural content. At a meso-level, this transmission process is propelled by sonic anchors (e.g., songs) which work to coalesce consumption communities, reflecting the importance of sounds as objects in consumption research (Patterson and Larsen, 2019). This study represents a first step in understanding how brands operate on TikTok, wherein consumers' creative performances are actively initiated, surveilled, and leveraged for commercial means.

REFERENCES

Abidin, C. (2015). Communicative intimacies: Influencers and perceived interconnectedness. *Ada: A Journal of Gender, New Media, and Technology*, (8). Available: https://adanewmedia.org/2015/11/issue8-abidin/.

_____(2016). "Aren't these just young, rich women doing vain things online?": Influencer selfies as subversive frivolity. *Social Media+ Society,* 2(2), 2056305116641342.

_____(2017). # familygoals: family influencers, calibrated amateurism, and justifying young digital labor. *Social Media+ Society*, 3(2), 2056305117707191.

_____(2018). *Internet celebrity: understanding fame online*. Emerald Publishing.

Allen, J. S. (2012). *The omnivorous mind: our evolving relationship with food.* Cambridge, MA: Harvard University Press.

Allué, T. (2013). Food sector communication and online influencers. *Catalan Journal of Communication & Cultural Studies, 5*(2), 311-314.

Arsel, Z., & Bean, J. (2013). Taste regimes and market-mediated practice. *Journal of Consumer Research, 39*(5), 899-917.

Bauckhage, C. (2011). Insights into internet memes. In *Proceedings of the Fifth International AAAI Conference on Weblogs and Social Media*, 42-49.

Berger, J., & Milkman, K. L. (2012). What makes online content viral?. *Journal of Marketing Research*, 49(2), 192-205.

Bernazzani, S. (2019). Micro-influencer marketing: a comprehensive guide, *HubSpot*, October 16th, available at: https://blog.hubspot.com/marketing/micro-influencer-marketing.

Boyd, d., 2011. Social network sites as networked publics:. In Z. Papacharissi, *A networked self.* New York: Routledge, 39-58.

Bourdieu, P. (1984). *Distinction: a social critique of the judgment of taste,* Cambridge, MA: Harvard University Press.

Bouvier, E. (2018). Breaking bread online: Social media, photography, and the virtual experience of food. *At The Interface/Probing The Boundaries, 97,* 157-172.

Brillat-Savarin, J. A. (2009). *The physiology of taste, or, meditations on transcendental gastronomy*. New York: Everyman's Library.

Burgess, J., & Green, J. (2018). *YouTube: online video and participatory culture*. New York: John Wiley & Sons.

Ian P. Bigley & James M. Leonhardt (2018) Extremity Bias in User-Generated Content Creation and Consumption in Social Media, *Journal of Interactive Advertising*, 18(2), 125-135.

Daily Mail (2017). Forget being a nurse or doctor, three quarters of today's children would rather be Youtubers and vloggers," *Daily Mail,* May 22nd, available at: https://www.dailymail.co.uk/news/article-4532266/75-cent-children-want-YouTubers-vloggers.html.

Davidson, P. (2012). The language of internet memes. *The Social Media Reader*, 120-134.

Drenten, J., Gurrieri, L., & Tyler, M. (2020). Sexualized labour in digital culture: Instagram influencers, porn chic and the monetization of attention. *Gender, Work & Organization*, *27*(1), 41-66.

Duffy, B. E. (2016). The romance of work: gender and aspirational labour in the digital culture industries. *International Journal of Cultural Studies*, 19(4), 441–57.

Duffy, B. E. and E. Wissinger (2017). Mythologies of creative work in the social media age: fun, free, and 'just being me.' *International Journal of Communication*, *11*, 4652-71.

Duncan, M. C. (1990). Sports photographs and sexual difference: Images of women and men in the 1984 and 1988 Olympic Games. *Sociology of Sport Journal, 7*(1), 22–43.

Entman, R. M. (1993). Framing: toward clarification of a fractured paradigm. *Journal of Communication, 43,* 51-58.

Erz, A. and A-B. H. Christensen (2018). Transforming consumers into brands: tracing transformation processes of the practice of blogging. *Journal of Interactive Marketing*, 43, 69–82.

García-Rapp, F. (2017). Popularity markers on YouTube's attention economy: The case of Bubzbeauty. *Celebrity Studies*, 8(2), 228-245.

Gelb, B. D. (1997). Creating "memes" while creating advertising. *Journal of Advertising Research*, 37(6), 57-60.

Grundlingh, L. (2018). Memes as speech acts. *Social Semiotics*, 28(2), 147-168.

Khamis, S., Ang, L., & Welling, R. (2017). Self-branding,'micro-celebrity' and the rise of Social Media Influencers. *Celebrity Studies,* 8(2), 191-208.

Kozinets, R. V. (1999). E-tribalized marketing?: The strategic implications of virtual communities of consumption. *European Management Journal,* 17(3), 252-264.

Krippendorff, K. (2012). *Content analysis: An introduction to its methodology*. London: Sage.

Lévi-Strauss, C. (1983). *The raw and the cooked*, trans J. Weightman and D. Weightman. Chicago: University of Chicago Press.

Lupton, D. (1996). *Food, the body and the self.* London: Sage Publications.

Martineau, E., & Arsel, Z. (2017). Managing communities of co-creation around consumer engagement styles. *Journal of the Association for Consumer Research*, 2(2), 179-195.

Martineau, P. (2019). Inside the weird, and booming, industry of online influence,. *Wired*, April 22nd, available at: https://www.wired.com/story/inside-the-industry-social-media-influence/.

Marwick, A. E. (2013). *Status update: Celebrity, publicity, and branding in the social media age.* New Haven: CT: Yale University Press.

_____(2015). You May Know Me from YouTube:(Micro-) Celebrity in Social Media. In A companion to celebrity, P. David Marshall and Sean Redmonds, (Eds.), 333-350, New York: Wiley.

McQuarrie, E. F., J. Miller, and B. J. Phillips (2013). The megaphone effect: taste and audience in fashion blogging, *Journal of Consumer Research*, 40(1), 136–58.

Mention (2018). *2018 Instagram Report,* available at: https://info.mention.com/hubfs/Instagram%20Engagement%20Report%20 2018%20%7C%20Mention.pdf.

Milner, R. M. (2013). Pop polyvocality: Internet memes, public participation, and the Occupy Wall Street movement. *International Journal of Communication*, 7, 2357-2390.

Muniz, A. M., & O'guinn, T. C. (2001). Brand community. *Journal of Consumer Research*, 27(4), 412-432.

Patterson, M., & Larsen, G. (2019) Listening to consumption: Towards a sonic turn in consumer research. *Marketing Theory,* 19(2): 105-127.

Podhovnik, E. (2018). The Purrification of English: Meowlogisms in Online Communities: A qualitative description of a selected# blackcat community on Instagram. *English Today,* 34(3), 2-16.

Poor, M., Duhachek, A., & Krishnan, H. S. (2013). How images of other consumers influence subsequent taste perceptions. *Journal of Marketing, 77*(6), 124-139.

Rodriguez, L., & Dimitrova, D. V. (2011). The levels of visual framing. *Journal of Visual Literacy, 30*(1), 48-65.

Schroeder, J. (2002). *Visual consumption*. New York: Routledge.

Senft, T. M. (2008). Ca*mgirls: Celebrity and community in the age of social networks* (Vol. 4). Peter Lang.

_____(2013). Microcelebrity and the branded self. A companion to new media dynamics, 346- 354.

Sensor Tower (2019, November 14). TikTok Clocks 1.5 Billion Downloads on The App Store and Google Play. Retrieved January 2, 2020, from https://sensortower.com/blog/tiktok-downloads-1-5-billion.

Shifman, L. (2014). The cultural logic of photo-based meme genres. *Journal of Visual Culture*, 13(3), 340-358.

Sloan, L., & Quan-Haase, A. (2017). *The SAGE Handbook of Social Media Research Methods*. Thousand Oaks, CA: SAGE Publishing.

Soha, M., & McDowell, Z. J. (2016). Monetizing a Meme: YouTube, Content ID, and the Harlem Shake. Social Media + Society. https://doi.org/10.1177/2056305115623801

Statista. (2018). Number of daily active Instagram users from October 2016 to September 2017 (in millions). Retrieved from https://www.statista.com/statistics/657823/number-of-daily-active-instagram-users/

Stebbins, R. A. (1982). Serious leisure: a conceptual statement, *The Pacific Sociological Review,* 25(2), 251-72.

Strangelove, M. (2010). *Watching YouTube: Extraordinary videos* amples

Re-Examining Consumer Identity on Digital Platforms

Chairs: Ela Veresiu, York University, Canada
Linda Tuncay Zayer, Loyola University Chicago, USA
Marie-Agnès Parmentier, HEC Montréal, Canada

Paper #1: How Digital Platforms Shape Family Identities
Jenna Drenten, Loyola University Chicago, USA
Linda Tuncay Zayer, Loyola University Chicago, USA

Paper #2: #Instagrannies?: How Mature Women Reassemble Aging, Fashion and Retirement in Digital Times
Ela Veresiu, York University, Canada
Marie-Agnès Parmentier, HEC Montreal, Canada

Paper #3: An Exploration into How Influencers Shape Gender Identity Among Gen Z Consumers
Kathrynn Pounders, The University of Texas at Austin, USA

Paper #4: The Contemplative Consumer Identity: Bridging Spirituality and the Marketplace
Richard Kedzior, Bucknell University, USA
Daiane Scaraboto, University of Melbourne, Australia

SESSION OVERVIEW

From the explosive popularity of podcasts to the rapid rise of social media influencers, seismic shifts in technology and new media consumption are taking shape across the globe. As digital platforms – defined as "a set of online digital arrangements whose algorithms serve to organize and structure economic and social activity" (Kenney and Zysman 2016) – increasingly take on a larger role in individual consumers' lives, the digital world holds widespread implications for consumer identity construction (Belk 2013). These consumer identities are neither static nor binary (e.g. online versus offline, see Kedzior 2015), but rather assembled and at times disassembled within and between various digital platforms, such as social networking sites, image-based or audio based social platforms, and hybrid sites. Indeed, past scholarship has examined the ways in which consumers and influencers actively engage in digitally mediated spaces (e.g., Drenten and Zayer 2018, Drenten, Gurrieri and Tyler 2018, Epp, Price and Schau 2014; Gurrieri and Cherrier 2013, Molesworth and Denegri-Knott 2013, Schau and Gilly 2003).

However, while there has been much discussion regarding the more negative impact of digital platforms (Baccarella et al. 2018) on individuals and families, consumer research scholarship has yet to fully explore how digital platforms (re)shape and/or disrupt consumer identities, and what these processes mean not only for consumer welfare outcomes, but also for marketing practitioners. In this special session we examine this timely oversight by bringing together an inclusive team of authors from both academia and the social media industry, exploring digital consumption issues through multiple theoretical lenses, like family identity theory, intersectional theory, and assemblage theory, as well as methodological paradigms including quantitative and qualitative perspectives. The first two papers of this session will focus on group identity construction in the digital age, while the last two papers will highlight the role of digital platforms on individual consumer identity creation. Specifically, the empirical papers, which all have data collected and are in mature stages of theorization, will address the following research questions: 1) how are family identities (re)shaped by digital platforms? 2) how are female influencers and consumers' aging identities shaped and constrained by social media images? 3) how do Instagram influencers impact their consumers' gender identity and gender expression?

and 4) how do online portals contribute to contemplative consumer identity creation?

Overall, this special session asks: how do digital platforms (re) shape consumers' individual and collective identities? We anticipate that our session will be relevant for scholars engaged with broad questions that relate to marketing in a digital world, and consumer researchers with a specific focus on participatory media consumption. We also wish to engage in dialogue with practitioners and social scientists working in influential social media organizations such as Pinterest through a discussion of our respective empirical findings.

How Digital Platforms Shape Family Identities

EXTENDED ABSTRACT

Past scholarship has documented how consumers in online environments construct their identities (Schau and Gilly 2003; Belk 2013), including navigating identity transitions (Drenten and Zayer 2018). Additional research has highlighted the role of digital technologies in shaping family practices (see Epp, Schau, and Price 2014 study on geographic dispersion of families), reinforcing rituals and intimacy among couples (see Su 2016 study on digital messaging), and providing a means to negotiate meanings of home (see Cabalquinto 2018 study on mobile media use of Filipino transnational families). Importantly, Epp et al. (2014) highlight how families can expand their material, expressive and imaginative capacities through technologies such as Skype during times of separation. However, the manner in which technologies, such as social media platforms, impact family identities is yet to be explored in great depth. To address this gap in the literature, our research asks: how are family identities shaped by digital platforms?

We draw on Epp and Price's (2008) sociological conceptualization of 'being a family' as a "bundle" of identities, which include collective, relational (couple, parent-child or sibling identities), and individual identities as they interact with communication forms and symbolic marketplace resources. The authors refer to Bennett, Wolin, and McAvity's (1988, 212) definition of family identity as the "gestalt of qualities and attributes," and "the family's subjective sense of its own continuity over time, its present situation, and its character." The context for our research is the social media platform, Pinterest, which allows users to search, save and share content in the form of "pins" and "boards" related to their interests akin to a bulletin board. Two-thirds of the pins on the site represent brands or products. The site boasts that 28% of all US social media users are Pinterest users with a monthly active user base of 300 million and a median age of 40 (Omnicore Agency Report 2020).

To explore family identity in the digital era, we draw upon a dual methodology of in-depth interviews and visual content analysis. First, interviews with 14 men and women, ages 21 to 45, who use Pinterest were conducted, resulting in over 500 pages of text. Visual data was also captured as informants shared their personal Pinterest boards. Second, a series of searches were conducted via Pinterest Trends (trends.pinterest.com), using "Family" as the initial keyword, then systematically exploring the first 20 results (e.g., family dinner ideas, family room ideas, family pictures). Themes related to identity and family were identified using a constant comparison method

and iteratively referring back to the existing literature (Strauss and Corbin 1998).

We find Pinterest provides symbolic marketplace resources in the form digital virtual consumption 'objects' which are embedded in communications forms (e.g., narratives, rituals, intergenerational transfers, social dramas, everyday interactions) and help consumers construct and maintain collective family identities. Exploratory visual analysis of the most popular pins in the Pinterest Trends database indicates that it is replete with digital virtual resources to shape and enact family identities (e.g., family time, family tree, family traditions) as well as to help families overcome potential barriers (e.g., inspirational family quotes, addressing family problems).

Emergent from our findings are four unique forms of family identity resources: relational, functional, transformational, and expressive. Due to space limitations of the abstract, abbreviated quotes from the data are presented here. First, relational identity resources reflect connection and bonding with fellow family members, such as pinning family game night ideas or books to read at bedtime. Ellen, a college student, uses Pinterest to save tips for playing 'Words with Friends,' a mobile game that she plays each day with her dad. Ellen's pins enhance her long-distance gameplay experiences. She says, "… my dad wants to play with me; of course, I'm going to play with him. This [pin] had different words that a scrabble player should memorize so like highest possible points on the first turn." Second, functional identity resources reflect pragmatic family operations, such as recipes for weeknight meals or chore charts for kids. For example, Carolyn pins content related to planning an upcoming Disney vacation, including a Disney packing list and meal tips for eating at the theme park. "I used Pinterest a ton before I went to Disney because I wanted to make sure I was fully prepared because Disney was a whole different kind of vacation, you have to be ready." Carolyn's pins reflect desired organization and preparedness for her family. Third, transformational identity resources reflect evolutions in family structure or values, such as efforts to get healthy together or moving in together. Hailey is recently engaged and pins home décor ideas for moving in with her future husband. She says, "…it gives me inspiration … it just makes me feel inspired to actually do stuff rather than to just continue to watch HGTV." Fourth, expressive family identity resources reflect on shared meanings and beliefs, such as faith and emotional concern for family members. Ellen discusses her family's belief to "make sure you hug your loved ones today and every day" and states "…if I see something that is along lines of that I'm totally pinning it." In some cases, family identity resources intersect serving as multiple family identity resources. For example, pins for planning a family vacation may be both functional and relational. These family identity resources are leveraged through digital media (e.g., Pinterest) to help families reinforce or reimagine their collective identities.

As Epp and Price (2008) point out, the marketplace can both enable and constrain the identity construction practices of families, and that there are barriers to enactment, including geographic dispersion, time constraints, and lack of monetary resources. We find Pinterest diminishes these barriers by offering asynchronous participation and a seemingly endless array of digital virtual consumption as resources. Importantly, contrary to popular press and prior research indicating that digital technologies are disrupting and introducing new vulnerabilities to family relationships and roles (Abbasi and Alghamdi 2017; Hertlein 2012; Lewis et al. 2015), we find that the social media platform Pinterest provides new or reframed opportunities for reinforcing and reimagining family identities.

#Instagrannies?: How Mature Women Reassemble Aging, Fashion and Retirement in Digital Times

EXTENDED ABSTRACT

Until recently, the idea of paying close attention to mature women's sense of style would have been met with puzzlement and little interest from consumers and the fashion industry alike. After all, to be fashionable and feminine has typically been viewed as belonging to the young. What then could older female consumers possibly teach the market about being stylish? Following the unexpected popularity of the Advanced Style phenomenon, discussions about ageism, gender, and fashion have begun to draw increasing attention in the popular press (e.g., Grinberg 2012; La Ferla 2018). The @advancedstyle Instagram account created in 2008 by American street style photographer Ari Seth Cohen helped fuel these critical conversations. Cohen's celebration of the personal styles of regular mature women, which are commonly understood as 50 years of age or older (Twigg 2013), has launched a flourishing online movement. A decade after its creation, the social media account has more than 278,000 followers and 4,300 posts, boasts a hashtag (#advancedstyle) used more than 169,000 times, is regularly featured in major fashion magazines (e.g., Vogue) and mainstream media (e.g., The Guardian), and has expanded into the realm of books (e.g., Cohen 2012, 2016; Cohen and Schraer 2013) and feature length films (e.g., Cohen and Feig 2014).

In light of this social media and traditional market success story, and in an effort to answer research calls for greater examination of the intersection between the sociocultural categories of age and gender in the marketplace (Twigg 2013), we explore how women over 50 are embracing the online opportunity to increase their visibility by consuming the photo-sharing digital platform called Instagram, as well as amplify their voices and representations in the fashion market by becoming Instagram style influencers. As such, our research aims are: 1) to expand our knowledge of influencer marketing dynamics, which heavily favors young prosumers, by examining an under researched older female segment; and 2) to investigate Advanced Style prosumers' impact on broader market and societal representations of age, gender, and retirement.

To do so, we combine the intersectional and assemblage theoretical lenses and focus on the case of 10 popular female Advanced Style Instagram influencers, defined as ordinary Internet users who have an established credibility and audience, and therefore can monetize their online following through advertorials, brand collaborations, and public appearances (Abidin 2016). While prior consumer research has examined mature consumers as retirees (Price, Arnould, and Curasi 2000; Schau, Gilly, and Wolfinbarger 2009) and as part of elderly consumption ensembles (Barnhart and Peñaloza 2013), our study pays particular attention to a new kind of older prosumer or producer-consumer hybrid, who, through their savvy digital consumption and glamor labor (Wissinger 2014), reassemble the imagery of aging, gender, and retirement for their combined millions of online followers.

Methodologically, we employed a qualitative case study method, as it "has become a favored methodology for researching macroscopic […] questions concerning markets and cultures from an interpretive perspective" (Holt 2002, 73). To help contextualize our market phenomenon, we first collected an overview of popular written, audio, and visual materials about the Advanced Style movement since its inception in 2008. Following this initial phase of data collection, we focused on 10 popular Advanced Style influencers, where we collected all online media interviews (291 documents) and YouTube video interviews (93 videos) featuring any of these 10

influencers. To supplement the archival dataset, we conducted a netnography to understand the social interaction in this contemporary digital communications context (Kozinets 2019). Here, each author individually engaged in online participant observation as regular fans by following the 10 influencers on Instagram from our personal accounts for approximately six months, periodically sharing direct messages on the platform with each other about our online experiences (Kozinets, Scaraboto, and Parmentier 2018). We also downloaded fans comments for 30 randomly selected recent consecutive posts per influencer to better understand fan interactions. Lastly, we collected metrics on the 10 influencers' Instagram accounts regarding their audience, engagement, and brand mentions from the third-party analytics platform HypeAuditor.

In accordance with the established principles of qualitative research (Glaser and Strauss 1967), data collection continued until theoretical saturation was reached. The complete dataset was analyzed using the hermeneutic approach (Thompson 1997) typically utilized for qualitative data. We find that the Advanced Style intersectional assemblage was created through a specific historical process (DeLanda 2016) that moved from invisible to visible and then progressed from influence to precarious power. In the first phase of the process, our influencers created the intersectional assemblage by first recognizing their invisibility in the fashion market as women over 50, then deliberately deciding to become style activists, next strategically using hashtags, and finally making deliberate and consistent choices about their Instagram style. In the second phase, our prosumers stabilized the intersectional assemblage by first recognizing their responsibility as influencers, then engaging with their online fans, and finally accepting strategic brand collaborations.

Overall, we aim to contribute to the nascent, yet important literature stream investigating intersectionality in contemporary marketing images (Gopaldas and Siebert 2018). Our focus is the intersectionality of age and gender in consumer-driven images, which is a timely endeavor since the Advanced Style phenomenon spotlighting fashionable older women has received minimal scholarly attention to date (Jermyn 2016; Tiidenberg 2018). Specifically, our work offers three important insights. First, in contrast to previous research on influencer marketing, which has focused on young females, we provide a process to understand how mature women directly impact the ageist fashion and beauty industries by becoming Instagram influencers. At the same time, we offer a direct extension to the retirement consumption literature that finds "retirement explicitly privileges consumption (living) over production (work)" (Schau et al. 2009, 256). In sharp contrast, we find that retirement is no longer purely a consumption affair but rather a new form of prosumption, whereby retirees or those approaching legal retirement age willingly find creative ways to monetize their consumption activities and hobbies. Finally, our research extends gender studies by conceptualizing gender as an assemblage of market-mediated human and non-human technological elements in the digital age.

An Exploration into How Influencers Shape Gender Identity Among Gen Z Consumers

EXTENDED ABSTRACT

Influencers attract millions of followers by sharing content curated from their daily lives on platforms such as Instagram and YouTube and typically evolve around one particular domain. For example, popular categories of influencers include interests such as fashion, beauty, and fitness. Marketers and advertisers have enthusiastically embraced influencers as they have are perceived as reliable sources of information among consumers and have the power to di-

rectly impact the purchase decisions of large audiences (De Veirman, Cauberghe, and Hudders 2017; Djafarova and Rushworth 2017). While a body of research in marketing has begun to investigate the effectiveness of influencers, and factors that may intercede their effectiveness, there is a lack of work investigating how influencers affect consumers' gender identity and gender-related consumption.

As such, this work is an attempt to increase our understanding of how influencers impact consumers' gender identity and expression. First, an exploratory study, which was conducted to determine whether or not influencers affect gender identity and gender expression, is presented. Based on these findings, the theoretical foundations of social comparison theory and self-concept clarity are used to develop a set of predictions that will be tested using a between-subjects experimental design to shed light on to how influencers impact consumers' gender identity and gender expression.

Gender is considered to be a cultural category that is reinforced by socially constructed and contested assumptions and norms. Prior work has shown media produce and communicate social signifiers, including gender, specifically depictions of femininity and masculinity (Hirschman and Stern 1994; Stevens 2012; Zayer et al. 2012). According to Schroeder and Zwick (2004, 24), "advertising discourse both reflects and creates social norms" and media and advertising representations influence both cultural and individual perceptions of gender identity, femininity, and physical attractiveness.

An exploratory study was conducted among 81 undergraduate students (74% female, $M_{age} = 20.2$) to assess whether influencers on the social media platform Instagram has impact on perceptions of gender identity and gender expression. Participants were provided with a definition of gender identity and a definition of gender expression from the Human Rights Campaign website. They were then asked to answer four open-ended questions to determine whether influencers impact their gender identity, their gender expression, as well as the gender identity and gender expressions of their friends.

The responses to these questions were read and coded by the researcher and graduate assistant. Each identified main themes and sub-themes for each question, and then combined findings from the questions to identify common themes and sub-themes. Findings suggest that participants largely did not believe that influencers held sway over their gender identity, although this varied based on one's confidence in their own gender identity. Participants overwhelmingly believe influencers play a large role in their gender expression. A sub-theme of social comparison with the influencer also emerged when analyzing the question about gender expression. Specifically, participants often discussed comparing oneself with an influencer in terms of femininity and masculinity. Finally, in assessing responses to the question about whether influencers impact perceptions of gender identity among their friends, responses were overwhelmingly positive with most participants stating that influencers play a large role in their friends' gender identity and gender expression. Analysis also revealed that when discussing the effect that influencers have on their peers' gender identity, it was often in reference to friends or peers that may not be as self-assured in their gender identity.

A dearth of literature has examined the effects that traditional advertising has on female consumers' self-perceptions, largely focusing how exposure to idealized imagery negatively impacts women's self-perceptions (D'Alessandro and Chitty 2011; Hogg and Fragou 2003; Pounders, Rice, and Mabry-Flynn 2016; Richins 1991; Smeesters and Mandel 2006). The bulk of this work uses social comparison theory (Festinger 1954), which states individuals engage in spontaneous comparisons to others in order to evaluate the self on a particular attribute to explain these relationships. Similarly we predict that consumers will engage in spontaneous comparisons with

influencers and that these comparisons will impact consumers' self-perceptions in the form of self-esteem, femininity, and satisfaction with physical appearance. We also anticipate that these comparisons are related to gender expression. Further, we expect that these relationships will be moderated by type of influencer.

Self-concept clarity refers to "the extent to which self-beliefs are clearly and confidently defined, internally consistent, and stable (Campbell et al. 1996). Accordingly, when consumers have low self-concept clarity, their self-concept is less coherent and more unstable. Prior research has found that low self-concept clarity has two main effects on consumer behavior: it increases the degree to which consumers are impressionable and influenced by external self-relevant information (Campbell 1990) and reduces the psychological resources consumers have available to process identity-related information (Campbell 1990). For example, Campbell (1990) found that consumers with low self-concept clarity take longer to determine if an adjective represents their identity. We believe that self-concept clarity will moderate the relationship influencers have on self-perceptions. Specifically, we predict influencers are more likely to impact consumers' (a) gender identity and (b) gender expression when consumers have low self-concept clarity about their gender identity.

These predictions will be examined in a 2 (influencer type) X 2 (self-concept clarity) between-subjects experiment using influencers identified in the exploratory study. The sample will consist of female consumers ages 18-25. Data will be collected in April and analyzed using ANOVA and Process Model 8. Findings will be ready for presentation by the 2020 Annual ACR conference. It is expected that the findings from this work will contribute to the literature on gender and identity by shedding light into how influencers and online platforms impact gender identity among Gen Z women.

The Contemplative Consumer Identity: Bridging Spirituality and the Marketplace

EXTENDED ABSTRACT

A growing stream of research examines the conflation of markets and spirituality, focusing on the roles consumers assume at this intersection (Huseman and Eckhardt 2019). Two approaches can be identified. The first assumes a critical stance on the interface of spirituality and markets, noting appropriation, distortion, and commoditization of religions or other belief systems (Rindfleisch 2005). It characterizes the (re)emergence of spiritual systems as consumerist markets or "spiritual supermarkets" (Redden 2016, 2). For example, Rindfleisch (2005, 346) argues that entrepreneurs in the New Age field treat complex traditional systems of beliefs in "partial and superficial" ways, which "reduces and decontextualizes their meanings," thereby making them palatable for consumer markets. The second approach is reconciliatory and examines the hybridization of commercial and spiritual worlds as a phenomenon of interest without assuming that one value regime is morally or ideologically superior to the other (Scaraboto and Figueiredo 2017; Gibson-Graham 2008). Here, consumer identities seamlessly blend with other non-commercially defined roles of community members, neighbors, pilgrims, or faithful church members (Santana and Botelho 2019; Kedzior 2013).

Bridging these approaches, recent research has examined the experiences of consumers who engage with spiritual market offerings. Huseman and Eckhardt (2019, 393) introduce the concept of consumer spirituality, defined as "the interrelated practices and processes that people engage in when consuming market offerings (products, services, places) that yield 'spiritual utility'." This emergent stream of research highlights that markets need to be shaped to accommodate spiritual consumption (Huseman and Eckhardt 2019;
Suddaby 2019). Yet, as Redden (2016, 5) notes, "there often appears to be a reticence to examine the market dynamics more closely" in spiritual contexts, "even where it would provide explanatory power." Hence, more research is needed on "the role of market actors; in particular to the role of spiritual practitioners, entrepreneurs and leaders, in shaping the spiritual market offer" (Huseman and Eckhardt 2019, 395).

Our study addresses these gaps by examining the market-making dynamics in the spiritual field of Tarot reading. We focus on how online spiritual portals contribute to spiritual consumer identity creation. Tarot is a deck of 78 cards whose origins date back to Renaissance Italy. Although much of its history is shrouded in mystery, since late XVIII century, Tarot evolved into a fortune-telling and divinatory device, with its cards acquiring symbolic and esoteric meanings. Recent shifts in the spiritual marketplace have made Tarot more accessible (Gregory 2016), as materials are available online and resources (e.g. Tarot decks and books) have proliferated in the market.

In collecting and analyzing data for this project, we follow the methodological recommendations for studying spiritual consumption (Ozanne and Appau 2019). We are sensitized to the socio-historical context in which consumers' interest and engagement with Tarot as a spiritual path happens, and explored indigenous ways of interpreting and theorizing the phenomenon. As part of a larger effort to collect ethnographic and netnographic data on the market of Tarot, we collected data from Lilly Tarot (pseudonym), one of the largest online portals for Tarot readers. Founded in 1999 by Belinda Maffei (pseudonym), Lilly Tarot is one of the earliest online spiritual portals in the emergent Tarot market. Belinda produced a podcast series of 146 episodes (average length 40 minutes) in which she introduces Tarot to those interested in becoming readers. Her podcast series reached 2 million daily visits. Each episode was accompanied by a full transcription, which we downloaded and archived, totaling 479 pages of single-spaced text. We also read all the additional resources included in each episode (e.g. card spread templates and links to websites). A common feature in the Lilly Tarot podcast series is interviews with other actors in the Tarot market (e.g. book authors, card deck designers, numerologists). Interviewees often discussed their trajectories as Tarot experts, and their perceptions of how Tarot has evolved through the decades.

The podcast series offers us a window into the development of the Tarot market, as it allows us to "account for changes from a specific point of view" (Hagberg 2016, 114). We identify two market-making strategies through which online portals and spiritual entrepreneurs act to bridge spirituality and marketization: First, is "The High Priestess" – designing the contemplative consumer. Belinda and her interviewees leave no room for listeners to assume roles other than reader and client – seller and buyer – in the Tarot reading market. Learners are considered entrepreneurs and encouraged to practice by offering free readings for friends and family to accumulate "confidence enough to charge." Yet, in any of these roles, Belinda argues, individuals should focus on unlocking "the true power of Tarot [which] is helping you get in touch with yourself and your intuition." Before reading to oneself or a client, Tarot readers should "center yourself, ground yourself, and also connect yourself in with the Universal energy that's around you." Tarot cards become a device to "slow down, focus, and reconnect to oneself and to others." We find that this is the key characteristic of the contemplative consumer, who uses Tarot (and other spiritual practices) as a pathfinder on the journey to the Higher Self. The second market-making strategy identified is the "The Magician" – empowering consumers for market expansion. The online portal allows consumers to do Tarot

"their own way." Belinda reminds listeners that "anyone can do this if it's their calling, and it feels right for them." Interviewees often echo this discourse: "it is your reading practice, and you're not working for an employer, so you don't have to do it anyone else's way! […] go your own way, and charge what you're worth." By empowering Tarot readers, spiritual entrepreneurs work to expand the market, offsetting the barriers to entry into the esoteric category (Rinallo and Maclaran 2016).

Overall, our analysis suggests that the online portal provides an abundance of resources that materialize these two market-making strategies, as well as provide a template for Tarot consumers to reconcile tensions between spirituality and marketization as they transition toward becoming spiritual entrepreneurs. How consumers respond to spiritual entrepreneurs' efforts to shape the market should be the subject of future research.

REFERENCES

Abbasi, I.S. and N. Alghamdi (2017), "When flirting turns into infidelity: The Facebook Dilemma," *The American Journal of Family Therapy*, 45(1), 1-14.

Abidin, C. (2016), "Aren't These Just Young, Rich Women Doing Vain Things Online?": Influencer Selfies as Subversive Frivolity," *Social Media + Society*, 2(2), 1-17.

Baccarella, C., T. Wagner, J. Kietzmann, and I. McCarthy (2018), "Social media? It's serious! Understanding the dark side of social media," *European Management Journal*, 36, 431-438.

Barnhart, M. and L. Peñaloza (2013), "Who Are You Calling Old? Negotiating Old Age Identity in the Elderly Consumption Ensemble," *Journal of Consumer Research*, 39(6), 1133-53.

Belk, R. W. (2013), "Extended Self in a Digital World," *Journal of Consumer Research*, 40 (October), 477-500.

Bennett, L., S. Wolin and K. McAvity (1988), "Family identity, ritual, and myth: A cultural perspective on life cycle transitions," In C. Falicov (Ed.), *Family Transitions*. New York: Guilford Press.

Cabalquinto, E. C. (2018), "Home on the move: negotiating differential domesticity in family life at a distance," *Media, Culture & Society*, 40(6), 795-816.

Campbell, J. D. (1990), "Self-Esteem and Clarity of the Self-Concept," *Journal of Personality and Social Psychology*, 59(3), 538.

Cohen, A.S. (2012), *Advanced Style,* Brooklyn, NY: Powerhouse Books.

Cohen, A.S. and I. Schraer (2013), *Advanced Style The Coloring Book,* Brooklyn: Powerhouse Books.

Cohen, A.S. and E.J. Feig (2014), *Advanced Style,* United States: Bond/360.

Cohen, A. S. (2016), *Advanced Style: Older and Wiser,* Brooklyn: Powerhouse Books.

D'Alessandro, S. and B. Chitty (2011), "Real or relevant beauty? Body Shape and Endorser Effects on Brand Attitude and Body Image," *Psychology and Marketing*, 28(8), 843-878.

Djafarova, E., and Rushworth, C. (2017), "Exploring the credibility of online celebrities' Instagram profiles in influencing the purchase decisions of young female users," *Computers in Human Behavior*, 68, 1-7.

DeLanda, M. (2016), *Assemblage Theory.* Edinburgh: Edinburgh University Press.

De Veirman, M., Cauberghe, V., and Hudders, L. (2017), "Marketing through Instagram Influencers: The Impact of Number of Followers and Product Divergence on Brand Attitude," *International Journal of Advertising*, 36(5), 798-828.

Drenten, J. and L.T. Zayer (2018), "The Role of Digital Virtual Consumption in Navigating Risk-Laden Life Events," *the Journal of Association for Consumer Research*, 3(1), 46-62.

Drenten, J., L. Gurreri, and M. Tyler (2018),"Sexualized labour in digital culture: Instagram influencers, porn chic and the monetization of attention," *Gender, Work, and Organization*, 27(1), 41-46.

Epp, A. M., and L. L. Price (2008), "Family Identity: A Framework of Identity Interplay in Consumption Practices," *Journal of Consumer Research*, 35(June), 50-70.

Epp, A. M., L. L. Price, and H. J. Schau (2014), "The Role of Brands and Mediating Technologies in Assembling Long-Distance Family Practices," *Journal of Marketing*, 78 (May), 81-101.

Festinger, L. (1954), "A Theory of Social Comparison Processes," *Human Relations*, 7(2), 117-140.

Gibson-Graham, J. K. (2008), "Diverse economies: performative practices for other worlds," *Progress in Human Geography*, 32(5), 613-632.

Glaser, B. G. and A.L. Strauss (1967), *The Discovery of Grounded Theory Strategies for Qualitative Research*, Chicago: Aldine.

Gregory, K. (2016), "In the Cards: From hearing 'things' to human capital" In Katherine Behar (Ed.), *Object-Oriented Feminism*, Minneapolis: University of Minnesota Press.

Grinberg, E. (2012), "Aging stylishly, online and in the streets," *CNN,* April 28.

Gopaldas, A. and A. Siebert (2018), "Women over 40, foreigners of color, and other missing persons in globalizing mediascapes: understanding marketing images as mirrors of intersectionality," *Consumption Markets & Culture*, 21(4), 323-46.

Gurrieri, L. and H. Cherrier (2013), "Queering beauty: Fatshionistas in the fatosphere," *Qualitative Market Research: An International Journal*, 16(3), 276-295.

Hagberg, J. (2016), "Agencing practices: a historical exploration of shopping bags," *Consumption Markets & Culture*, 19(1), 111-132.

Hertlein, K. M. (2012), "Digital Dwelling: Technology in Couple and Family Relationships," *Family Relations*, 61(3), 374-387.

Hirschman, E. C., and Stern, B. B. (1994), "Women as Commodities: Prostitution as Depicted in The Blue Angel, Pretty Baby, and Pretty Woman," *ACR North American Advances*.

Hogg, M. K. and A. Fragou. (2003), "Social Comparison Goals and the Consumption of Advertising: Towards a More Contingent View of Young Women's Consumption of Advertising," *Journal of Marketing Management*, 19(7-8), 749-780.

Holt, D.B. (2002), "Why Do Brands Cause Trouble? A Dialectical Theory of Consumer Culture and Branding," *Journal of Consumer Research,* 29(1), 70-90.

Husemann, K. C. and G. Eckhardt (2019), "Consumer spirituality," *Journal of Marketing Management*, 35(5-6), 391-406.

Jermyn, D. (2016), "Pretty past it? Interrogating the post-feminist makeover of ageing, style, and fashion," *Feminist Media Studies*, 16(4), 573-89.

Kedzior, R. (2013), "Materializing the spiritual. Investigating the role of marketplace in creating opportunities for the consumption of spiritual experiences," In D. Rinallo, L. Scott, and P. Maclaran (Eds.), *Spirituality and consumption*. New York: Routledge, 178-194.

Kedzior, R. (2015), "Digital Materiality—A Phenomenological Explo- ration," In K. Diehl and C. Yoon (Eds.), *NA—Advances in Consumer Research*, Vol. 43, Duluth, MN: Association for Consumer Research, 275-281.

Kenney, M. and J. Zysman (2016), "The Rise of the Platform Economy," *Issues inScience and Technology*, 32(3), http://issues.org/32-3/the-rise-of-the-platform-economy/

Kozinets, R.V. (2019), *Netnography: The Essential Guide to Qualitative Social Media Research,* London: Sage.

Kozinets, R.V., D. Scaraboto and M.-A. Parmentier (2018), "Evolving netnography: how brand auto-netnography, a netnographic sensibility, and more-than-human netnography can transform your research," *Journal of Marketing Management*, 34(3-4), 231-42.

La Ferla, R. (2018), "The Glamorous Grandmas of Instagram," *The New York Times*, June 20.

Lewis, A., T. Knight, G. Germanov, M.L. Benstead, C.I. Joseph and L. Poole (2015), "The Impact of Family Functioning of Social Media Use by Depressed Adolescents: A Qualitative Analysis of the Family Options Study," *Frontiers in Psychiatry*, 6 (September) https://www.ncbi.nlm.nih.gov/pmc/articles/PMC4585291/

Molesworth, M. and J. Denegri-Knott (2013), "Digital Virtual Consumption as Transformative Space," in *The Routledge Companion to Digital Consumptio*n, ed. Russell W. Belk and Rosa Llamas, New York: Routledge, 223-34.

Omnicore Agency Report (2020, January 13), "Pinterest by the Numbers: Stats, Demographics & Fun Facts," available at: https://www.omnicoreagency.com/pinterest-statistics/.

Ozanne, J. L., and S. Appau (2019), "Spirits in the marketplace," *Journal of Marketing Management*, 35(5-6), 451-66.

Pounders, K., D. H. Rice and A. Mabry-Flynn. (2017), "Understanding How Goal-Striving, Goal Orientation, and Shame Influence Self-Perceptions After Exposure to Models in Advertising," *Psychology and Marketing,* 34(5), 538-55.

Price, L. L., E.J. Arnould and C.F. Curasi (2000), "Older Consumers' Disposition of Special Possessions," *Journal of Consumer Research*, 27(2), 179-201.

Redden. G. (2016), "Revisiting the spiritual supermarket: does the commodification of spirituality necessarily devalue it?," *Culture and Religion*, 1-19.

Richins, M. L. (1991), "Social Comparison and the Idealized Images of Advertising," *Journal of Consumer Research,* 18(1), 71-83.

Rinallo, D., L. Scott and P. Maclaran (2013), *Consumption and Spirituality*. New York: Routledge.

Rindfleish, J. (2005), "Consuming the Self: New Age Spirituality as 'Social Product' in Consumer Society," *Consumption, Markets and Culture*, 8(4), 343-360.

Santana, J. and D. Botelho (2019), "'If it comes from Juazeiro, it's blessed'! Liquid and solid attachment in systems of object itineraries of pilgrimages," *Journal of Marketing Management*, 35(5-6), 451-66.

Scaraboto, D. and B. Figueiredo (2017), "Holy Mary goes' round: Using object circulation to promote hybrid value regimes in alternative economies," *Journal of Macromarketing*,37(2), 180-92.

Schau, H.J., and M. C. Gilly (2003), "We Are What We Post? Self-Presentation in Personal Web Space," *Journal of Consumer Research*, 30(3), 385-404.

Schau, H.J., M.C. Gilly and M.Wolfinbarger (2009), "Consumer Identity Renaissance: The Resurgence of Identity-Inspired Consumption in Retirement," *Journal of Consumer Research*, 36(2), 255-76.

Schroeder, J. and Zwick, D. (2004), "Mirrors of Masculinity: Representation and Identity in Advertising Images," *Consumption Markets and Culture,* 7(1), 21-52.

Smeesters, D., and Mandel, N. (2006), "Positive and Negative Media Image Effects on the Self," *Journal of Consumer Research*, 32(4), 576-82.

Stevens, L. (2012), "Feeling Bodies," in Marketing: Aesthetics, Emotions and Gender. *The Marketing Review*, 12(2), 141-59.

Strauss, A. L., and Corbin, J. M. (1998), *Basics of qualitative research: Techniques and procedures for developing grounded theory*, Thousand Oaks: Sage.

Su, H. (2016), "Constant connection as the media condition of love: where bonds become bondage," *Media, Culture & Society*, 38(2), 232-47.

Suddaby, R. (2019), "Spiritual myths of consumption: puritanism, transcendentalism and the consubstantiation of the American consumer," *Journal of Marketing Management*, 35 (5-6), 410-26.

Thompson, C.J. (1997), "Interpreting Consumers: A Hermeneutical Framework for DerivingMarketing Insights from the Texts of Consumers' Consumption Stories," *Journal of Marketing Research,* 34(4), 438-55.

Tiidenberg, K. (2018), "Visibly ageing femininities: women's visual discourses of being over-40 and over-50 on Instagram," *Feminist Media Studies*, 18(1), 61-76.

Twigg, J. (2013), *Fashion and Age: Dress, the Body and Later Life*, New York: Bloomsbury Academic. "What makes Pinterest different?" https://business.pinterest.com/en, accessed February 10, 2020.

Wissinger, E. (2015), "#NoFilter: Models, Glamour Labor, and the Age of the Blink," *Interface*, 1(1), 1-20.

Zayer, L. T., K. Sredl, M.-A. Parmentier, and C. Coleman (2012), "Consumption and Gender Identity in Popular Media: Discourses of Domesticity, Authenticity, and Sexuality," *Consumption Markets & Culture*, 15(4), 333-57.

Consumers' Preferences and Their Inferences about Preferences Under Uncertainty

Chair: Randy Yang Gao, New York University, USA

Paper #1: Why (and When) Are Uncertain Price Promotions More Effective Than Equivalent Sure Discounts?
Celia Gaertig, University of Chicago, USA
Joseph P. Simmons, University of Pennsylvania, USA

Paper #2: A Curious Case of Curiosity: An Integrative Review of Recent and Seemingly Contradictory Findings
Christopher K. Hsee, University of Chicago, USA
Bowen Ruan, University of Iowa, USA

Paper #3: Consumers Confuse Consensus with Strength of Preferences
Graham Overton, Bocconi University, Italy
Joachim Vosgerau, Bocconi University, Italy
Ioannis Evangelidis, ESADE Business School, Spain

Paper #4: Risk Aversion or Profit Seeking? Explaining the Uncertainty Effect
Randy Y. Gao, New York University, USA
Minah H. Jung, New York University, USA

SESSION OVERVIEW

Uncertainty is prevalent in real life. Understanding uncertainty better will help improve a wide variety of decisions, for example, how to pique interests and incentivize customers (for marketers), when to seize on an attractive offer (for consumers), and whether to attend a special session (for conference attendees). Uncertainty is also pervasive in the academic literature, with previous researchers identifying both its costs (Gneezy, List, & Wu, 2006) and benefits (Goldsmith & Amir, 2010; Shen, Fishbach, & Hsee, 2015). How can we reconcile these seemingly paradoxical findings? Moreover, much of the information consumers encounter daily is inherently uncertain and often expressed in probabilities or proportions. How well do consumers understand these representations? The current session brings together four papers that shed new light on how people make judgments and decisions under uncertainty, from both empirical and theoretical perspectives.

The first paper by Gaertig and Simmons finds that uncertain price promotions are not always more effective than sure discounts of equal expected value. Specifically, the authors propose that consumers are more likely to prefer an uncertain price promotion to a sure discount only when the sure discount *feels* small.

The second paper by Hsee and Ruan presents an integrative framework that helps reconcile the apparent discrepancies in the existing literature regarding the effect of curiosity and uncertainty. The authors propose that the resolution of uncertainty and curiosity always bring positive utility, regardless of the actual outcome. When people are curious and such expected positive resolution utility is heavily weighted, people might engage in uncertainty-resolving behaviors even when the expected outcome utility is negative.

The third paper by Overton, Vosgerau, & Evangelidis finds that consumers confuse consensus information (e.g., 70% prefer product A over product B) with strength of preferences for the products (e.g. how much better A is rated than B). Specifically, consumers don't anticipate that an option preferred by fewer people often have ratings similar to – and sometimes even higher than – ratings of an option preferred by more people.

The final paper by Gao and Jung proposes a novel explanation for the Uncertainty Effect (Gneezy, List, & Wu, 2006). The authors argue that people are willing to pay less for an uncertain prospect than its worst payoff, not because they find the prospect inherently aversive, but because they want to exploit the deal for greater profit. Whereas the certain offer is construed as a regular transaction, and market norms prohibit exploitation in such cases, the game-like features of the uncertain offer enable profit-seeking, which gives the appearance of risk aversion. The Uncertainty Effect disappears when it is made difficult or impossible to exploit the uncertain offer.

Together, these four papers enrich our understanding of consumer decision-making under uncertainty, through well-powered empirical investigations, careful synthesis of existing research, and novel theoretical insights. We believe this session will prove not only intriguing to researchers in consumer judgment and decision making, but also useful to the broader audience of marketing practitioners and their customers.

Why (and When) Are Uncertain Price Promotions More Effective Than Equivalent Sure Discounts?

EXTENDED ABSTRACT

What do consumers prefer - a sure discount on a purchase or an X% chance to get the product at an even greater discount? Although the ubiquity of sure discounts might lead one to infer that they are more effective, recent research on this question suggests the opposite: Consumers seem to prefer uncertain promotions to equivalent promotions that offer a discount or reward with certainty (Goldsmith and Amir 2010; Mazar, Shampanier, and Ariely 2017; also see Shen, Fishbach, and Hsee 2014). In an important paper, Mazar, Shampanier, and Ariely (2017) demonstrated that people are more likely to purchase a product when it comes with a chance to get it for free than when it comes with a sure discount of equal expected value. This suggests that marketers should make more use of uncertain promotions than they currently do.

In the current project, we offer a theory that more fully explains these results, and that predicts that the effect will only emerge when the sure discount *feels* small. In four studies (N = 6,713), we find that uncertain price promotions are more effective than equivalent sure discounts only when those sure discounts *feel* small. Specifically, we find that uncertain promotions are relatively more effective when the sure discounts are actually smaller (Studies 1 and 2) or when the sure discounts are made to feel smaller by presenting them alongside a larger discount (Study 3) or by framing them as a percentage-discount rather than a dollar amount (Study 4).

In Study 1 (N = 2,302), we asked participants to choose among three hotels, one of which was promoted. We manipulated whether the promotion was certain (10% off) or uncertain (10% chance to get it for free), and whether the price of the promoted hotel was low ($48) or high ($480). Participants were more likely to choose the promoted hotel when it came with a chance-for-free promotion than when it came with a sure discount, $b = .057$, $SE = .021$, $p = .006$, and when the price was low ($48) than when it was high ($480), $b = .041$, $SE = .021$, $p = .045$. However, a significant interaction, $b = .084$, $SE = .041$, $p = .041$, revealed that the difference between the two promotion types was only significant for the low-price condition ($p = .001$), but not for the high-price condition ($p = .609$). Thus, the chance-for-free promotion only outperformed the sure discount when the sure discount was small ($4.80). Because the percentage associated with the promotion was held constant at 10%, this effect cannot be explained by consumers' overweighting of small probabil-

ities. In Study 2 ($N = 852$), we replicated the findings from Study 1 in a within-subjects design, where participants were asked to directly choose between the two types of promotions.

In Study 3 ($N = 1,188$), we manipulated how large or small a sure discount felt by manipulating the context. Participants were asked to imagine that they were buying a $50 training session, and that they could choose between receiving a $5 sure discount or a 10% chance to get it for free. We presented the training session alongside a gym membership which was either priced at $480/year (with a $48 discount) or $40/month (with a $4 discount). Participants were more likely to prefer the 10% chance-for-free promotion over a sure discount of $5 when the context was a $48 discount of the yearly membership price than when the context was a $4 discount of the monthly membership price, $b = .229$, $SE = .108$, $p = .034$. Thus, asking consumers to consider the same discount in the context of a larger discount increased people's relative preference for an uncertain promotion.

In Study 4 ($N = 2,371$), we tested an additional way to manipulate how large a sure discount feels, namely by manipulating whether the sure discount is framed as a percentage or a dollar amount. We first conducted a pretest which revealed that a sure discount is rated as smaller when it is framed as a percentage off than when it is framed as a dollar amount ($p < .001$). In Study 4, we then asked participants to imagine that they were buying a product that came with one of two types of promotions, either a 10% sure discount or a 10% chance to get it for free, and that they could choose which they would like to receive. We manipulated the price of the product to be low ($11) or high ($311), and, importantly, we also manipulated whether the sure discount was presented as a percentage (i.e., 10% off) or as the equivalent dollar amount (i.e., $1.10/$31.10 off). Participants were more likely to choose the chance-for-free promotion over the sure discount when the price was low than when it was high, $b = .241$, $SE = .075$, $p = .001$. More importantly and in line with our pretest, participants were also more likely to choose the chance-for-free promotion over the sure discount when the sure discount was framed as a percentage than when it was framed as a dollar amount, $b = .523$, $SE = .075$, $p < .001$. The interaction was significant as well, $b = .352$, $SE = .151$, $p = .019$, such that the framing of the sure discount had a larger effect in the low-price condition. Thus, the results from this study suggest that we can alter people's preferences for uncertain promotions simply by changing whether the sure discount is framed as a percentage or as a dollar amount.

Our findings are inconsistent with two leading explanations of consumers' preferences for uncertain over certain promotions – diminishing sensitivity and the overweighting of small probabilities – and suggest that people's preferences for uncertainty are more strongly tethered to their perceptions of the size of the sure outcome than they are to their perceptions of the probability of getting the uncertain reward.

A Curious Case of Curiosity: An Integrative Review of Recent and Seemingly Contradictory Findings

EXTENDED ABSTRACT

Many studies have been published recently on curiosity (e.g., Golman & Loewenstein, 2018; Hill, Fombelle, & Sirianni, 2016; Hsee & Ruan, 2016; Jepma, Verdonschot, Van Steenbergen, Rombouts, & Nieuwenhuis, 2012; Kang et al., 2009; Kobayashi, Ravaioli, Baranès, Woodford, & Gottlieb, 2019; Lau, Ozono, Kuratomi, Komiya, & Murayama, 2018; Noordewier & van Dijk, 2017; Oosterwijk, 2017; Ruan, Hsee, & Lu, 2018). However, the findings of these studies are disparate or even apparently contradictory. For example, some studies suggest that curiosity is "bad"—leading people to expose themselves to miseries (Hsee & Ruan, 2016; Lau et al., 2018; Oosterwijk, 2017), while other studies suggest that curiosity is "good"—leading to happiness and joy (Kang et al., 2009; Noordewier & van Dijk, 2017; Ruan et al., 2018; Golman, Loewenstein, Molnar, & Saccardo, 2019).

Closely related to curiosity is the notion of uncertainty, because curiosity arises from uncertainty in information. Like recent findings on curiosity, recent findings on uncertainty also yield seemingly contradictory findings. For example, Gneezy, List and Wu (2006) find that people dread uncertainty, so much so that they would rather have a dominated certain reward (e.g., $10 for sure) than a dominating uncertain reward (e.g., an even chance at $10 and $20; see also Newman and Mochon 2012; Simonsohn 2009), while Shen and coauthors (Shen, Fishbach & Hsee 2015; Shen, Hsee & Talleon 2018) find that people embrace uncertainty, so much so that they are more motivated to work for a dominated uncertain reward (e.g., an even chance of $5 or $10) than a dominating certain reward (e.g., $10 for sure). Other authors also report positive effects of uncertainty (Goldsmith and Amir 2010; Wilson, Centerbar, Kermer, & Gilbert, 2005).

We propose resolution utility (the experienced utility of resolving uncertainty and the accompanying curiosity) as a unifying theoretical construct that elucidates and integrates the seemingly disparate findings in the literature. Our theoretical framework builds on three central propositions.

The first proposition is that resolution utility is positive. Put differently, regardless of the outcome that resolves uncertainty, the mere resolution of uncertainty and the accompanying curiosity always yields positive utility. This is consistent with prior research suggesting that curiosity is "good" and can lead to happiness and joy. For example, learning the answer of a trivia and thus resolving one's curiosity about it is sufficient to produce positive feelings (Kang et al., 2009; Ruan et al., 2018). Learning or experiencing a negative outcome may feel bad, such as one learning she has lost in a gamble. However, that is because the *outcome utility*—the overall utility of the actual outcome(s) of an uncertainty—is negative. Above and beyond the negative utility of an outcome, the mere resolution of uncertainty may still produce positive resolution utility.

Building on positive resolution utility, the second proposition concerns uncertainty-resolving behavior. Specifically, we propose that the tendency to engage in (and repeat) a behavior that resolves uncertainty and the accompanying curiosity depends on expected *resolution utility* and expected *outcome utility* (the expected utility of the possible outcomes of an uncertainty because it is ex ante). For example, when people are presented with a box and need to decide whether or not to open it, the expected resolution utility is the expected pleasure of finding out what is in the box, and the expected outcome utility is the expected utility of the possible outcomes of the opened box. We predict that people would open the box if expected overall utility is positive and would not open it if expected overall utility is negative.

Our last proposition considers the relative weights of these two utilities and holds that when people are curious, they put more weight on the expected (positive) resolution utility than the expected outcome utility (which can be negative, neutral, or positive). Therefore, it is possible that the former may override the latter, leading people to resolve uncertainty even if they expect the outcome utility to be negative. Indeed, Hsee and Ruan (2016) find that because participants were curious about whether a prank pen would give electric shocks if clicked, they clicked the pen just to resolve their curiosity, even though doing so also put them at risk of being shocked. In this

case, the expected pleasure of uncertainty resolution overrode the expected pain of receiving an electric shock.

Our framework can also explain why an uncertain incentive (e.g., 20¢ or a 50¢) can be more motivating than a certain incentive (50¢) that dominate the uncertain incentive (Shen et al. 2015; 2018). A certain incentive produces only one type of positive utility, namely, the utility of receiving the discount (i.e., outcome utility). However, an uncertain incentive yields two types of positive utilities: the utility of resolving the uncertainty (i.e., resolution utility) and the utility of receiving the discount (i.e., outcome utility). Although the outcome utility of an uncertain incentive may be lower than that of a certain incentive, the resolution utility of the uncertain incentive can be greater than their difference in outcome utility, resulting in greater overall utility of the uncertain incentive, especially if people are curious about it.

This paper is important both theoretically and practically. Theoretically, it builds on Loewenstein's (1994) seminal work on curiosity and provides an integrative framework that reconciles seemingly contradictory recent findings on the topic. Practically, this review is timely, because the amount of information people seek and receive nowadays is unprecedented in human history; curiosity—the desire for information—is a main driving force in this information age and deserves better understanding.

Consumers Confuse Consensus with Strength of Preferences

EXTENDED ABSTRACT

Imagine you are shopping for a new car. You are deciding between a Honda Accord and a Toyota Camry. Looking online for comparisons of these cars, you find a poll according to which 72% of consumers prefer the Accord to the Camry. You may infer from this information that consumers like the Accord much better than the Camry. In fact, such inferences are natural and occur spontaneously (Kardes et al. 2004, *JCP*). Surprisingly, they are not necessarily correct. The Accord may have received a higher average rating than the Camry, but it is in fact more likely that the two cars received very similar ratings. It is even possible that the Camry was rated better than the Accord!

In general, it is more likely for two (average) ratings to be close to each other than far apart. When ratings are made on scales from 1 to 5, for example, it is much more likely to observe a difference of 1 than of 4 points, because there are many more possible combinations of ratings resulting in a difference of 1 (e.g., 5 & 4, 4 & 3, 3 & 2, etc.) than there are for a difference of 4 (5 & 1). This combinatorial reason holds no matter what proportion prefers one car to the other. Hence, even if 72% prefer the Accord to the Camry, it is more likely that the two cars received similar than vastly different ratings.

But how could the Camry receive a better average rating than the Accord? That is possible when the rating distributions are skewed (as is typically the case with online ratings). If the Camry's rating distribution is right-skewed and the Accord's distribution is left-skewed, the Camry can have a higher average rating than the Accord while a greater proportion of consumers prefer the Accord to the Camry.

We show that consumers are not aware of these regularities, which leads them to confusing consensus information (a measure of preference heterogeneity or preference uncertainty) with strength of preferences.

In Study 1 (N = 700, MTurk, https://aspredicted.org/blind. php?x=c8rj88), we tested whether consumers interpret consensus information beyond what it conveys about strength of preferences.

Participants were shown two wines, A and B, and told that both wines had been rated by consumers on a scale from 1 to 10. Participants were further told that either 90% preferred A to B, 65% preferred A to B, or were given no additional information (control). We then asked participants which was more likely, that A's average rating is 4 points higher than B's or that it is 1 point higher than B's (the latter is the correct answer in all conditions). Correct answers were incentivized with a bonus. The incorrect answer of 4 points higher was chosen 31.5% of the time in the control condition, was chosen 51.3% in the 65% consensus condition, and 69.2% of the time in the 90% consensus condition (all chi-squares against control p < .001), suggesting that consumers incorrectly infer strength of preferences from consensus.

Study 2 (N = 400, MTurk, https://aspredicted.org/blind. php?x=zx2y4f) used the same paradigm as Study 1 (wine A was preferred by 60[90]% to wine B). Participants were given three answer options: ratings of wine A and B differ by 0 to 1, by 2 to 3, or by 4 to 5 points. Like in Study 1, participants were more likely to incorrectly choose one of the larger preference differences (compared to 0 to 1) in both the 60% (74%) and the 90% consensus condition (89%; all binomial tests against equal choice shares p < .001).

Study 3 (N = 798, MTurk, https://aspredicted.org/blind. php?x=w6xq3q) tested whether consumers are aware that a less preferred product B can still have a higher average rating than the more preferred product A. Participants learned that two hotels, A and B, had been rated on 5-point scales and that 65% of consumers preferred Hotel A to Hotel B. Participants were then asked to choose which of the below answers were possible and incentivized with a bonus to select the most complete answer (option 3).

1. Average rating of Hotel A = 3.8, average rating of Hotel B = 3.2
2. Average rating of Hotel A = 3.2, average rating of Hotel B = 3.8
3. Both options 1) and 2) above are possible
4. Neither option 1) or 2) are possible

Option 1 was chosen more frequently than the, most complete answer, option 3, (43.7% vs 30.3%, binomial test *p = .002*). In another condition, we tested whether participants would make the same mistake when inferring consensus information from average ratings. Contrary to our expectations, the majority of participants failed again to choose the complete answer, similarly to the former condition (34.8%, $\chi^2(1) = 1.24$, $p = .266$).

Finally, Study 4 (N = 604, MTurk, https://aspredicted.org/blind. php?x=rp84jg) tested whether strategically displaying consensus or strength of preferences information influences consumer choice. Additionally, we tested if such an effect is driven by anchoring or confusing consensus with strength of preferences. Participants were told that Hotel A costs $135 and Hotel B costs $120. In the consensus conditions, participants were asked "Given that 60[90]% gave Hotel A a higher rating than Hotel B, which hotel would you choose?" In the strength of preferences conditions, participants were either told that Hotel A received a 0.4 [1.4] higher rating than Hotel B on a 5-point scale, or that Hotel A received a 400 [1,400] higher rating than Hotel B on a 5000-point scale. The 5000-point scale was included to test the influence of anchoring. We verified analytically that the strength of preferences (0.4 or 1.4 on a 5-point scale) represent the mean of the consensus information (60% or 90% preferring A to B).

For ratings on the 5-point scale, participants were more likely to choose the more expensive hotel when given consensus rather than strength of preferences information ($z = 5.13$, $p < .001$). Though the data are not consistent with anchoring, the effect did not occur on the 5000-point scale.

Risk Aversion or Profit Seeking? Explaining the Uncertainty Effect

EXTENDED ABSTRACT

Uncertainty abounds in the marketplace. Traditional sweepstakes and lotteries aside, recent years have also witnessed rising popularity of "mystery boxes", whose content is unknown to the buyer at the time of purchase. How much do consumers value uncertain offers? The answer appears to be "not much", according to research on the Uncertainty Effect (UE). Gneezy, List, & Wu (2006) found that people were willing to pay even less for an uncertain prospect than for its worst payoff. On the other hand, uncertain offers have been found to be just as enticing (Goldsmith & Amir, 2010) or even more enticing (Shen, Fishbach, & Hsee, 2015) than its best payoff.

In the current project, we propose a novel explanation for the UE that may help reconcile these seemingly contradictory findings: people are willing to pay less for an uncertain prospect, not because they find the prospect inherently aversive, but because they want to exploit it by paying little. While a certain offer is construed as a regular purchase, and market norms prohibit excessive exploitation, the novel and game-like features of an uncertain offer allows or even encourages people to exploit the offer. In six studies ($N = 4430$, all preregistered on AsPredicted), we found evidence consistent with our proposed explanation.

In **Study 1** ($N = 401$), we ask a series of straightforward questions to examine people's perception of the uncertain (vs certain) offers, as well as their considerations when deciding how much to pay. Participants were randomly assigned to evaluate either a certain offer (a $50 gift certificate), or an uncertain offer (a coin flip that gives either a $50 gift certificate or a $100 gift certificate). Participants felt the uncertain offer was more like a game and less like a regular purchase than the certain offer, ps < 0.001. More importantly, as we predicted, participants in the uncertain condition also stated that when they considered how much they would be willing to pay, it was less important to be fair to the seller but more important to maximize the profit, compared to participants in the certain condition, ps < 0.001.

If our "profit seeking" account holds, then we would not observe the UE when the uncertain prospect offers neither room nor need to seek profit. We believe that in the classic paradigm, because the value of the gift cards is fixed, it offers participants an opportunity to exploit the offer by paying little. We remove opportunity for exploitation by removing such "guaranteed amount" setup in the next two studies. **Study 2** ($N = 600$) asked participants (between-subjects) how much they would be willing to donate to either a preferred charity, a less preferred charity, or an uncertain charity (randomly chosen between the two). We found that people were willing to donate significantly more to an uncertain charity ($M = \$35.57$) than to a less preferred charity ($M = \$27.30$), $p = 0.010$. We also conceptually replicated the findings in a commercial, non-charity setting in **Study 3** ($N = 607$): participants were willing to add significantly more money to a gift card, if the gift card was from an uncertain retailer ($M = \$55.60$) than when it was from a less preferred retailer ($M = \$42.18$), $p < 0.001$. Taken together, results from **Studies 2-3** suggest that people are not simply averse to uncertainty per se.

Finally, in **Studies 4-6**, we test the moderating role of the salient exchange norms on consumers' valuation under uncertainty. If people pay little for the uncertain offer because they perceive it as salient market norms, then they should be less likely to exploit the uncertain offer when it becomes less appropriate to be excessively exploitative. It has been shown that the salient norms under PWYW deviate from the traditional market transaction norms (Gneezy, Gneezy, Riener, &

Nelson, 2012; Kim, Natter, & Spann, 2009). In **Study 4** ($N = 1211$), participants were asked how much they would be willing to pay to watch a preferred movie, a less preferred movie, or for a coin flip that gives them a ticket to watch either one of the two movies (randomly chosen). Half of participants in each condition were further told that the theater uses PWYW pricing, and they could pay any amount they want. Participants' WTP for the less preferred movie was lower under PWYW ($M = \$5.50$ vs. $M = \$7.32$), $p < 0.001$. Interestingly, participants' WTP for the uncertain movie actually *increased* under PWYW ($M = \$5.26$ vs. $M = \$4.22$), $p = 0.001$. In fact, while we replicated the UE without PWYW ($\$7.32$ vs. $\$4.22$, $p < 0.001$), we did not observe the UE under PWYW ($\$5.50$ vs. $\$5.26$, $p = 0.644$). In **Studies 5-6** ($N = 1611$), we replicated all the results above: under PWYW, WTP for the less preferred movie decreases while WTP for the uncertain movie increases, ps < 0.001. In neither study did we find the UE under PWYW ($p = 0.567$ and $p = 0.189$). These results are consistent with our theorizing that lower valuation in the classic uncertainty paradigm is driven by the perceived market norms. Under PWYW, however, such norms shift such that people do not maximally exploit under uncertainty even when they can by paying zero.

In summary, results from six studies challenge the "risk aversion" account of the UE, and support our proposed "profit seeking" account, which is also consistent with the finding that the UE is unique to pricing measures (Moon & Nelson, in press). To the best of our knowledge, we are the first to propose such an explanation for the UE, instead of an *aversion* to risk (Simonsohn, 2009; Newman & Mochon, 2012), bad deals (Yang, Vosgerau, & Loewenstein, 2013), or unexplained transaction features (Mislavsky & Simonsohn, 2018). Our results have both important practical implications and theoretical contributions, by calling attention to consumers' construal of a transaction during preference elicitation (Fischhoff, Welch, & Frederick, 1999).

REFERENCES

Fischhoff, B., Welch, N., & Frederick, S. (1999). Construal processes in preference assessment. Journal of Risk and Uncertainty, 19, 139–164.

Gneezy, A., Gneezy, U., Riener, G., & Nelson, L. D. (2012). Pay-what-you-want, identity, and self-signaling in markets. *Proceedings of the National Academy of Sciences, 109*(19), 7236-7240.

Gneezy, U., List, J. A., & Wu, G. (2006). The uncertainty effect: When a risky prospect is valued less than its worst possible outcome. *The Quarterly Journal of Economics*, 1283-1309.

Goldsmith, K., & Amir, O. (2010). Can uncertainty improve promotions? *Journal of Marketing Research*, *47*(6), 1070-1077.

Golman, R., & Loewenstein, G. (2018). Information gaps: A theory of preferences regarding the presence and absence of information. *Decision, 5*(3), 143-164.

Golman, R., Loewenstein, G., Molnar, A., & Saccardo, S. (2019). The demand for, and avoidance of, information. Working Paper.

Hill, K. M., Fombelle, P. W., & Sirianni, N. J. (2016). Shopping under the influence of curiosity: How retailers use mystery to drive purchase motivation. *Journal of Business Research, 69*(3), 1028-1034.

Hsee, C. K., & Ruan, B. (2016). The Pandora effect: The power and peril of curiosity. *Psychological science, 27*(5), 659-666.

Jepma, M., Verdonschot, R. G., Van Steenbergen, H., Rombouts, S. A., & Nieuwenhuis, S. (2012). Neural mechanisms underlying the induction and relief of perceptual curiosity. *Frontiers in behavioral neuroscience, 6*, 5.

Kang, M. J., Hsu, M., Krajbich, I. M., Loewenstein, G., McClure, S. M., Wang, J. T.-y., et al. (2009). The wick in the candle of learning epistemic curiosity activates reward circuitry and enhances memory. *Psychological Science, 20*(8), 963-973.

Kardes, F. R., Posavac, S. S., & Cronley, M. L. (2004). Consumer Inference: A Review of Processes, Bases, and Judgment Contexts. *Journal of Consumer Psychology, 14*(3), 230-256.

Kim, J.-Y., Natter, M., & Spann, M. (2009). Pay what you Want: A New Participative Pricing Mechanism. *Journal of Marketing, 73*(1), 44-58.

Kobayashi, K., Ravaioli, S., Baranès, A., Woodford, M., & Gottlieb, J. (2019). Diverse motives for human curiosity. *Nature Human Behaviour, 3*(6), 581-595.

Lau, J. K. L., Ozono, H., Kuratomi, K., Komiya, A., & Murayama, K. (2018). Hunger for Knowledge: How the Irresistible Lure of Curiosity is Generated in the Brain. *bioRxiv*, 473975.

Loewenstein, G. (1994). The psychology of curiosity. *Psychological Bulletin, 116*, 75-98.

Mazar, Nina, Kristina Shampanier, and Dan Ariely (2017), "When Retailing and Las Vegas Meet: Probabilistic Free Price Promotions," *Management Science*, 63 (1), 250–66.

Mislavsky, R., & Simonsohn, U. (2018). When risk is weird: unexplained transaction features lower valuations. *Management Science*, *64*(11), 5395-5404.

Moon, A., & Nelson, L. D. (In press). The uncertain value of uncertainty: When consumers are unwilling to pay for what they like. *Management Science*.

Newman, G. E., & Mochon, D. (2012). Why are lotteries valued less? Multiple tests of a direct risk-aversion mechanism. *Judgment and Decision Making*, *7*(1), 19-24.

Noordewier, M. K., & van Dijk, E. (2017). Curiosity and time: from not knowing to almost knowing. *Cognition and Emotion, 31*(3), 411-421.

Oosterwijk, S. (2017). Choosing the negative: A behavioral demonstration of morbid curiosity. *PloS one, 12*(7), e0178399.

Ruan, B., Hsee, C. K., & Lu, Z. Y. (2018). The Teasing Effect: An Underappreciated Benefit of Creating and Resolving an Uncertainty. *Journal of Marketing Research, 55*(4), 556-570.

Shen, L., Fishbach, A., & Hsee, C. K. (2015). The Motivating-Uncertainty Effect: Uncertainty Increases Resource Investment in the Process of Reward Pursuit. *Journal of Consumer Research, 41*(5), 1301-1315.

Shen, L., Hsee, C. K., & Talloen, J. H. (2018). The Fun and Function of Uncertainty: Uncertain Incentives Reinforce Repetition Decisions. *Journal of Consumer Research, 46*(1), 69-81.

Simonsohn, U. (2009). Direct risk aversion: Evidence from risky prospects valued below their worst outcome. *Psychological Science*, *20*(6), 686-692.

Wilson, T. D., Centerbar, D. B., Kermer, D. A., & Gilbert, D. T. (2005). The pleasures of uncertainty: prolonging positive moods in ways people do not anticipate. *Journal of personality and social psychology*, *88*(1), 5-21.

Yang, Y., Vosgerau, J., & Loewenstein, G. (2013). Framing influences willingness to pay but not willingness to accept. *Journal of Marketing Research*, *50*(6), 725-738.

Advances in Neuroforecasting: Forecasting Consumer and Firm Choice using Neural Data

Chairs: Steven D. Shaw, University of Michigan, USA
Carolyn Yoon, University of Michigan, USA

Paper #1: Using Neural Data to Improve Forecasts of Market-Level Behavior

Alexander Genevsky, Erasmus University, The Netherlands
Lester Tong, Stanford University, USA
Brian Knutson, Stanford University, USA

Paper #2: Population News Sharing is Reflected in Distributed Reward-Related Brain Activity

Bruce P. Doré , University of Pennsylvania, USA
Christin Scholz, University of Amsterdam, The Netherlands
Elisa C. Baek, University of California, Los Angeles, USA
Emily B. Falk, University of Pennsylvania, USA

Paper #3: Top or Flop: Quantifying the Value Of fMRI Data in the Prediction of Success of New Products

Marton Varga, INSEAD, France
Anita Tusche, Queen's University, Canada
Paulo Albuquerque, INSEAD, France
Nadine Gier, Heinrich Heine University, Germany
Bernd Weber, University of Bonn, Germany
Hilke Plassmann, INSEAD, France

Paper #4: Neuroforecasting Aggregate Choice in Online Dating: Predicting Aggregate Choices From Small Samples Using Neural and Behavioral Measures

Steven D. Shaw, University of Michigan, USA
Vinod Venkatraman, Temple University, USA
Carolyn Yoon, University of Michigan, USA

SESSION OVERVIEW

The nascent field of consumer neuroscience holds great promise for generating new insights and theory in consumer behavior. Recently, evidence has emerged indicating that neural activity in the brain's valuation system may be used to forecast market-level behavior of companies, products, and advertising performance. This phenomenon, called 'neuroforecasting', is the use of brain activity from a small sample of individuals to forecast choices or preferences of a separate, large population group of individuals (Knutson & Genevsky, 2018; Falk & Scholz, 2018). At present, a number of neuroforecasting studies have illustrated this phenomenon, including for music album sales (Berns & Moore, 2012), calls to a smoking cessation helpline (Falk, Berkman, and Lieberman, 2012), various ad metrics (Venkatraman et al., 2015; Falk et al., 2016), news sharing (Scholz et al., 2017), online media consumption (Tong et al., 2020), and microlending (Genevsky & Knutson, 2015). However, many open research questions surrounding neuroforecasting remain. This special session brings together work by leading researchers in this field to expand on our understanding of neuroforecasting.

The papers in this session aim to expand on our understanding of neuroforecasting. In the first paper, authors examine the role of generalizable and idiosyncratic choice processes by exploring how forecasts based on behavioral and neural measures are differentially impacted by the representativeness of the study sample to the market population, and show that when compared to behavioral measures, neural data is less impacted by the representativeness of the sample. This suggests that neural activity may be a more generalizable index of preference across individuals than self-report measures or observed behavior. In the second paper, authors seek to build a model of neural predictors of health information diffusion, focusing

on whole-brain representations of reward value elicited in response to health-related news articles. This paper highlights the advantages of using whole-brain patterns associated with reward valuation in addition to previously used region-specific and self-report predictors of health information sharing. The third paper in this session proposes a novel method to predict pre-launch product sales by combining retailer data about competitors with information from traditional surveys and fMRI data, and gauges the added value of each information source (*market data*, *survey*, *fMRI)*. Findings illustrate what managers can learn and the key benefits from running fMRI studies and/or traditional surveys before new product launch. The fourth paper in this session aims to test neuroforecasting in a novel market, using online dating profiles, and attempts to differentiate between how affective and informational components of choice can forecast market level outcomes.

In sum, the papers in this special session address the following research questions: 1) how do behavioral and neural measures perform when the sample of participants is more or less representative of the market?, 2) can neuroforecasting prediction be improved upon by expanding from previous region-based neural approaches to the use of multivariate brain patterns?, 3) what is the value of neuroforecasting to managers attempting to forecast sales?, and 4) do affective and informational components of stimuli contribute differently to neuroforecasts and can we forecast online dating decisions?

Using Neural Data to Improve Forecasts of Market-Level Behavior

EXTENDED ABSTRACT

Objective

Consequential decisions in business and public policy are often based on forecasts of population-level behavior. Any improvement in our ability to accurately predict aggregate-level responses will maximize the likelihood of product success and minimize waste of valuable time and resources. Motivated by theoretical challenges from economics (Bernheim 2008) and the promise of practical applications (Smidts et al. 2014), researchers have begun to explore whether brain activity in laboratory samples can forecast aggregate choice and how neural measures compare with more traditional measures (e.g., ratings, choices; Venkatraman et al. 2015). Although a growing literature demonstrating the capacity of neural data to forecast aggregate level behavior (see Knutson and Genevsky 2018)brain activations were recorded while smokers viewed three different television campaigns promoting the National Cancer Institute's telephone hotline to help smokers quit (1-800-QUIT-NOW, no research has explored the mechanisms that account for these out-of-sample predictions.

Despite evidence to support neuroforecasting, important questions remain regarding how individual choice processes scale to inform forecasts of aggregate choice. Collected evidence from the existing neuroforecasting literature suggests a "partial scaling" account, in which some choice components may forecast aggregate behavior more accurately than others (and by extension, more accurately than individual choice itself, which constitutes the integration of all supporting components). Specifically, with respect to fMRI markers, activity associated with positively aroused affect in the ventral striatum

(including the NAcc), loss anticipation in the anterior Insula (AIns), and value integration in the medial prefrontal cortex (MPFC). Thus, we predicted that primary neural responses indexed by striatal and insular activity may generalize more across individuals and thus forecast aggregate behavior more accurately than neural regions associated with idiosyncratic value integration (e.g., MPFC). Further, these basic neural responses may also forecast behavior more accurately than individual choice itself, which by definition incorporates these generalizable and idiosyncratic neural signals. In this paper, we examine the role of generalizable and idiosyncratic choice processes by exploring how forecasts based on behavioral and neural measures are differentially impacted by the representativeness of the study sample to the market population.

Methods

In phase one, participants in the scanner were presented with projects from a popular online crowdfunding platform and were asked to make incentive compatible funding decisions. Neural activity was collected while participants viewed and then made decisions regarding these projects. In phase two, a large internet sample (n= 3000) was asked to make similar funding choices regarding the same projects presented during the imaging phase. In addition to the funding choices, demographic characteristics were also collected about the internet participants. The laboratory sample's behavior and neural activity were then used to forecast the larger internet market's preferences. Using traditional demographic variables, we construct two independent marketplaces; one more and one less well represented by our laboratory sample. Forecasts of the project preferences in the two marketplaces were calculated independently and then contrasted. Based on previous work, neural predictions focus on activity in primary affective (i.e., nucleus accumbens, insula) and value integration (i.e. MPFC) regions. We hypothesized that in the well represented market both behavioral and neural measures would demonstrate significant prediction accuracies. However, in the less well represented market we will observe a much steeper decline in accuracy for behavioral prediction and a relatively stable prediction rate for the neural measures. This finding would support the hypothesis that primary neural components of choice generalize more than others, and thus forecast out-of-sample aggregate behavior better than individual choice itself.

Results

We first explored the association between the laboratory measures and market preferences independently for the representative and non-representative marketplaces. Using the laboratory sample's behavior, we find a significant correlation with the preferences in the representative marketplace ($r = .375$, $p < .05$) but not in the non-representative marketplace ($r = .249$, n.s.). This finding indicates that the ability of a sample to forecast market-level behavior is dependent on the representativeness of the sample. However, when we used neural activity from the lab sample we find significant, and nearly identical, correlations with preferences in the representative ($r = .470$, $p < .01$) and non-representative marketplaces ($r = .447$, $p < .01$). This suggests that neural prediction of aggregate behavior is less influenced by the representativeness of the sample.

Regression analyses further explored these relationships. Linear regression models including both behavioral and neural predictors of preferences in the representative market indicated that both lab behavior (coef. = .319, SE = .151, $p < .05$) and neural activity (coef. = .613, SE = .211, $p < .01$) accounted for significant and independent variance in the market. However, in the non-representative

market, only neural activity was significantly associated with the market preferences (coef. = .656, SE = .217, $p < .01$).

Discussion

We find that when compared to behavioral measures, neural data is less impacted by the representativeness of the sample. These data suggest that neural activity may be a more generalizable index of preference across individuals than self-report measures or observed behavior. In fact, for non-representative samples, only neural activity, and not behavioral measures, were significant predictors of market preference. In a representative sample, both behavioral measures and neural activity accounted for significant and independent variance in market preference.

These data provide clear and practical implications regarding the use cases in which neural measures can provide value to marketers. First, in situations in which representative samples are difficult to obtain, due to lack of information about the target audience or an inability to find suitable participants, neural measures may provide the best option for accurately forecasting market preference. Second, even when a representative sample can be established, neural measures can add significant predictive value to models of market preference. Further, this work is the first attempt to explore the neural and psychological mechanisms that underlie and account for neural prediction of market behavior and represents a significant conceptual advance in our understanding how choice scales from individual to aggregate levels.

Population News Sharing is Reflected in Distributed Reward-Related Brain Activity

EXTENDED ABSTRACT

Information that diffuses widely in the media environment can influence the behavior of individuals and shape broader directions of societal change. Previous studies have shown that information in targeted brain regions can be used to predict this diffusion of information. However, by focusing on these targeted regions, the approach in previous work has discarded information from the majority of the brain. Here, we sought to build a model of neural predictors of health information diffusion, focusing on whole-brain representations of reward value elicited in response to health-related news articles. Beyond enriching our scientific understanding of how and why health information spreads throughout a population, models of this kind could ultimately be used to forecast and enhance the impact of communications at population scale.

Current neurobiological models posit that the functional neuroanatomy of reward value extends beyond the core striatal and ventromedial prefrontal (vmPFC) regions that have received empirical attention in previous population prediction studies. These models propose that diverse brain systems interact to rapidly propagate reward-related information throughout the brain, generating a distributed value representation that directs cognition and behavior in a multi-faceted manner. However, it is unclear whether distributed brain representations of reward value hold information that can be used to predict the impact of messaging, beyond responses in core striatal and vmPFC regions.

We sought to address this gap in knowledge with two neuroimaging studies that quantified functional brain responses to New York Times health news articles and used these responses to predict sharing of these articles in the broader population of readers. In particular, we addressed two specific questions. First, does expression of a meta-analytically defined whole-brain reward valuation-related pattern predict population-level information sharing? Second, does

expression of this pattern improve prediction of population-level information sharing beyond what can be predicted from activity within reward-related brain regions and self-reports?

Results

Our initial question was whether expression of the meta-analytically defined reward-value related pattern was predictive of population-level article sharing (collected via the New York Times website). From the perspective of practitioners seeking to explain variance in the population-level success of messaging, it is important to characterize the predictive efficacy of our models in terms of how well they explain article-to-article variance in population sharing. Therefore, we also estimated the relationship between the average expression of the meta-analytically defined reward value pattern for each article (averaged across all the perceivers in a study) and the population sharing of those articles. This indicated that the standardized article-level relationship between pattern expression and population article sharing was $\beta = .33$, 95%CI[.12, 54] in Study 1 and $\beta = .41$, 95%CI[.21, .62] in Study 2.

In a next step, we sought to understand the extent to which a model incorporating expression of the reward-related pattern showed increased predictive accuracy relative to reduced models including only activity in a reward-related region of interest (ROI) and subjective ratings of the articles. First**,** we fit models that controlled for activity within the reward-related region (spanning vmPFC and ventral striatum), and self-reports of article value (reading intentions in Study 1, sharing intentions in Study 2), finding that expression of the reward value pattern predicted population article sharing above and beyond these other predictors in both Study 1, $\beta = .07$, 95%CI[.01, .14], and in Study 2, $\beta = .12$, 95%CI[.04, .21].

As above, in order to understand the practical value of each predictor in forecasting out-of-sample sharing, we estimated the variance explained by our brain and self-report predictors when aggregating data from all perceivers up to the article level. Combining the data from Studies 1 and 2, the aggregate article-level R^2 was .18, 95%CI[.05, .30], for a model 1 including only subjective ratings of the articles, .24, 95%CI[.10, .36], for a model 2 including subjective ratings and reward value-related ROI activity, and .34, 95%CI[.19, .46], for a model 3 including subjective ratings, reward value ROI activity, and reward value pattern expression. To estimate the out-of-sample predictive accuracy of these linear models, we used Bayesian leave-one-out (LOO) cross validation to derive LOO-adjusted deviance values (LOOIC) reflecting expected out-of-sample predictive error. The model including ratings, reward value ROI, and reward value pattern expression showed improved predictive fit relative to model 1 including only ratings, $\Delta LOOIC_{m3-m1} = -12.7$, SE=7.3, and relative to model 2 including ratings and reward value ROI activity, $\Delta LOOIC_{m2-m1} = -8.9$, SE=5.6. Overall, these results indicate that the expression of the reward value-related pattern substantially improved accuracy in predicting population-level article sharing, with a full model reaching on the order of one-third of the variance explained.

Discussion

We used neuroimaging to ask whether whole-brain response to health-relevant news articles could predict large-scale, out of sample, sharing of those articles, beyond previously identified brain and self-report predictors. Our results indicated that expression of a distributed pattern of brain activity meta-analytically associated with reward valuation substantially improved accuracy in predicting population sharing of the health news articles, beyond previously identified brain and self-report predictors. Further, the predictive ef-ficacy of the pattern was not reducible to patterns of activity within core brain reward regions but rather depended on larger-scale patterns of activity distributed widely across cortical, subcortical, and brainstem systems. These findings highlight the advantages of using whole-brain patterns associated with reward valuation in addition to previously used region-specific and self-report predictors of health information sharing.

If the brain holds information that can be used to forecast large-scale behavior, how do we best characterize and model this activity? Here we suggest that, in addition to summed activity within core value-related brain regions, it is useful for neural prediction models to incorporate information about distributed brain representations of value. Overall, this work contributes to our growing ability to use neural data to forecast out-of-sample outcomes and augments our understanding of the brain mechanisms that underlie how information diffuses (or fails to diffuse) across a population of individuals.

Top or Flop: Quantifying the Value of fMRI Data in the Prediction of Success of New Products

EXTENDED ABSTRACT

Managers are keen to obtain the best possible forecast about future sales, so that they can plan with operations ahead and adjust marketing policies if necessary. This is especially the case for new products for which, by definition, no previous sales information is available. Some innovations might turn out to be best-sellers, exceeding previous expectations. If managers anticipate such future success, they can previously plan to avoid stock-out, for instance. Other innovations might become clear failures, which can even endanger the reputation of the company. Having a good forecast about the fiasco can support managers in their decision whether to launch the product at all.

We propose a novel method to predict pre-launch product sales by combining retailer data about competitors with information from traditional, representative surveys in which participants were asked to give their views about existing and new products as well. Importantly, we further add functional magnetic resonance imaging (*fMRI*) data to the model, in which we measure the brain activity of participants during survey questions.

Since the seminal work of Bass (1969), various authors have studied the adoption of new products (Lee et al., 2003; Neelamegham and Chintagunta, 1999; Lenk and Rao, 1990). Traditionally, such studies relied on either revealed or stated preference data, but more recently some utilized a combination of these two (Helveston et al., 2018; Hardt et al., 2017; Phaneuf et al., 2013; Morikawa et al., 2002; Harris et al., 1999). As the standard goal of this field is to make inference about the real-world market, choice experiments have been improved to better mirror the outcomes when consumers face the purchase decision in the store as opposed to the lab (Gilbride et al., 2008; Allenby et al., 2005; Wertenbroch and Skiera, 2002).

Recently, a growing body of literature established the link between the activity in certain areas of the brain and real-world monetary outcomes. Kühn et al. (2016) found that their *fMRI* data correlated with supermarket sales of existing products. *fMRI* also explained a large part of the variance in real-world advertising elasticities (Venkatraman et al., 2015) beyond stated preference survey, of market funding outcomes (Genevsky et al., 2017), and of the success of microloan requests (Genevsky and Knutson, 2017). Given the explanatory power of the recorded brain images, we believe that incorporating *fMRI* into an economic model that builds on pooling revealed and stated preference data will lead to more accurate sales forecasts.

We obtained data from a large German supermarket chain about the weekly sales of 19 innovative grocery products launched within the last two years. We have information on the weekly quantity sold from each new product (at least in its first year), and from two or more competitors (at least in their last year before the new product launch). In each store of the retailer the management can decide whether to offer a certain product at a given week and has some flexibility in price setting as well.

Survey participants representative of those who typically shop at our retailer indicated their preference for some of the innovations and their respective competitors. Participants first saw pictures of the products without price information and were asked to indicate how much they like the product and its packaging on a 7-point Likert-scale. Thereafter, they were asked to indicate their purchase intention at the price recommended by the retailer on a 4-point Likert-scale.

Furthermore, we recruited 44 participants in order to measure their brain activity while answering the questions of the same survey. In addition, these participants were asked to indicate their purchase intention on a 4-point Likert-scale in an incentive compatible experiment in which they had monetary incentives to reveal their true preferences. The brain activity of the participants was measured using *fMRI*. Consequently, we have variables reflecting the activity of three pre-defined regions of interest (i.e., the vmPFC, vStr and anterior Insula) brain areas at the time when the product is viewed and when the purchase intention is stated.

We develop a structural economic model, in which consumers form preferences about existing and innovative products and make purchase decisions accordingly. Consumer choice is modeled via the utility function, which incorporates covariates from all three data sources. We derive the likelihood of the stated preference data using a *Multivariate-Ordered-Probit* framework, while for the aggregated market data using a market-share based approach. These models are connected via a set of common parameters that measure the latent attractiveness of a particular product. We combine the three likelihoods to form a joint objective function to maximize.

Using the estimated utility-based coefficients we forecast the sales and the number of adopting retailers of the innovative products before there are launched. We repeat these sales forecasts with using only a subset of the datasets (*market data*, *survey*, *fMRI*), so that we can gauge the added value of each information source. With our approach, manager can learn the benefits of running *fMRI* studies and/or traditional surveys before new product launch.

Neuroforecasting Aggregate Choice in Online Dating: Predicting Aggregate Choices From Small Samples Using Neural and Behavioral Measures

EXTENDED ABSTRACT

The ability to predict aggregate, market level choices from a small sample of individuals can provide tremendous value in a variety of domains (e.g., product success, political elections). In this paper, we advance our understanding of decision-making and choice by assessing behavioral and neural approaches to forecasting aggregate choices in an online dating context both within a small sample ($n < 50$) and in an independent simulated market sample ($n > 250$). In accordance with the affective-integration-motivation (AIM) framework, we propose that affective neural components of individual choice are most useful for aggregate forecasting, whereas neural components associated with the integration of information are most useful for individual-level prediction.

At present, a small number of studies have provided a proof of concept for neuroforecasting aggregate choice. In these experiments, a small group of participants ($n = \sim 30\text{-}50$) are shown unfamiliar, novel, real-world stimuli, and their neural activity data is used to predict the real-world outcomes of the stimuli once the market has matured (several months or years later). Such neuroforecasts have been reported for song downloads (Berns & Moore, 2012), call-back rates (Falk, Berkman, and Lieberman, 2012), various ad metrics (Venkatraman et al., 2015; Kühn, Strelow, and Gallinat, 2016; Falk et al., 2016), and loan/funding appeals (Genevsky and Knutson, 2015; Genevsky, Yoon, and Knutson, 2017). In nearly all of these studies, the NAcc and MPFC (separately or together) were the key contributors to forecasting aggregate level choices. However, exactly how these two brain areas contribute to aggregate choice prediction, their prediction weights or under which conditions each/either is effective, is not yet clear.

Knutson & Genevsky (2018) propose that the AIM model (Samanez-Larkin & Knutson, 2015) could provide a useful framework for understanding neuroforecasting. Specifically, affective components of individual choice may be most useful for aggregate forecasting, whereas neural regions associated with integrating affective information into one's goals and context may be more predictive of individual choices (captured by brain activity in the NAcc and vMPFC, respectively). To test the AIM model's efficacy for explaining neuroforecasting aggregate choice, we will attempt to forecast the success of online dating profiles.

Online dating profiles provide a suitable context for this research question because: 1) online dating profiles have both affective (e.g., facial image) and informational (e.g., occupation or personality) components, and 2) online dating is a novel market for neuroforecasting. To this end, we created 36 standardized dating profiles using faces from the Chicago Face Database (Ma, Correll, & Wittenbrink, 2015). Profiles were orthogonalized using a 3 x 2 x 2 x 3 factorial design: attractiveness (high, medium, low), age (19-23, 24-28), facial expression (neutral, smiling), and profile description (hobbies/likes, SES/occupation, and personality traits). During the task, participants were randomly shown all 36 profiles (within-subjects), made a binary 'like' or 'pass' choice for each profile, and rated each profile on attractiveness, career prospects, likability of personality, and likelihood that the individual in the profile will 'like' them back.

Market level descriptive statistics revealed that participants rate profiles with a smiling face higher on positive personality characteristics and believe the individuals in these profiles will be more willing to 'like' them back. Additionally, SES/occupation indicators in a profile description led to participants rating the profiles as having better career prospects. Factorial design attractiveness bins correlated highly with participants' attractiveness ratings of profiles. Regression results indicated that aggregate in-lab sample ($n = 45$) reported levels of attractiveness, career prospects, personality, and likelihood of 'like' back of profiles explained a significant amount of variance in profile choice likelihood within sample ($F_{(4, 31)} = 45.21$, $p < .01$, $R^2_{Adj} = 0.83$) and out of sample/at the market-level ($n = 273$; $F_{(4, 31)} = 15.82$, $p < .01$, $R^2_{Adj} = 0.63$). Training a model with these same variables to predict the aggregate choice likelihood of randomly selected holdout profiles (75/25 train/test; 50 iterations) resulted in correct choice likelihood prediction (+/- 5% of actual choice likelihood) 43.5% of the time within sample, and 33.0% of the time for the market population.

In accordance with the AIM model, we hypothesize: H1: Affective neural components, captured by activity in the NAcc, will be most highly correlated with perceived attractiveness and facial expression, and more likely to forecast aggregate choice. H2: Neural activity associated with integration, captured by activity in the medial prefrontal cortex, will be most highly correlated with per-

ceptions of career prospects and personality and will be most useful for predicting choices at the individual-level. Market-level data have been collected; fMRI scanning has been postponed due to the CO-VID-19 pandemic.

REFERENCES

Allenby, G., Fennell, G., Huber, J., Eagle, T., Gilbride, T., Horsky, D., et al. (2005). Adjusting choice models to better predict market behavior. *Marketing Letters*, 16(3-4), 197-208.

Bass, F. M. (1969). A new product growth for model consumer durables. *Management science*, 15(5), 215-227.

Baek, E. C., Scholz, C., O'Donnell, M. B., & Falk, E. B. (2017). The Value of Sharing Information: A Neural Account of Information Transmission. *Psychological Science, 28*(7), 851–861.

Bartra, O., McGuire, J. T., & Kable, J. W. (2013). The valuation system: a coordinate-based meta-analysis of BOLD fMRI experiments examining neural correlates of subjective value. *NeuroImage, 76*, 412–427.

Berns, G. S., & Moore, S. E. (2012). A neural predictor of cultural popularity. *Journal of Consumer Psychology*, *22*, 154–160.

Falk, E., & Scholz, C. (2018). Persuasion, influence, and value: Perspectives from communication and social neuroscience. *Annual Review of Psychology*, 69, 329–356.

Falk, E. B., Berkman, E. T., & Lieberman, M. D. (2012). From neural responses to population behavior: Neural focus group predicts population-level media effects. *Psychological Science*, *23*, 439–445.

Falk, E. B., O'Donnell, M. B., Tompson, S., Gonzalez, R., et al. (2016). Functional brain imaging predicts public health campaign success, *Social Cognitive and Affective Neuroscience*, *11*(2), 204–214.

Genevsky, A., & Knutson, B. (2015). Neural affective mechanisms predict market-level microlending. *Psychological Science*, *26*, 1411–1422.

Genevsky, A., Yoon, C., & Knutson, B. (2017). When brain beats behavior: Neuroforecasting crowdfunding outcomes. *Journal of Neuroscience*, 37(36), 8625-8634.

Gilbride, T. J., Lenk, P. J., & Brazell, J. D. (2008). Market share constraints and the loss function in choice-based conjoint analysis. *Marketing Science*, 27(6), 995-1011.

Hardt, N., Kim, Y., Joo, M., Kim, J., & Allenby, G. M. (2017). Reconciling Stated and Revealed Preferences. *Working paper*

Harris, K. M., & Keane, M. P. (1998). A model of health plan choice: Inferring preferences and perceptions from a combination of revealed preference and attitudinal data. *Journal of Econometrics*, *89*(1-2), 131-157.

Helveston, J. P., Feit, E. M., & Michalek, J. J. (2018). Pooling stated and revealed preference data in the presence of RP endogeneity. *Transportation Research Part B: Methodological, 109*, 70-89.

Knutson, B., & Genevsky, A. (2018). Neuroforecasting Aggregate Choice. *Current Directions in Psychological Science*, 4, 096372141773787–6.

Kühn, S., Strelow, E., & Gallinat, J. (2016). Multiple "buy buttons" in the brain: Forecasting chocolate sales at point-of-sale based on functional brain activation using fMRI. *NeuroImage*, *136*, 122-128.

Lee, H., Smith, K. G., & Grimm, C. M. (2003). The effect of new product radicality and scope on the extent and speed of innovation diffusion. *Journal of Management*, *29*(5), 753-768.

Lenk, P. J., & Rao, A. G. (1990). New models from old: Forecasting product adoption by hierarchical Bayes procedures. *Marketing Science*, *9*(1), 42-53.

Ma, D. S., Correll, J., & Wittenbrink, B. (2015). The Chicago face database: A free stimulus set of faces and norming data. *Behavior Research Methods*, *47*(4), 1122–1135.

Morikawa, T., Ben-Akiva, M., & McFadden, D. (2002). Discrete choice models incorporating revealed preferences and psychometric data. *Advances in Econometrics*, *16*, 29-56.

Neelamegham, R., & Chintagunta, P. (1999). A Bayesian model to forecast new product performance in domestic and international markets. *Marketing Science*, *18*(2), 115-136.

Phaneuf, D. J., Taylor, L. O., & Braden, J. B. (2013). Combining revealed and stated preference data to estimate preferences for residential amenities: A GMM approach. *Land Economics*, *89*(1), 30-52.

Samanez-Larkin, G. R., & Knutson, B. (2015). Decision-making in the ageing brain: Changes in affective and motivational circuits. *Nature Reviews Neuroscience*, *16*, 278–289.

Scholz, C., Baek, E. C., O'Donnell, M. B., Kim, H. S., Cappella, J. N., & Falk, E. B. (2017). A neural model of valuation and information virality. *Proceedings of the National Academy of Sciences of the United States of America, 114*(11), 2881–2886.

Schultz, W. (2015). Neuronal Reward and Decision Signals: From Theories to Data. *Physiological Reviews, 95*(3), 853–951.

Tong, L. C., Yavuz Acikalin, M., Genevsky, A., Shiv, B., & Knutson, B. (2020). Brain activity forecasts video engagement in an internet attention market. *Proceedings of the National Academy of Sciences of the United States of America*, 117(12), 6936–6941.

Venkatraman, V., Dimoka, A., Pavlou, P. A., Vo, K., Hampton, W., Bollinger, B., . . . Winer, R. S. (2015). Predicting advertising success beyond traditional measures: New insights from neurophysiological methods and market response modeling. *Journal of Marketing Research*, *52*, 436–452.

Vickery, T. J., Chun, M. M., & Lee, D. (2011). Ubiquity and specificity of reinforcement signals throughout the human brain. *Neuron, 72*(1), 166–177.

Wertenbroch, K., & Skiera, B. (2002). Measuring consumers' willingness to pay at the point of purchase. *Journal of Marketing Research*, *39*(2), 228-241.

Sharing and Consumer Experience: How Does Different Forms of Sharing Affect Consumer Evaluations of Experience

Chairs: Der-Wei Huang, Indiana University, USA
Shanker Krishnan, Indiana University, USA

Paper #1: The Paradox of Social Interaction in the Sharing Economy

Dafna Goor, Harvard University, USA
Amir Grinstein, Northeastern University, USA
Nailya Ordabayeva, Boston College, USA
Meike H. Morren, Vrije University, The Netherlands

Paper #2: The Meme Economy: How Internet Memes Impact Consumption

Nicole Kim, University of Maryland, USA
Jared Watson, New York University, USA

Paper #3: Let Me See How I Look: How Visual Perspective Affects Consumer Experience and Sharing Behaviors

Der-Wei Huang, Indiana University, USA
Shanker Krishnan, Indiana University, USA

Paper #4: Indulging Online: A Moral Dilemma

Marie Ozanne, Cornell University, USA
Anna Mattila, Pennsylvania State University, USA

SESSION OVERVIEW

Sharing is an important part of consumers' consumption experiences and decision-making. Interestingly, there are different ways in which consumers can share. Consumers may share resources that are intangible, such as information and experiences, or consumers may share products and physical goods, such as taxi rides and hostels. Existing research has looked at how sharing experiences could affect consumer memories, enjoyment, and perceptions of morality (e.g., Barasch, Zauberman, and Diehl, 2018; Campbell and Winterich, 2018; Tamir et al., 2018). Advancing the existing findings, in the current session, we bring together four papers that examine how consumer experiences and decision-making are influenced by different modes of sharing.

The first paper examines how sharing products and services affects consumer experience in a shared economy. In particular, the authors show that despite the rising demand for the sharing economy that is also driven by social motivation, consumers rate their experience in the sharing economy lower, compared to the traditional economy (e.g., hostel vs. Airbnb, taxi vs. uber, restaurant vs. shared dining). This paper also demonstrates that such sharing is caused by social anxiety and increase in awareness to social interactions.

The second paper examines a novel mode, internet 'memes,' that consumers use to share information on social media. Specifically, the authors examine how consumers make inferences about a target content referenced in a meme, and that it can impact subsequent consumption decisions. Specifically, memes, compared to other social media posts in non-meme format, can increase consumption attitudes toward the target content. This is because the use of memes increase the perception that the target content has gone viral, invoking consumers' FOMO (i.e., fear of missing out), thereby increasing consumption intentions.

The third and fourth papers investigate how sharing contexts or sharing behavior affect the consumption experience and some investigate when we are more likely to share. The third paper demonstrates how visual perspective of photos of an experience affect consumer attitude toward an experience, and their sharing behavior

on social media. The authors' findings show that when consumers see photos taken from the actor's perspective (vs. observer's perspective), consumers generate more favorable attitude toward the experience of an event, and they are more likely to share this experience on social media.

The fourth paper demonstrates that the anticipated reaction from the audience when sharing online has an important impact on experience enjoyment. Moving away from the belief that known others don't judge as harshly as unknown others, the paper shows that when consumers share pictures of indulgence foods online, they anticipate less positive judgements from people they know (vs. mostly don't know) and enjoy less the food after sharing the picture.

Together these four papers examine how consumers behave in a sharing context, whether it being offline (in a sharing economy) or online (on social media), and investigate the underlying mechanisms. The fours papers contribute to the literature in sharing economy, emotions, and consumer decisions and judgement.

The Paradox of Social Interaction in the Sharing Economy

EXTENDED ABSTRACT

The sharing economy has been rising in the past decade. Its key sectors are expected to grow in revenue from $15 billion in 2014 to $335 billion in 2025 (*PwC* 2015). However, little is known about users' experience on peer-to-peer platforms in the sharing economy or the relationship between the sharing economy and wellbeing (Eckhardt et al. 2019). Rather, prior research focused on the *economic* value of the sharing economy (Eckhardt and Bardhi 2015; Neoh et al. 2017). Yet, our pilot study (N=148, Mturk) shows that consumers' *social*, in addition to financial, motivations to enter the sharing economy are greater than other motivations (e.g., environmental, cultural; p's<.001; see also Milanova and Maas 2017). Furthermore, our analysis of ads of ten leading sharing economy brands (N=79, broadcasted between 2016-2018) reveals that companies capitalize on *social* drivers (68.4% of the ads used social interaction narratives and 89.9% community narratives).

Building on these preliminary findings on the substantial role of social interaction in the sharing economy, we suggest that consumption experiences in the sharing economy may elicit greater social awareness in consumers than parallel experiences in the traditional economy (e.g., Uber vs. taxi, Airbnb vs. hostel, Eatwith vs. restaurant). Consequently, focus on social interaction may paradoxically *decrease consumer satisfaction* and even translate into lower ratings.

Five studies use mixed methodologies, combining lab experiments and archival data from a leading sharing economy company, to test our predictions.

Study 1 tested the effect of the sharing (vs. traditional) economy on consumer satisfaction. Participants (N=167, M_{age}=33.6, 38% female, MTurk) imagined they went on a one-week trip. In the sharing (vs. traditional) economy condition, they imagined staying at an Airbnb (vs. YMCA) apartment, where they got a private room but shared house amenities with other people. Participants rated the sharing economy experience as less satisfying (M=3.35) than the traditional economy experience (M=3.90, p=.026).

Next, we investigate the role of social interaction.

First, an exploratory study (N=211, M_age=37.38, 32.5% female, Mturk) revealed that, across product categories (transportation, accommodation, dinning, master class, and wine tasting), consumers perceive the sharing (vs. traditional) economy as involving greater social interaction ($t(210)$=5.76, p<.001) and stress ($t(210)$=5.04, p<.001). However, the P2P (sharing) vs. traditional providers' levels of knowledge and expertise were not perceived to be significantly different ($t(210)$=1.60, p=.11).

Study 2 examined the effect in a setting with social appeal – shared dining, and investigated the underlying psychological process. Undergraduate students (N=160, M_{age}=19.9, 49% female) imagined going to dinner with a friend in a shared dining event (vs. a restaurant) called EatOut in a nearby city. At the venue there was a chef who served traditional Italian food and ten diners engaged in conversations. The results revealed that the sharing economy decreased satisfaction (M=4.34) and overall well-being (comfort, enjoyment, and pleasant experience; M=3.93) compared to the traditional economy (M=4.74, p=.025; M=4.23, p=.009; respectively). Importantly, social awareness mediated the effect ("I would feel more socially aware," "The presence of others would bother me," and "The interactions with the chef and the other guests might feel awkward"; α=.58; $a\times b$=-.0870, 95% CI=[-.1627,-.0287]).

We also tested the role of privacy concerns which may impact consumer experience ("I am concerned that because I went to EatOut, some people may have my personal information" and "Other people at EatOut are likely to invade my privacy"; r=.57, p<.001). Privacy concerns also mediated the effect ($a\times b$=-.0630, 95% CI=[-.1533,-.0064]), but importantly, a competitive mediation analysis (Model 4) showed that only social awareness mediated the effect, ruling-out a relevant alternative explanation.

Study 3 sought to document the role of social interaction in the sharing economy in a real-world setting. We used a supervised machine learning approach (Support Vector Machine; SVM) to analyze reviews (N=25,251 English reviews out of 31,041 reviews in all languages) from a world-leading shared dining platform. First, 3,000 sentences were randomly sampled from the reviews and labeled as 1 if referenced social interaction or 0 if not (four independent coders; α>.8). The best-fitting SVM model was used to classify the rest of the sentences. Then, for each review, we created a social interaction score which represents the percentage of sentences in a review that mentioned social interaction. Due to skewness of the data, we treated ratings as five stars (=1) or fewer stars (=0). As expected, a logit regression of social interaction on rating revealed a negative effect (β=-.155, p=.0135), indicating that social awareness decreased consumer satisfaction. The effect holds when controlling for location and price as well as with full variation in star ratings. Interestingly, a greater number of guests at dinner decreased ratings (p<.001; also accounting for the individual's party). The negative effect of party size on ratings was mediated by greater emphasis on social interaction in the reviews.

Finally, Study 4 sought to manipulate social interaction and examine the effect in another context – ride sharing, where social motivation is considered less meaningful. Participants (N=407, M_{age}=34, 38% female, Mturk) imagined that they took an Uber to get to a meeting in the city. The ride arrived quickly and they got to the meeting on time. Participants read that they were the only passenger (control) vs. sat next to another passenger (shared) vs. sat next to another passenger who tried to start a conversation (increased social interaction) vs. another passenger who was wearing headphones and concentrated on their phone (decreased interaction). The shared and high social interaction conditions decreased consumer satisfaction and well-being compared to the control condition (p's < .001). Im-

portantly, reduced social interaction increased satisfaction and well-being compared to the shared and increased greater social interaction conditions (p's < .043) to the level of the control condition (p=.176).

Our work answers an urgent call for research on the nature and role of the social environment in the sharing economy and its impact on consumer wellbeing (Eckhardt et al. 2019), and adds useful insights to marketing practice. It also contributes to sociology theories on group dynamics by documenting a unique setting of initiated social interactions in an economic context and the unexplored impact of group size.

The Meme Economy: How Internet Memes Impact Consumption

EXTENDED ABSTRACT

In the current society, a major portion of word-of-mouth and information sharing takes place online (Chen and Xie 2008; Godes and Mayzlin 2004; Kozinets et al. 2010). Among a flood of information exchanged online, certain content receives more attention and becomes viral (Godes and Silva 2012). As virality indicates greater impressions and sales for firms, prior work have investigated if certain types of content are more likely to achieve viral status online, such as ones that are more humorous and emotional (Berger and Milkman 2012; Warren et al. 2018). However, less is understood about how consumers might infer virality of certain online contents and whether the perception of virality can drive consumption behaviors.

In this paper, we propose that internet 'memes' evoke the inference that a content has become viral, and that this perception increases consumption intention. Memes are often created by consumers, usually in a picture and word caption format. Originally coined as a term to describe the mutation and evolution of ideas by Richard Dawkins, a key characteristic of a meme is that it mutates an original content to add a novel idea. For instance, an image of a grumpy cat combined with a written caption, 'Love is in the air? Get out the gas mask' is a meme that mutates the original content, a grumpy cat. Even though millions of consumers encounter and share memes on social media and firms realize its importance (McCrae 2017), consumer research has not yet investigated this phenomenon. We theorize that when encountering a meme, consumers infer that the focal content (e.g., grumpy cat) has become viral. This perception of virality invokes a sense of FOMO for consumers who do not understand the focal content (i.e., fear of missing out; Hayran et al. 2016; Rifkin et al. 2015), which leads to an increased intention to consume.

To provide preliminary support for our predictions, a 2-cell between-subjects design (N=77) was used in study 1. The *meme* condition participants imagined that while browsing on social media, they saw that their friend had "posted a meme about a new TV show," while the *non-meme* condition imagined that their friend had "made a post about a new TV show." As predicted, participants who saw a social media post in the form of a meme (vs. non-meme) reported greater consumption intention toward the new TV show (3 items measuring their interest, likelihood of watching trailer, and description of reading about the TV show; M=5.13 vs. 4.49, p=.018). In a subsequent consequential choice, memes also significantly increased the likelihood that participants chose to read the TV show mentioned in the social media post (63% vs. 38.5%; $\chi2(1) = 4.70$, $p = .041$).

Study 2 had two objectives. First, we aimed to replicate the effects from study 1 using real memes and non-meme posts (i.e., an image and caption format), rather than relying on the participant to imagine a post. Second, we tested the mediation process of perceived virality. In a 2-cell between-subjects design (N=147), participants imagined browsing on Twitter. Next, participants in the *meme* condi-

tion were presented with a post by CBS Sports, with a meme about Kawhi Leonard, a basketball player who had won the NBA championship title. Those in the *non-meme* condition also saw a similar post, but the image in the post was simply a photo of Kawhi Leonard. Consistent with the results of study 1, seeing a tweet that employed a meme increased consumption intention, compared to a tweet by the same source that employed a non-meme image (M=4.54 vs. 3.61, p=.007). Also, as predicted, three items measuring perceived virality of Kawhi Leonard's title revealed that a tweet employing a meme (vs. non-meme) was perceived to have become more viral (M=5.30 vs. 4.78, p=.031). Perception of virality significantly mediated consumption intentions (b=.3930, SE=.1728, 95% CI: [.0555, .7253]).

Study 3 was aimed to test directionality of the effects, such that memes indeed increase consumption intention, rather than other forms of social media posts decreasing consumption intention. In a 3-cell between-subjects design (*control* vs. *traditional ad* vs. *meme*; N=145), participants saw a social media post about a new TV series by AmazonPrime. Participants saw one social media post by an account called FilmAndTVGuru, either with no image, a poster of the show, or a meme. Similar to the previous study results, the meme condition significantly increased consumption intention compared to the control condition (M=3.52 vs. 2.76, p=.042). While the traditional ad (M=3.09) did not significantly differ from the control (p=.837) nor the meme condition (p=.493). Importantly, the results also demonstrate that the meme condition increased the perception of virality compared to both the control condition (M=3.29 vs. 2.37, p=.006) and the traditional ad condition (M=2.40, p=.008). There was no difference between the control and ad condition (p>.95).

Finally, our theory is that when a consumer encounters a meme, it is perceived to have gone viral, which evokes FOMO (i.e., fear of missing out), thus increasing one's own intention to consume the content of the meme. Thus, even if a social media post involves a meme, when FOMO is not evoked, such as when a meme is posted by a company, rather than one's friend, the effects would be attenuated. Study 4 tested this using a 2(meme vs. non-meme) X 2(source: friend vs. firm) between-subjects design (N=372). In a similar set-up as previous studies, participants saw either a post involving a meme image or a non-meme image. To manipulate the source, participants in the *friend* conditions saw a post by a friend, while those in the *firm* conditions saw a post by a firm, Hulu. As intended, FOMO was triggered when participants saw a meme (vs. non-meme) posted by a friend (M=3.82 vs. 3.49, p=.067), but the image format did not impact FOMO when the source was a firm (M=2.68 vs. 2.86, *NS*). Further, confirming our predictions, memes increased consumption intention when the source was a friend (M=3.57 vs. 3.16, p=.083), but it did not have impact when the source was Hulu (M=3.53 vs. 3.62, *NS*).

Let Me See How I Look: How Visual Perspective Affects Consumer Experience and Sharing Behaviors

EXTENDED ABSTRACT

How individuals visualize an event is known as "visual perspective." Actor's perspective (first-person perspective) occurs when people visualize an event as if they see it through their own eyes, whereas observer's perspective occurs when individuals visualize an event from an outsider's perspective (third-person perspective). Past research has focused on the effects of visual perspective on memories, emotions, and behaviors (Jiang, Adaval, and Steinhart, 2014; Jiang and Wyer, 2008; Libby, Shaeffer, and Eibach, 2009; Libby and Eibach, 2011; Shaeffer, Eibach, and Slemmer, 2007; Vasquez and Buehler, 2007). For instance, the actor's perspective triggers more intense and readily direct and accessible feelings of the events, whereas the observer's perspective generates less emotional cues, and people tend to scrutinize themselves in the scenario, as if they were watching a movie of themselves (Zhang and Yang, 2015).We examine how visual perspective affects consumers' attitude toward the experience and their sharing intention (Study 1), through the level of present focus the consumers have on experiences.

Temporal focus is the extent to which individuals characteristically direct their attention to the past, present, and/or future (Shipp, Edwards, and Lambert, 2009; Zimbardo and Boyd, 1999). Individuals focus on the past, present or the future to varying degrees. Such psychological differences in orienting their thoughts at different time frames, is capable of eliciting affective reactions and attitude at different degrees.

When engaging in an experience, consumers are oriented to focus on the current experience. Being immersive in the experience enhances consumers' orientation to focus on the present experience. Building on this notion, we propose that visual perspective of photos will affect the level of present focus, since the actor's perspective encourages consumers to focus on the present. This increases their attitude toward an experience and sharing intention. On the other hand, the observer's perspective orients consumers to focus less on the current experience, leading to less favorable outcomes.

Consumers could engage experiences in a solo setting, which are experiences that only involve the participation of the consumer themselves, or in a group setting, which are events that involve the interdependent participation of two or more consumers who concurrently participate and are able to interact with each other (Aronson, Wilson, and Akert, 2015). Solo experiences are shown to induce consumers to avoid public judgments and evaluations. Concentrating on the experience itself intensifies the effect of the experience, whereas group experiences could be impacted by the nonverbal reactions of companions (Ramanathan and McGill 2007), which serves as distractions for consumers from focusing on the present event itself. Based on these findings, we demonstrate that a solo experience will amplify consumers' attitude toward an experience and sharing intention when the photo is taken from the actor's perspective, whereas a group experience will attenuate this effect, serving as a boundary condition.

In Study 1, we show that consumers generate more positive attitude toward an experience when the photo is taken from the actor's (vs. observer's) perspective across three studies with different manipulations. In Study 1a, 239 participants on Mturk to participate in an imagination task. Visual perspectives of the photos were manipulated by the images presented to the participants. The photos used in this study were pretested in a pilot study. Consistent with our predictions, participants who were assigned to the actor's perspective reported that they enjoyed making the flower more (Mactor = 8.32, SD = .10) than those assigned to observer's perspective condition (Mobserver = 8.06, SD = .10) (p = .06). In Study 1b, 169 students were recruited to the lab where they made a paper flower. We held the photo taker constant by having the lab proctor take the picture for participants in both the actor's and the observer's perspective conditions to alleviate the concern of visual perspective being confounded with the photo takers in different conditions. Consistent with our predictions, participants who were assigned to the actor's perspective reported that they generated more favorable attitude toward the flower-making activity (Mactor = 5.00, SD = .23) than those assigned to the no-photo (control) condition (Mcontrol = 4.40, SD = .22) (p = .04). The difference in attitude between the actor's and the observer's perspectives is marginal, but those assigned to the actor's perspective condition generate marginally more favorable attitude than those

in the observer's perspective condition (Mobserver = 4.28, SD = .24) (p = .09). There is no significant difference between the control and the observer's condition (p = .62). We found the same pattern with enjoyment and sharing behavior as well. In Study 1c, we recruited 310 students to the lab to participate in a card-making activity. In this study, we held the photo-taker constant by having students take the photos in both the actor's and the observer's conditions. Participants who were assigned to the actor's perspective reported that they generated more favorable attitude toward the card-making activity (Mactor = 4.95, SD = .16) than those assigned to the observer's perspective condition (Mobserver = 4.49, SD = .15) (p = .04). There is no significant difference between the control and the observer's condition (p = .39), or the actor's condition (p = .21). We found the same patter for enjoyment and sharing behavior as well.

Study 2 shows that whether an experience is in a solo or group setting moderates the effect that visual perspective has on sharing behavior. We randomly assigned 252 participants on Mturk to one of the conditions of a 2 (perspective: actor, observer) x2 (type: solo, group) between-subjects design. We obtained a significant interaction (F(1, 217) = 3.98, p = .05).. Visual perspectives of the photos were manipulated by the images presented to the participants. The photos used in this study were pretested in a pilot study. Planned comparison tests revealed, as predicted, that in the solo experience condition, participants generate more positive attitude toward the experience when the photo was taken from the actor's perspective versus the observer's perspective (Mactor = 8.33, Mobserver = 7.87, p = .06). However, in the group experience condition, the effect of visual perspective is attenuated (Mactor = 7.94, Mobserver = 8.15, p = .37).

Across four experiments, we find converging evidence for the effect of visual perspective on consumers' experiences: the actor's perspective generates more positive outcomes than the observer's perspective condition. We control for who took the photo across studies. Further, we show that this effect is attenuated in a group setting.

Indulging Online: A Moral Dilemma

EXTENDED ABSTRACT

Food pictures are everywhere on social network sites. Yet, despite their predominance online, there has been little research explaining how sharing pictures of food consumed affects consumption enjoyment.

Previous research found that taking pictures of experiences with the intention to share them online (vs. keeping them for oneself) reduces enjoyment of experiences (Barasch et al., 2017). Furthermore, such an effect is accentuated when the picture is shared online with acquaintances rather than with friends. Yet, we propose that when it comes to indulgence foods, people derive lower levels of consumption enjoyment when food pictures are shared with a mostly known (vs. unknown) audience. Indulgence foods refer to caloric options, such as brownies or lasagna (Locher et al., 2005). This type of food is mainly associated with pleasure (Hirschman and Holbrook, 1982) and such pleasure is mainly egocentric (Sober and Wilson, 1999). Yet, sharing egocentric pleasure with known others can backfire.

First, the presence of known (vs. unknown) others mitigates egocentrism as each individual is more salient (Alicke and Govorun, 2005). Consequently, sharing egocentric pleasure with known others might be perceived as bragging (De Angelis et al., 2012). Second, indulgence foods are often considered as off-limits (Locher et al., 2005) and consuming such foods can activate moral dilemmas of "vice" versus "virtue". In situations where the self-image is questioned, individuals are particularly sensitive to feedback from people

they know (Argo et al., 2006; Packard and Wooten, 2013). If such feedback is not positive, it can have a more devasting effect than feedback from someone more distant (Rubin 1974; Small 2017). Consequently, both bragging and inner moral dilemmas should enhance sensitivity to a known (vs. unknown) audience's judgement. Precisely, taking pictures of indulgence foods with the intention to share them online should lower levels of anticipated positive judgements when those pictures are shared with a mostly known (vs. unknown) audience. In turn, lower levels of anticipated positive judgements should reduce consumption enjoyment (Robinson and Higgs, 2012; Stok et al., 2014). Three studies test our predictions.

In the first experiment, participants (N=154) imagined dining alone at a restaurant and ordering the restaurant's famous plate. Depending on the condition, participants saw a picture a homemade apple pie or a fresh fruit salad. Participants were told that before eating, they decided to take a picture of the dish to share it on Instagram. To operationalize audience type, we manipulated the privacy setting of the Instagram account. In the mostly unknown condition, participants imagined that their account was public and that both their Instagram followers and other users could see the post. In the mostly known condition, the account setting was private and access to the picture was limited to Instagram followers. To assess whether participants felt a difference under both conditions, we measured perceived anonymity when sharing with two items adapted from Hite, Voelker, & Robertson (2014) (e.g. "*When thinking about who can see my picture, I am confident that they do not know who I am*" (1: strongly disagree to 7: strongly agree)). As expected, participants felt a greater sense of anonymity in a public setting (M=4.06) than in a private one (M=3.35) (p<.000). We measured anticipated enjoyment from consumption with 2 items adapted from Van Boven and Ashworth (2007) (e.g. "*when you think about eating this dessert, how happy does it make you?*" (1: very unhappy to 7: very happy)) and anticipated positive judgement with three items adapted from Chen (2017) (e.g. "*After sharing the food picture, do you think the people with whom you shared this picture will view you more or less favorably?*"(1: less favorably to 7: more favorably)). The results revealed a significant interaction effect (F(1,150) = 4.14, p<.05). Specifically, anticipated positive judgement was lower when sharing indulgence food picture under a private setting (M = 4.39) than under public setting (M = 4.82, p = .029). No difference existed with the less indulgence option (p = .52). Furthermore, participants expected higher levels of anticipated consumption enjoyment when the picture was shared under a public (vs. private) setting (β: .15, 95% CI: .01 to .31).

In a second study, we replicated the experiment of the first study except that food stimuli were changed. We replaced the apple pie by a homemade "lasagna" and the fruit salad by a "grilled lemon chicken" (pictures pretested for level of indulgence). Results showed significant interaction effect (F(1,143) = 5.73, p = <.05). For the lasagna plate, anticipated positive judgement was lower under a private setting (M = 4.56) than under a public one (M = 5.08, p = <.05). No difference existed with the picture of the grilled chicken (p = .19). Furthermore, consumers expected lower levels of anticipated consumption enjoyment when the picture of indulgence food was shared under a private (vs. public) setting (β: .20, 95% CI: .02 to.42).

In a third study, the experiment was conducted in a lab setting. The cover story stated that a restaurant wanted to see how their new dessert would perform on Instagram. Participants (N=207) had to try the dessert and post a picture of it on their Instagram account. It was mentioned that they had to leave the picture on their account for few hours. Participants randomly tasted a brownie (indulgence food) or a fruit salad. Account privacy setting was measured. We also

controlled for the effect of audience size by measuring the number of followers (1: less than 100 to 6: 700 +). The results revealed a significant main effect of number of followers (p <.01) and a significant interaction effect ($F(1,202) = 3.84$, p = .05). Specifically, anticipated positive judgement was lower when sharing the picture of indulgence food in private setting ($M = 3.27$) than in public ($M = 3.86$, $p = .02$). No difference existed with the fruit salad option ($p = .45$).

Sharing pictures of indulgence foods online lower both levels of anticipated positive judgement and consumption enjoyment when the audience is mostly known (vs. unknown).

REFERENCES

Argo, Jennifer J., Katherine White, and Darren W. Dahl (2006), "Social Comparison Theory and Deception in the Interpersonal Exchange of Consumption Information," *Journal of Consumer Research* 33 (1), 99-108.

Alicke, Mark D., and Olesya Govorun (2005), "The Better-Than-Average Effect," *The Self in Social Judgment* 1, 85-106.

Aronson, Elliot, Timothy D. Wilson, and Robin Akert (2015), *Social psychology*, 8th Edition. Pearson, New York, NY.

Ayduk, Özlem and Ethan Kross (2010), "From a Distance: Implications of Spontaneous Self-Distancing for Adaptive Self-Reflection.," *Journal of Personality and Social Psychology,* 98(5), 809–29.

Barasch, Alixandra, Kristin Diehl, Jackie Silverman, and Gal Zauberman (2017), "Photographic Memory: The Effects of Volitional Photo Taking on Memory for Visual and Auditory Aspects of an Experience," *Psychological Science,* 28(8), 1056–66.

Barasch, Alixandra, Gal Zauberman, and Kristin Diehl (2018), "How the Intention to Share Can Undermine Enjoyment: Photo-Taking Goals and Evaluation of Experiences," *Journal of Consumer Research* 44 (6), 1220-1237.

Berntsen, Dorthe and David C. Rubin (2006), "The Centrality of Event Scale: A Measure of Integrating a Trauma into Ones Identity and Its Relation to Post-Traumatic Stress Disorder Symptoms," *Behaviour Research and Therapy,* 44(2), 219–31.

Campbell, Margaret C., and Karen Page Winterich (2018), "A Framework for the Consumer Psychology of Morality in the Marketplace," *Journal of Consumer Psychology*, 28 (2), 167-79.

Carter, Travis J. and Thomas Gilovich (2012), "I Am What I Do, Not What I Have: The Centrality of Experiential Purchases to the Self-Concept," *Journal of Personality and Social Psychology,* 102(6), 1304–17.

Chen, Yubo, and Jinhong Xie (2008), "Online Consumer Review: Word-of-Mouth As A New Element of Marketing Communication Mix," *Management Science* 54(3), 477-491.

De Angelis, Matteo, Andrea Bonezzi, Alessandro M. Peluso, Derek D. Rucker, and Michele Costabile (2012), "On Braggarts and Gossips: A Self-Enhancement Account of Word-of-Mouth Generation and Transmission," *Journal of Marketing Research*, 49(4), 551–563.

Eckhardt, Giana M., and Fleura Bardhi (2015), "The Sharing Economy isn't about Sharing at all," *Harvard Business Review*, 28(1).

Eckhardt, Giana M., Mark B. Houston, Baojun Jiang, Cait Lamberton, Aric Rindfleisch, and Georgios Zervas (2019), "Marketing in the Sharing Economy," *Journal of Marketing*, 83(5), 5-27.

Frank, Mark G. and Thomas Gilovich (1989), "Effect of Memory Perspective on Retrospective Causal Attributions.," *Journal of Personality and Social Psychology,* 57(3), 399–403.

Fredrickson, Barbara L., Michele M. Tugade, Christian E. Waugh, and Gregory R. Larkin (2003), "What Good Are Positive Emotions in Crisis? A Prospective Study of Resilience and Emotions Following the Terrorist Attacks on the United States on September 11th, 2001.," *Journal of Personality and Social Psychology,* 84(2), 365–76.

Greenwald, Anthony G. (1968), "Cognitive Learning, Cognitive Response to Persuasion and Attitude Change," in *Psychological Foundations 0/ Attitudes*, eds. Anthony Greenwald, Timothy C. Brock, and Timothy C. Ostrom, New York: Academic Press.

Godes, David, and Dina Mayzlin (2004), "Using Online Conversations to Study Word-of-Mouth Communication, *Marketing Science* 23(4), 545-560.

Godes, David, and José C. Silva (2012), "Sequential and Temporal Dynamics of Online Opinion," *Marketing Science* 31(3), 448-473.

Hayran, Ceren, Lalin Anik, and Zeynep Gurhan-Canli (2016), "Exploring the Antecedents and Consumer Behavioral Consequences of feeling of missing out (FOMO)," *ACR North American Advances*.

Hirschman, Elizabeth C., and Morris B. Holbrook (1982), "Hedonic Consumption: Emerging Concepts, Methods and Propositions," *The Journal of Marketing*, 92–101.

Hite, Dwight M., Troy Voelker, and Adrian Robertson (2014), "Measuring Perceived Anonymity: The Development of a Context Independent Instrument," *Journal of Methods and Measurement in the Social Sciences*, 5(1), 22–39.

Hung, Iris W. and Anirban Mukhopadhyay (2012), "Lenses of the Heart: How Actors' and Observers' Perspectives Influence Emotional Experiences," *Journal of Consumer Research,* 38(6), 1103–15.

Jiang, Yuwei, Rashmi Adaval, Yael Steinhart, and Robert S. Wyer (2014), "Imagining Yourself in the Scene: The Interactive Effects of Goal-Driven Self-Imagery and Visual Perspectives on Consumer Behavior," *Journal of Consumer Research,* 41(2,)418–35.

Jiang, Yuwei, and Robert S. Wyer Jr. (2009), "The Role of Visual Perspective in Information Processing," *Journal of Experimental Social Psychology*, 45 (3), 486–95

Kross, E., O. Ayduk, and W. Mischel (2005), "When Asking 'Why' Does Not Hurt Distinguishing Rumination From Reflective Processing of Negative Emotions," *Psychological Science,* 16(9), 709–15.

Koutstaal, Wilma, Daniel L. Schacter, Marcia K. Johnson, Kathryn E. Angell, and Mara S. Gross (1998), "Post-Event Review in Older and Younger Adults: Improving Memory Accessibility of Complex Everyday Events.," *Psychology and Aging,* 13(2), 277–96.

Kozinets, Robert V., Kristine De Valck, Andrea C. Wojnicki, and Sarah JS Wilner (2010), "Networked Narratives: Understanding Word-of-Mouth Marketing in Online Communities," *Journal of Marketing*, 74(2), 71-89.

Lambert, Nathaniel M., A. Marlea Gwinn, Roy F. Baumeister, Amy Strachman, Isaac J.Washburn, Shelly L. Gable, and Frank D. Fincham (2013),"A Boost of Positive Affect: The Perks of Sharing Positive Experiences," *Journal of Social and Personal Relationships*, 30 (1), 24–43.

Libby, Lisa K. and Richard P. Eibach (2002), "Looking Back in Time: Self-Concept Change Affects Visual Perspective in Autobiographical Memory.," *Journal of Personality and Social Psychology,* 82(2), 167–79.

Libby, Lisa K., Richard P. Eibach, and Thomas Gilovich (2005), "Here's Looking at Me: The Effect of Memory Perspective on Assessments of Personal Change.," *Journal of Personality and Social Psychology,* 88(1,)50–62.

Libby, Lisa K., Eric M. Shaeffer, Richard P. Eibach, and Jonathan A. Slemmer (2007), "Picture Yourself at the Polls: Visual Perspective in Mental Imagery Affects Self-Perception and Behavior," *Psychological Science,* 18(3), 199–203.

Libby, Lisa K., Eric M. Shaeffer, and Richard P. Eibach (2009), "Seeing Meaning in Action: A Bidirectional Link between Visual Perspective and Action Identification Level.," *Journal of Experimental Psychology: General,* 138(4), 503–16.

Libby, Lisa K., and Richard P. Eibach (2011), "Visual Perspective in Mental Imagery: A Representational Tool That Functions in Judgment, Emotion, and Self-Insight," *Advances in Experimental Social Psychology*, 44, 185–245.

Locher, J. L., Yoels, W. C., Maurer, D., & van Ells, J. (2005). Comfort Foods: An Exploratory Journey Into The Social and Emotional Significance of Food. Food and Foodways, 13(4), 273–297.

Lux, Mathias, Marian Kogler, and Manfred Del Fabro (2010), "Why Did You Take This Photo: A Study on User Intentions in Digital Photo Productions. ," *Proceedings of the 2010 ACM workshop on Social, adaptive and personalized multimedia interaction and access - SAPMIA 10.*

McCrae, James (2017), "Meme Marketing: How Brands Are Speaking A New Consumer Language", Forbes https://www.forbes.com/sites/forbescommunicationscouncil/2017/05/08/meme-marketing-how-brands-are-speaking-a-new-consumer-language/#153ae3d437f5

Milanova, Veselina, and Peter Maas (2017), "Sharing Intangibles: Uncovering Individual Motives for Engagement in a Sharing Service Setting," *Journal of Business Research*, 75, 159-71.

Neoh, Jun Guan, Maxwell Chipulu, and Alasdair Marshall (2017), "What Encourages People to Carpool? An Evaluation of Factors with Meta-Analysis," *Transportation*, 44(2), 423-47.

Packard, Grant, and David B. Wooten (2013), "Compensatory Knowledge Signaling in Consumer Word-of-Mouth," *Journal of Consumer Psychology*, 23(4), 434–450.

PwC (2015), The sharing economy, Consumer Intelligence Series, https://www.pwc.com/us/en/technology/publications/assets/pwc-consumer-intelligence-series-the-sharing-economy.pdf

Ratner, Rebecca K. and Rebecca W. Hamilton (2015), "Inhibited from Bowling Alone," *Journal of Consumer Research*, 42(2), 266–83.

Reis, Harry T., Shannon M. Smith, Cheryl L. Carmichael, Peter A. Caprariello, Fen-Fang Tsai, Amy Rodrigues, and Michael R. Maniaci (2010),"Are You Happy for Me? how Sharing Positive Events with Others Provides personal and Interpersonal Benefits," *Journal of Personality and Social Psychology*, 99 (2), 311-29.

Rifkin, Jacqueline, Chan Cindy, and Barbara Kahn (2015), "FoMO: How the Fear of Missing out Leads to Missing out," *ACR North American Advances*.

Robinson, Eric, and Suzanne Higgs (2012), "Liking Food Less: The Impact of Social Influence on Food Liking Evaluations in Female Students," *PloS One*, 7(11), e48858.

Robinson, John A. and Karen L. Swanson (1993), "Field and Observer Modes of Remembering," *Memory,* 1(3), 169–84.

Rubin, Zick (1974), "Lovers and Other Strangers: The Development of Intimacy in Encounters and Relationships: Experimental Studies of Self-Disclosure between Strangers at Bus Stops and in Airport Departure Lounges can Provide Clues about the Development of Intimate Relationships," *American Scientist*, 62(2), 182–190.

Seligman, martin EP, and Mihaly Csikszentmihalyi (2014), "Positive Psychology: An introduction," *Flow and the Foundations of Positive Psychology*, 279-298.

Shaeffer, Eric M, Lisa K. Libby, and Richard P. Eibach (2015), "Changing Visual Perspective Changes Processing Style: A Distinct Pathway By Which Imagery Guides Cognition," *Journal of Experimental Psychology: General*, 144(3), 534.

Shipp, Abbie J., Jeffrey R.Edwards, and Lisa Schurer Lambert (2009), "Conceptualization and Measurement of Temporal Focus: The Subjective Experience of the Past, Present, and Future," *Organizational Behavior and Human Decision Processes*.

Shipp, Abbie J. and Brad Aeon (2019), "Temporal Focus: Thinking about the Past, Present, and Future," *Current Opinion in Psychology*.

Sutin, Angelina R., and Richard W. Robins (2008), "When the 'I' Looks At the 'Me': Autobiographical Memory, Visual Perspective, and the Self," *Consciousness and Cognition*, 17(4), 1386-1397.

Sober, Elliot, and David Sloan Wilson (1999), "Unto Oothers: The Evolution and Psychology of Unselfish Behavior," Harvard University Press, 218.

Small, Mario Luis (2017), *Someone to Talk to, Oxford University Press.*

Stok, F. Marijn, Kirsten T. Verkooijen, Denise TD de Ridder, John BF de Wit, and Emely de Vet (2014), "How Norms Work: Self-Identification, Attitude, and Self-Efficacy Mediate the Relation between Descriptive Social Norms and Vegetable Intake," *Applied Psychology: Health and Well-Being*, 6(2), 230–250.

Warren, Caleb, Adam Barsky, and A. Peter Mcgraw (2018), "Humor, Comedy, and Consumer Behavior," *Journal of Consumer Research*, 45(3), 529-552.

Williams, J. Mark and Keith Broadbent (1986),"Autobiographical Memory in Suicide Attempters," *Journal of Abnormal Psychology*, 95(2), 144–49.

Williams, Alishia D. and Michelle L. Moulds (2007), "Cognitive Avoidance of Intrusive Memories: Recall Vantage Perspective and Associations with Depression," *Behaviour Research and Therapy,* 45(6), 1141–53.

Wyer, Rober S., Jr., I Hung, and Y Jiang (2008), "Visual and Verbal Processing Strategies in Comprehension and Judgment," *Journal of Consumer Psychology,* 18(4), 244–57.

Van Boven, Leaf, and Laurence Ashworth (2007), "Looking Forward, Looking Back: Anticipation is More Evocative than Retrospection," *Journal of Experimental Psychology: General*, 136(2), 289.

Zhang, Jing and Xiaojing Yang (2015), "Stylistic Properties and Regulatory Fit: Examining the Role of Self-Regulatory Focus in the Effectiveness of an Actors vs. Observers Visual Perspective," *Journal of Consumer Psychology,* 25(3), 449–58.

The Pursuit of Fair Market Outcomes in an Unequal World

Chairs: Camilla Zallot, Erasmus University, The Netherlands
Gabriele Paolacci, Erasmus University, The Netherlands
Amit Bhattacharjee, INSEAD, France

Paper #1: Inequality and Inefficiency
Serena Hagerty, Harvard Business School, USA
Michael Norton, Harvard Business School, USA

Paper #2: Value Pricing and Distributive Concerns
Camilla Zallot, Erasmus University, The Netherlands
Gabriele Paolacci, Erasmus University, The Netherlands
Amit Bhattacharjee, INSEAD, France

Paper #3: Simple Beliefs about Fairness
Ellen R. K. Evers, University of California, Berkeley-Haas, USA
Michael O'Donnell, University of California, Berkeley-Haas, USA
Yoel Inbar, University of Toronto, Scarborough, Canada

Paper #4: When Do Wage Disparities Indicate Discrimination? Fairness Perceptions Depend on Group Membership
Nofar Duani, New York University, USA
Alixandra Barasch, New York University, USA
Amit Bhattacharjee, INSEAD, France

SESSION OVERVIEW

Inequality is an increasing concern for the public and policymakers alike, as much of the world's wealth continues to reside in the hands of a fraction of the population. Beyond those facing resource scarcity, consumers at every level of affluence are constantly confronted with the uncomfortable reality of inequality in the marketplace, and must find ways to justify or cope with it. Doing so often entails navigating conflicts between different standards of fairness. Normatively, one of the primary functions of markets is to facilitate the fair allocation of limited resources. In practice, however, consumers' beliefs about what constitutes "fair" outcomes may not align with the outcomes that markets are designed to achieve.

The present session explores the challenges of promoting equitable market outcomes and maintaining fair institutional processes in the face of existing inequalities. The four papers, all in an advanced stage of completion, highlight the inherent arbitrariness and subjectivity that make market fairness so difficult to achieve despite its widespread appeal.

The first two papers describe how baseline differences in wealth affect the use of consumer willingness to pay as a signal of preference strength. Hagerty and Norton investigate how unequal endowments of wealth affect allocative fairness in real-world auctions. They find that because the WTP of wealthier consumers exceeds their true valuations, they are often allocated scarce goods over poorer consumers who actually value them more. Zallot, Paolacci, and Bhattacharjee find that the perceived fairness of pricing goods based on customer WTP depends on customer wealth. People find it acceptable for sellers to maximize profit at the expense of affluent customers but unacceptable to charge poorer customers according to their own stated WTP, suggesting that market exchanges are regarded as opportunities to redress existing inequalities.

The second pair of papers demonstrates that perceptions of fair market design and fair market outcomes are systematically affected by normatively irrelevant factors. Evers, O'Donnell, and Inbar show that the same market allocations are perceived as differentially fair depending on the units used to describe those allocations. Because people fail to consider the underlying values represented by different sets of units, their preferences for equality can perversely produce unequal distributions of rewards and punishments. Duani, Barasch, and Bhattacharjee find that the perceived fairness of unequal market outcomes depends on who is judging them, even when those outcomes arise from transparently unbiased processes. Men perceive gender wage gaps as equally fair regardless of their direction, while women's judgments of institutional fairness depend heavily on who is disadvantaged.

Together, these papers offer a broad set of insights on how inequality concerns both shape and constrain the pursuit of fair market outcomes. As this session illustrates, pursuing fairness in an unequal world requires addressing difficult societal questions: what constitutes "fair" market outcomes? Who decides? How can we design markets to achieve such outcomes? We hope this session will attract a broad audience of researchers studying inequality and fairness, economic psychology, and consumer morality, and trigger more contributions on these fundamental questions.

Inequality and Inefficiency

EXTENDED ABSTRACT

Imagine two people compete in an auction for tickets to a concert. One bids $100 and the other bids $50. Who do you think wants to go to the concert more? Who values the tickets more? Now imagine that the person bidding $100 is Bill Gates and the person bidding $50 is a school teacher. Does the $100 bid still signal a stronger preference for the ticket?

Willingness to pay is a commonly used measure in economics and public policy to determine an individual's valuation of a good (Sunstein, 2007). Research on willingness to pay assumes that any variation in WTP is a result of varying preferences and not attributable to variation in ability to pay. When wealth is not equally distributed, do markets continue to allocate goods efficiently to those who value them most highly?

Consideration of wealth distribution is critical because wealth inequality has been steadily rising over the past thirty years (Alvaredo et al., 2013). Initial evidence suggests that transparency of inequality (in addition to inequality itself) can reduce cooperation and inhibit market outcomes (Hauser et al., 2016; Nishi et al., 205). The current research extends these findings by examining the effects of inequality (and transparency) on the distribution of goods in a competitive market.

Study 1 demonstrates the market-level effects of inequality and transparency. Participants (N= 1001) were randomly assigned to one of five wealth conditions [22/49/72/105/304 points], which represent the true income distribution of the United States. They were then told they could use the points to bid against four other participants to win YouTube videos. If they did not win any videos they would have to complete five more minutes of counting tasks. Any points they did not bid were converted into a monetary bonus. Half of the participants received information depicting how their score compared to the other participants in their auction group, while the other half were given no such information (Transparency vs No Transparency).

We find that wealthier participants win more videos ($F(4, 909)= 8.80$, $p=0.00$), despite spending a smaller proportion of their budget

(F(4,815)=3.93, p=0.004). As earnings increase, liking becomes a weaker predictor of winning a video. The correlation between bidding and liking is significantly lower for participants in the highest earning quintile than for those in the lowest earning quintile (22 points) (r=.292 vs. r=.432; z=2.96, p=0.02). Even when controlling for liking of a video, participants earning more points were more likely to win any given video (B=0.206, SE=.029, p<0.001). As a result, participants in the highest earning quintile won their least favorite video at the same rate that participants in the lowest earning quintile won their favorite video (15.1 % vs. 15.3 %; X2 (2, N=361) =0.00, p=0.98).

There was no main effect of transparency on number of wins, but there was a significant interaction: participants in the highest quintile won more videos when inequality was transparent while all other participants won fewer videos (F(4,901) = 2.527, p=0.039). In the transparency condition, the highest quintile took advantage of their relative wealthy by entering the market at higher rates and by bidding significantly more on their non-favorite videos, while all other quintiles bid less on non-favorites (F(1,801)=3.0, p=0.02).

In study 2 we were interested in the effect of inequality transparency on subsequent consumption rates. We replicated the procedure from Study 1, with one critical change- participants (N=563) were told they could watch the videos for as long as they would like. We find that -- even controlling for total number of videos won, total number of video-minutes won, rank of video, and percentage of earnings spent-- participants in the highest quintile watched a smaller proportion of their winnings when they were aware of their advantage ($M_{transparent}$= 0.11 vs. $M_{notransp}$=0.13) while participants in the lowest quintile watched a larger proportion in the transparent condition ($M_{transparent}$= 0.19 vs. $M_{notransp}$=0.15; F(1, 218)=10.88, p=0.01). This interaction is also significant when including all five conditions. Overall consumption of videos decreases by 7.5% when transparency is introduced in the market.

In Study 3 we introduce a new paradigm-- an induced valuation second-priced auction for gift cards-- modified from Garratt, Walker and Wooders (2012). Rather than having participants rate the items up for auction as a measure of liking, participants were told explicitly how much they valued each gift card. These valuations were randomized across participants. In a second-price auction, bidding one's value is always a dominant strategy. Therefore, by providing participants with explicit values, we are able to identify any bid greater than the gift card value as an overbid.

Again, participants (N=470) were randomly assigned to an endowment [$.10, $.23, $.33, $.48, $1.38], reflecting the true income distribution of the United States and ensuring that all participants could afford to overbid on even the most expensive gift card. Participants then competed in a second-price auction for five different gift cards. The value of each gift card was randomized between $0.05, $0.06, $0.07, $0.08, and $0.09.

We find wealthier participants overbid more participants across all five gift cards (p < 0.001)- there is a main effect of wealth on total amount of overbids (F (4,469) =16.44, p < 0.001) and number of overbids (F (4,469) =17.66, p < 0.001). Consequently, we find that the market favors the wealthy, rather than the players who value the cards the most. The wealthier players win more cards overall (F (4,469) =29.43, p < 0.001). A player's endowment condition is a better predictor of winning a card (b= 0.725, SE= 0.05, p <0.001) than their private valuation of the card (b= 0.291, SE= 0.04, p <0.001). Ultimately, 42.8% of the gift cards went to a player in the highest wealth condition, while only 28.1% of gift cards went to a player who valued it the highest in the auction group.

Overall we find that when there is inequality in a competitive auction, goods go to those with more money, not to those who value the good the most or will consume it fully. Transparency of inequality exacerbates these effects.

Value Pricing and Distributive Concerns

EXTENDED ABSTRACT

Value pricing refers to setting product prices based on customers' willingness-to-pay (WTP). This practice can not only increase firm profit, but also enhance consumer welfare: because opportunity costs differ across consumers due to heterogeneous preferences and price sensitivities, value pricing can make products available to a larger number of customers (Della Vigna & Gentzkow 2019).

Prior work on price fairness has examined situational influences on pricing (cf. Kahneman, Knetsch, & Thaler 1986), but no existing research has investigated whether relying on customers' own assessments of value (i.e., their WTP) is perceived as more acceptable for some customers than for others. We present five studies demonstrating that value pricing is seen as less fair when selling to poorer customers, despite the fact that their WTP already reflects their tighter budget constraints.

This finding persists across varying levels of profit margin (Study 1c), and cannot be explained by perceived differences in preference strength (Studies 1b-2). Moreover, it holds even when people are explicitly aware that low-income customers have a lower WTP than high-income customers, thus already reflecting their tighter budget constraints (Study 2). However, this effect is attenuated when the seller is also low-income (Study 3), suggesting that it arises because market exchanges are regarded as opportunities to redress existing inequalities.

Study 1a (N=450) employed a 3-group between-subjects design. Participants imagined being a business owner selling a product that cost $25 to produce to customers who would buy it at any price up to $75. Customers were described as living in either a disadvantaged low-income, average income, or privileged high-income neighborhood. Participants indicated what price they thought would be fair to charge, which we report as a proportion of WTP (%WTP) across studies. Participants believed that low-income customers should be charged a lower %WTP (76.6%), and high-income customers a higher %WTP (91.1%), compared to average-income customers (85.7%, ps<.001).

Using a similar 2-group design, Study 1b (N=302) found that this observed difference in fair prices was not due to lower-income consumers being perceived as less able or willing to pay their stated WTP. We gauged participants' comprehension of WTP by asking them to indicate the price at which all customers would buy the product. 76% of participants (evenly distributed across conditions, $X^2<1$) correctly indicated the maximum price. Regardless, these participants still selected a lower %WTP as a fair price for disadvantaged customers (73.2% vs. 87.6%, X^2=26.97, p<.001). Including participants who failed to interpret the maximum price correctly did not affect these results (73.6% vs. 90.7%, X^2=41.48, p<.001).

Study 1c (N=606) then tested whether this finding holds when WTP reflects a large versus small profit margin above production costs ($12 in this study) with a 3 (WTP: $20, $38, $52) X 2 (Customer Wealth) between-subjects design. Across conditions, we again found a main effect of Customer Wealth, whereby fair prices were lower for low-income customers (%WTP=73.6% vs. 84.4%, t=4.40, p<.001). Even at the lowest profit margin (WTP=$20), value pricing was judged as more immoral when customers were low versus high in income (M=3.16 vs. 2.30, t=3.19, p<.001), supporting our pro-

posed mechanism. Accordingly, a significantly smaller proportion of participants chose to set prices at customer WTP (24% vs. 48%, X^2=10.85, p<.001). Moreover, controlling for how much customers were thought to want the product did not affect our results, again suggesting that these effects of customer wealth cannot be explained solely by a desire to reward those perceived to have stronger preferences.

Study 2 (N=700) sought to replicate these findings in a within-subjects design where participants were fully aware of WTP differences across groups. We also varied whether poorer customers had a WTP that was lower than, higher than, or equal to that of richer customers, using a 3 (WTP Difference) X 2 (Customer Wealth) mixed design. Participants imagined that a business owner was selling the same product in two different cities where customers had different levels of income and interest in the product (as expressed through their WTP), on average. Across conditions, participants set a lower price for customers in the poor city versus the rich city (%WTP=70.1% vs. 96.1%, F=55.61, p<.001). Most importantly, even when low-income customers already reported a lower WTP than high-income customers, in line with their tighter budget constraints ($30 vs. $40), we still found a significant difference between fair prices (%WTP=74.7% vs. 88.1%, F=5.49, p=0.02). As in Study 1b, there were no such differences in perceived preference strength, indicating that these inferences cannot explain our results.

Finally, Study 3 (N= 404) manipulated the relative wealth of buyers and sellers in a 2 (Buyer Wealth) X 2 (Seller Wealth) between-subjects design. Replicating our previous results, there was a main effect of buyer wealth (%WTP=71.2% vs. 86.8%, F=44.3, p<.001). But importantly, this effect was qualified by a significant interaction with seller wealth (F=11.42, p<.001). Participants selected significantly lower fair prices for poor buyers when the seller was wealthy (%WTP=64% vs. 87.5%, p<.001), but this effect was attenuated when the seller was also poor (%WTP=77.8% vs. 85.9%, p=.069). This result suggests that people regard market exchanges as opportunities to redress existing inequalities: when the seller is not wealthy enough to enable such redistribution, value pricing to poor customers becomes more acceptable.

Together, these studies show that people believe that sellers are morally obligated to forgo profits and charge poor customers a systematically smaller proportion of what a product is worth to them. Above and beyond poorer customers' diminished ability to signal strong preferences through WTP (cf. Shaddy & Shah 2018), knowingly charging them what they are willing to pay is seen as inherently less fair and less morally acceptable. Our findings suggest that even mundane market transactions may be evaluated as opportunities to correct existing inequalities. "Fair" prices based on customers' own valuations may not be seen as fair enough, limiting the acceptability of value pricing strategies.

Simple Beliefs About Fairness

EXTENDED ABSTRACT

Almost all people value fairness, any many people believe that equal treatment exemplifies it. According to this rule, people should receive the same reward for the same work, and pay the same price for the same infraction. However, the domain in which these are calculated may lead to inconsistent intuitions. For example, people may feel that it is fair to fine a low earner and a higher earner the same amount for a speeding ticket, even though the same fine represents a different proportion of income for each. At the same time, they may feel it is fair to require both the low and high earner to do the same amount of community service, even though the high earner's time is more valuable.

In four sets of studies (within each set we vary the domain and whether the outcomes are gains or losses; all N≥200, all relevant p-values <.01) we find evidence for the following three points:

1. When judging the fairness of assigned compensation or punishment, participants base their judgment primarily on the dimension the outcome is expressed in. For example, participants read about Alan and Bob, who do the same work for the same company. Because Alan has been with the company longer, he makes 40€ per hour while Bob makes 25€ per hour. Both Alan and Bob worked on a Sunday for a high priority project and are given a bonus by their boss. In one condition participants read that Alan gets a 400€ bonus while Bob gets a 300€ bonus. Participants judge this outcome to be very unfair to Bob (M=68.10 on a 100 point scale with 50 being perfectly fair, p<.001). In the other condition, participants read that Alan gets 10 hours off while Bob gets 12 hours off (equivalent to 400€ and 300€in wages respectively). In this condition, participants judge the bonus to be unfair to Alan (M=44.02, p=.01).

2. Participants act as if their reliance on the outcome-dimension is at least partially a mistake. In Study 2 we use a similar design to Study 1, but before judging the fairness we "translate" the outcome into a different unit. For example, in one study participants read about Alan and Bob who are both freelancers in high demand and make $50 and $25 per hour respectively. Both got caught running the exact same red light and Alan was assigned a $150 [3 hours community service] fine while Bob was assigned a $100 [4 hours community service] fine. We added 2 more conditions in which we "translate" the fine across dimensions. For example; "A $100 fine means that Bob will have to work 4 more hours to pay the fine". Participants then again indicated how fair they perceived this fine to be. In these conditions, the difference in perceived fairness attenuated but did not fully disappear.

3. People succumb to the same biases when assigning outcomes. In Study 3 and 4 we have participants assign fines and bonuses across different dimensions and find that these judgments follow the same pattern. Interestingly, even when assigning fines in a fully within-participants design, many participants (~30%) still assign identical hours and identical dollar amounts even when the implications across dimensions are calculated right in front of them. In Study 4, we even observe this behavior in a fully incentive-compatible design where failure to realize this bias directly and negatively affects the outcome of the participant.

To summarize, we find that people strongly rely on the belief that outcomes should be equitable as the basis for what is fair. However, when outcomes can be expressed in different dimensions, people do not automatically realize this equivalence and fail to take this into account. Even when attention is drawn to the effect of dimension on perceived equity, participants do not fully correct their judgments.

When Do Wage Disparities Indicate Discrimination? Fairness Perceptions Depend on Group Membership

EXTENDED ABSTRACT

The gender pay gap has been the focus of substantial public debate and policy intervention. In 2013, American women earned 82 cents for every dollar earned by men (Bureau of Labor Statistics, 2016), and a recent analysis revealed similar disparities of varying

size in all 36 OECD countries (OECD, 2020). However, the extent to which these aggregate differences indicate systemic unfairness and discrimination remains in dispute.

A variety of research has thus tried to identify the underlying causes of the gender pay gap and to quantify their relative impact. For instance, a recent analysis of the US labor market found that 62% of the gender pay gap can be explained by observable differences between male and female workers (e.g., work experience, industry, occupation, education; Blau & Kahn, 2017). Another stream of research suggests that this aggregate disparity might also reflect different choices and career preferences between men and women in the workforce (Cook et al., 2018; Daymont & Andrisani, 1984; Solberg, 1999).

However, there are conflicting perspectives on the extent to which these underlying causes are actually inconsistent with or themselves reflective of historical gender biases. Moreover, it is unclear how these potential explanations affect lay judgments of institutional unfairness, which are critical to understanding public reaction to policies promoting gender equality.

Accordingly, the current research explores how consumers perceive unequal market outcomes that arise from explicitly impartial and transparent processes. Specifically, we investigate how fairness perceptions of the same outcomes might vary across groups. We predict that while members of historically-advantaged groups (e.g., men) will regard any outcomes resulting from unbiased processes as fair, members of historically-disadvantaged groups (e.g., women) will judge the same outcomes as less fair, but only when their group is worse off. Members of disadvantaged groups may thus be more likely to interpret systematic group differences in choices, preferences, or abilities as inherently reflective of historic inequalities. Three studies test and support this predicted interaction.

Study 1 (N=127) was inspired by the results of a recent econometric analysis of Uber drivers' compensation (Cook et al., 2018). While the Uber algorithm assigns rides and sets fares through explicitly gender-blind algorithms, results indicate that male drivers still make 7% more per hour on the platform. This gender pay gap is fully explained by three factors: experience, route preferences, and driving speed. In this study, participants learned about this observed wage disparity and these explanatory factors (with order counterbalanced). For each factor, participants evaluated the fairness of Uber's policies on four items (e.g., men have an unfair advantage on Uber, men and women have equal opportunities as Uber drivers; αs>0.8).

A 2X3 mixed ANOVA revealed no differences in fairness ratings across these three factors (F=1.80, p=.167), and no interactions with gender (F=1.06, p=.349). More importantly, we found the predicted main effect of gender: female participants rated all three contributors to the Uber pay gap as significantly less fair than males (M=3.97 vs. 4.74; F(1,125)=11.15, p=.001). Moreover, men were more likely to mention the impartiality of the algorithm in their open-ended responses (e.g., it's the same formula; algorithms are not biased), while women were more likely to provide broader interpretations of each causal explanation (e.g., women might work fewer night hours because they would be less safe).

Because Study 1 was based on real-world observations, we did not manipulate the direction of the pay disparity (i.e., women always made less than men). Hence, these effects might reflect particular features of this context or outcomes alone. Studies 2 and 3 were designed to address these limitations.

In Study 2 (N=174), subject pool participants were asked to evaluate the fairness of four hypothetical lab experiments (order counterbalanced) in which players completed various tasks for payment, where the average earnings ended up being unequal for men versus women. For each task, the difference in earnings was fully explained by a single reason unrelated to gender: i) spending more time on the task, ii) performing better, iii) acting more competitively, or iv) acting more cooperatively. Advantage was manipulated between subjects: half the participants learned that men earned more than women on average, while the other half learned that women earned more than men. Participants then responded to the same fairness DVs from Study 1 (αs>0.78).

A mixed ANOVA revealed a main effect of who was advantaged: overall, participants considered outcome to be fairer when women were paid more than men (F(1,170)=21.90, p<.001). Importantly, this was qualified by a significant interaction (F(1,170)=13.69, p<.001). Across all four tasks, male participants judged the compensation structure as equally fair regardless of which gender earned more (Fs<2.18, ps>.20). In contrast, female participants responded strongly to the direction of the gender gap, finding compensation schemes less fair when men versus women were advantaged (Fs>14.20, ps<.001). More specifically, female participants rated the compensation scheme as fairer than male participants when the pay gap favored women (M=5.84 vs. 5.36; F=4.86, p=.03), but as less fair than male participants when men were advantaged (M=4.55 vs. 5.21; F=9.14, p=.003). Accordingly, women advocated flat-fee compensation policies more strongly when men had earned more (M=4.03 vs. 5.23; F(1,170)=7.39, p=.007), while men's support for this policy was unaffected by which gender had been advantaged (M=4.06 vs. 3.91; F<1).

Study 3 (N=292) replicated these results on mTurk using a between-subjects design where each participant evaluated the results of one of these hypothetical tasks. Men again rated each of the tasks as equally fair regardless of which gender had the advantage (Fs<.07, ps>.792), while women rated each outcome as less fair when men earned more than when women did (Fs>4.68, ps<.031).

In summary, we find that men and women evaluate gender differences in market outcomes very differently, even when they arise from unbiased processes. Hence, advantaged and disadvantaged consumers may subjectively evaluate the same cues as differentially diagnostic of institutional unfairness. Our findings highlight one reason policy discussions concerning inequality can be so contentious: perceptions of what constitutes fair treatment versus evidence for discrimination may be in the eye of the beholder.

REFERENCES

Alvaredo, F., Atkinson, A. B., Piketty, T., & Saez, E. (2013). The top 1 percent in international and historical perspective. Journal of Economic perspectives, 27(3), 3-20.

Blau, F. D., & Kahn, L. M. (2017). The gender wage gap: Extent, trends, and explanations. Journal of Economic Literature, 55(3), 789–865.

Bureau of Labor Statistics. (2016). Women in the Labor Force: A Databook. In US Bureau of Labor Statistics Reports. https://doi.org/10.2307/144700

Cook, C., Diamond, R., Hall, J., List, J. A., & Oyer, P. (2018). The gender earnings gap in the gig economy: Evidence from over a million rideshare drivers (No. w24732). National Bureau of Economic Research.

Daymont, T. N., & Andrisani, P. J. (1984). Job preferences, college major, and the gender gap in earnings. Journal of Human Resources, 408-428.

DellaVigna, S., & Gentzkow, M. (2019). Uniform pricing in us retail chains. The Quarterly Journal of Economics, 134(4), 2011-2084.

Garratt, R. J., Walker, M., & Wooders, J. (2012). Behavior in second-price auctions by highly experienced eBay buyers and sellers. Experimental Economics, 15(1), 44-57.

Kahneman, D., Knetsch, J. L., & Thaler, R. (1986). Fairness as a constraint on profit seeking: Entitlements in the market. The American economic review, 728-741.

Nishi, A., Shirado, H., Rand, D. G., & Christakis, N. A. (2015). Inequality and visibility of wealth in experimental social networks. Nature, 526(7573), 426.

Norton, Michael I., and Dan Ariely. 2011. Building a better America—One wealth quintile at a time. Perspectives on psychological science 6(1): 9-12.

OECD. (2020). Gender wage gap (indicator). Retrieved February 26, 2020, from https://data.oecd.org/earnwage/gender-wage-gap.htm

Shaddy, F., & Shah, A. K. (2018). Deciding who gets what, fairly. Journal of Consumer Research, 45(4), 833-848.

Solberg, E. J. (1999). Using Occupational Preference in Estimating Market Wage Discrimination: the Case of the Gender Pay Gap: Decomposition of a Reduced-form Wage Equation. American Journal of Economics and Sociology, 58(1), 85-113.

Sunstein, C. R. (2007). Willingness to pay vs. welfare. Harv. L. & Pol'y Rev., 1, 303.

How You Feelin'? The Role of Internal And External Cues on Consumer Sensory Experiences

Chair: Jerry J. Han, University of Technology Sydney, Australia

Paper #1: Sounding Warm: The Role of Audio Pitch on Service Perception

Jerry J. Han, University of Technology Sydney, Australia
Michael Lowe, Georgia Institute of Technology, USA

Paper #2: Vocal Similarity, Trust and Persuasion in Human-AI Agent Interactions

Michael Lowe, Georgia Institute of Technology, USA
Na Kyong Hyun, Georgia Institute of Technology, USA

Paper #3: Sound of Products' Soundness: The Effect of Product Operation Sound on Judgment of Product Quality

B. Kyu Kim, Yonsei University, South Korea
Byung Geun Cho, Yonsei University, South Korea
He (Michael) Jia, The University of Hong Kong, China

Paper #4: The Effect of Unpacking on Consumers' Sensory Experience: A Goal-gradient Account

Claire Tsai, University of Toronto, Canada
Min Zhao, Boston College, USA

SESSION OVERVIEW

Sensory experiences play a profound role in consumer decision making (Krishna 2011). For instance, consumers form ex-ante opinions about products and brands while listening to ads on the radio or podcasts. Consumers also make ex-post evaluations of a consumption episode, based on their sensory experience. Despite this importance, the literature (for a review, see Krishna 2012) surprisingly lacks insight into how internal cues of sensory inputs, such as a message's audio pitch, can affect consumer decision making. Moreover, little research has looked into how marketers may enhance consumers' sensory experiences based on the same objective consumption episode. To contribute to the literature on sensory marketing and provide practical guidelines for marketers, the current session poses two research questions: A) How do internal cues of sensory experiences, such as audio pitch, affect consumer evaluations? and B) What external cues can marketers use to enhance consumers' sensory experiences? By studying sensory experiences in regards to both internal and external cues, the session aims to provide a well-rounded perspective to researchers and practitioners.

The first three papers examine how internal cues, such as audio pitch, can influence consumer evaluations, behavior, and judgment. Han and Lowe look into how differences in the audio pitch of advertising messages can influence consumer evaluations of companies. Their paper shows that high (vs. low) pitched audio messages increase perceptions of warmth (vs. competence) for firms and that this in turn enhances people's evaluation and preference for services where warmth is important. The second paper by Lowe and Hyun investigates how vocal similarity between users and AI agents affect trust. Using a novel methodology to quantify vocal similarity, the paper finds that higher vocal similarity leads to greater trust for AI agents. In the third paper, Kim, Cho, and Jia look at how the operation sound of products affect consumers' inferences about the product. Specifically, they find that low (vs. high) pitched operation sounds lead to higher quality inferences but does not affect inferences about user-friendliness.

The last paper of the session broadens the view and highlights external cues, such as framing effects, that can enhance consumers'

sensory experiences. Specifically, Tsai and Zhao find that unpacking (vs. packing) a consumption experience leads to greater sensory enjoyment even when the objective consumption episode is the same. Importantly, the authors find that the unpacking frame is more effective only when consumers focus on the remaining subcomponents to be enjoyed (to-go focus), because this increases consumers' motivation to complete the sensory experience.

In short, the session sheds light into how internal cues specific to sensory inputs can influence consumer evaluations and how external cues from the environment can augment consumers' sensory experiences. Importantly, the session will be of interest to both academics and practitioners. For academics, the findings will open new research directions, such as studying other internal cues that can moderate the effect of sensory inputs and other external cues that can affect sensory experiences. For practitioners, the papers provide easy to implement recommendations that can improve customer attitudes and satisfaction.

Sounding Warm: The Role of Audio Pitch on Service Perception

EXTENDED ABSTRACT

In 2016, the global radio advertising market reached a value of $32.5 billion. However, little research has looked into how audio characteristics influence consumer decisions (Krishna 2012; Lowe and Haws 2016). Moreover, the select work in the area has emphasized the advantage of low (vs. high) vocal pitches (Lowe and Haws 2016; Tigue et al. 2012). We add to this literature by looking at how higher vocal pitches may positively impact consumer evaluations, by facilitating perceptions of warmth (vs. competence) for firms.

Perceptions of warmth, which are related to perceptions of social intent (e.g. friendliness, helpfulness, & sincerity), are one of the most fundamental forms of social perception (Judd et al. 2005). We argue that such perceptions of warmth may be influenced by audio pitch in advertisements. The literature provides support for this hypothesis. For example, parents speak in higher vocal pitches when talking to babies (motherese) (Grieser and Kuhl 1988; Shute 1987) and people perceive robots with higher voices as having better social skills and being more pleasant (Niculescu et al. 2013). In contrast, people see low (vs. high) pitch as signaling roughness or anger (Eitan and Timmers 2010).

In short, we predict that high (vs. low) pitched advertisements will lead to increased perceptions of warmth and that this will ultimately lead to more positive evaluations for services where warmth is important. Across five studies we provide evidence for our claims and the underlying process.

Study 1

In study 1, we looked at how vocal pitch influences responses toward a senior-care service ad and a financial service ad. The services were selected based on a pretest, which indicated that consumers prioritize warmth over competence for senior-care services, while they prioritize competence over warmth for financial services. Given this result, we predicted that a high (vs. low) pitched spokesperson would be more effective for a senior-care service, but not for a financial service.

The main study had a 2 (Pitch: high vs. low) X 2 (Service: senior-care vs. financial) between-subjects design. In the study, participants first listened to a purported radio ad of a senior-care service or a financial service. The ad was modulated to be higher or lower in pitch. After listening to the ad, participants answered three dependent measure items (likelihood to consider firm, likelihood to recommend firm to friends, & expected satisfaction). Next, participants completed a scale, where we measured perceived warmth and perceived competence of the firm.

A two-way ANOVA revealed a significant interaction effect of vocal pitch and industry on the dependent measure index ($\alpha = .91$) ($F(1, 126) = 7.93, p < .01$), where high (vs. low) vocal pitch was more effective for the senior-care ad ($F(1, 126) = 4.38, p = .04$), while low (vs. high) vocal pitch was marginally more effective for the financial services ad ($F(1, 126) = 3.32, p = .06$). Moreover, we ran a moderated mediation analysis, which showed that the mediation was only significant for the senior-care condition (95% CI: [.0440, .4184]), and not in the financial service condition (95% CI: [-.2224, .1561]).

Study 2

Study 2 aimed to test the generalizability of our effect. First, we tested whether voice pitch could also affect people's political decision making. Second, we used a female speaker rather than a male speaker. In the study, participants listened to a high or low pitched audio clip, which was purportedly a speech given by a female politician in response to a natural disaster. Next, participants rated how much they thought the politician would be willing to sacrifice herself, how concerned she seemed, and how much they liked the politician. The three items were averaged into a DV index ($\alpha = .84$). Replicating our prior finding, a one-way ANOVA revealed that participants rated the female politician higher on the DV index when they heard the higher (vs. lower) pitched speech ($F(1, 115) = 5.32, p = .02$).

Study 3A & 3B

Studies 3A and 3B tested several boundary conditions. In Study 3A, we tested how individual difference in preference for warmth versus competence in a service provider moderates our effect. Here, participants listened to either a higher or lower pitched an audio clip that was purportedly from a work out session of a personal fitness trainer. Next, participants indicated how likely they would be to hire the fitness trainer. Finally, participants were asked whether they valued warmth or competence from a service provider. Consistent with our theory, a regression analysis revealed a significant interaction effect of audio pitch and preference for warmth ($F(1, 134) = 4.28$, $p = .04$), where participants who preferred warmth showed a greater willingness to hire the trainer when they listened to the high (vs. low) pitched recording ($F(1, 134) = 3.47 = .06$). However, there was no effect of pitch for those who preferred competence (NS).

In study 3B, we looked at how chronic differences in relationship norms moderated the effect. Based on prior research (Li et al. 2018), we predicted that those who have a communal norm will prioritize warmth over competence and therefore prefer a service provider with a higher pitched voice. Conversely, we predicted a null effect for those with an exchange norm. The experimental stimuli for Study 3B was the same as 3A, except that we measured participants chronic relationship norms. Consistent with our expectations, a regression analysis showed that those with a communal norm preferred the higher (vs. low) pitched trainer ($F(1, 229) = 6.12, p = .01$), whereas there was no effect of pitch for those who had an exchange norm.

Study 4

Study 4 tested our effect in a field setting. In the study, a volunteer from the Salvation Army stood next to a donation box, while ringing a bell. Alternating each half hour, the volunteer either rang a higher or lower pitched handbell. The results showed that shoppers were more likely to donate when the pitch of the bell being rung was higher (vs. lower) ($\chi^2 (1) = 4.83, p = .028$).

Vocal Similarity, Trust and Persuasion in Human-AI Agent Interactions

EXTENDED ABSTRACT

AI agents (e.g., Apple Siri, Amazon Alexa, Microsoft Cortana, and social robots including Pepper) have become increasingly prevalent in our daily lives, our homes, and into our workplaces. Voice recognition technology via machine learning has reached the accuracy level of human speech (Arnold, 2018) and algorithms will soon recognize all the various aspects in speech including nuances and vocal characteristics (i.e., tonal inflection, mood; Kirby, 2019). Also, the use of voice recognition will be advanced to include personalization features, similar to face ID or PIN, so that the AI agent can respond accordingly to the identified user through the formants or sound characteristics unique to each person's vocal tract. This research examines acoustic similarity between an individual consumer and the AI agent. We ask this question: how will consumers perceive, respond to, and be persuaded by an AI agent contingent on similarities between that agent's voice and their own voice in both a) pitch, and b) timbre?

Pitch and timbre are the two most prominent features allowing humans or machines to distinguish one voice from another. Pitch refers to the "fundamental frequency" of a sound, while timbre is the unique spectrum of frequencies *within* a sound, including one's voice, (here measured in Mel Frequency Cepstral Coefficients [MFCCs; Logan, 2000]). Pitch of a spokesperson's voice, for instance, can influence message acceptance or automatically convey certain product attributes (Chattopadhyay et al., 2003; Lowe and Haws, 2017). Timbre largely accounts for our ability to distinguish between voices or instruments, and can also affect consumer perception in various ways (Bruner 1990). In this work, we ask how *differences* between pitch and timbre in a consumer's voice and an AI voice might influence consumer response.

A prevalent body of research in social psychology advocates for the similarity-attraction effect (Collisson & Howell, 2014; Montoya, Horton, & Kirchner, 2008), which suggests that we are more likely to prefer and be initially attracted to similar others. Although research suggests that we prefer to interact with advanced machines that are more human in nature (Nass et al., 1995; Tapus & Mataric, 2007), the uncanny valley theory (Mori, 1970) suggests that the degree to which these machines are similar may play a role in that we experience an eerie sensation and discomfort when they become too similar to ourselves.

We explore how objective vocal similarity between an AI agent and a consumer in both pitch and timbre influences user perceptions of warmth, competence, and trust in the agent. In our series of studies, after listening to a single (study 1 and 2) or three different (study 3) AI agents' recommendation of different products (books, SNL videos, and movies), we measure participant's perception of the AI agent and actual choice of recommended products. We later record and analyze each participant's voice to create an objective measure of acoustic similarity to the AI voice. This objective measure of vocal similarity in pitch and timbre (MFCCs) introduces a new methodological approach measuring the Euclidian distance between the

AI agent and each participant's voice. We demonstrate the effect of vocal similarity on persuasion and trust (competence, benevolence, integrity) further showing how listener's self-esteem plays a role in moderating

Study 1 was conducted with 152 undergraduates. Participants listened to a sample of an AI voice (gender matched) and provided their impressions regarding the AI agent. Each participant also had a sample of their voice recorded upon conclusion of the study. Objective similarity between AI and participant voices was calculated using a computer algorithm created for this research. Overall, greater similarity in vocal pitch significantly predicted satisfaction with the agent ($F = 8.19$, $p < .01$), willingness to further interact with the agent ($F = 4.40$, $p < .05$), perceived sincerity of the agent ($F = 4.37$, $p < .05$), and the overall trust in the agent ($F = 7.75$, $p < .01$).

Study 2 (187 undergraduates), used a similar procedure to Study 1, while also including a choice task based on the AI voice's recommendation. In addition, we measure participant's levels of self-esteem. We hypothesized that one's level of self-esteem could influence individuals' responses to the subtle effect of vocal similarity. The more similar the participant's voice was to the AI agent's voice in terms of timbre (MFCCs), the participant was more likely to choose the video recommended by the AI agent (MFCC: $B = -22.40, $SE = 10.96$, $p < .05$). Moreover, the interaction between timbre similarity and self-esteem was significant, such that higher self-esteem individuals were actually less influenced by vocal similarity (self-esteem x MFCC: $B = 3.83$, $SE = 2.00$, $p = .055$).

In Study 3, we introduce three distinct voices of AI agents recommending three different movies. The results again show that similarity in timbre significantly predicts evaluations of warmth (MFCC: $B = -1.82, $SE = .625$, $p < .01$) and overall trust in the agent (MFCC: $B = -1.27, $SE = .49$, $p < .05$). Moreover, pitch similarity significantly predicts liking of the agent ($B = $-.40$, $SE = .07$, $p < .001$) and two trust dimensions: competence ($B = .14$, $SE = .05$, $p < .05$) and benevolence ($B = .12$, $SE = .0$, $p < .001$). We also replicate the moderating role of self-esteem on vocal similarity on trust in the AI agent (MFCC: $B = -5.55, $SE = 2.61$, $p < .05$; self-esteem x MFCC: $B = .82$, $SE = .48$, $p = .087$).

Present research aims to contribute to literatures in psychoacoustics, similarity-attraction effect, and human-computer interaction. We find that, overall, similar timbre and dissimilar pitch was favored. Furthermore, we believe that our research offers useful implications to marketers of new technology devices. Although certain voice-relevant cues (e.g., accent, conversational styles) may be more direct and pronounced to individuals when engaging in an interaction, we explore a very subtle cue that subconsciously influence consumers' mindset. Marketers will be able to better understand the mechanisms and conditions under which we prefer AI agents that are more personalized to sound similar in pitch and timbre to individual consumers.

Sound of Products' Soundness: The Effect of Product Operation Sound on Judgment of Product Quality

EXTENDED ABSTRACT

In everyday lives, people are exposed to various sounds that products produce. Some sounds are electronic or digital sounds that are added to products as an auditory signal (e.g., smartphone ring tones, computer alarm sounds, or microwave beeps). Other sounds are mechanical sounds that are produced when products operate (e.g., hair dryers' whirring sounds, printers' chugging sounds, or car doors' chunking sounds). We refer to the former type of sound as signal sound (i.e., sound added as a signal to users) and the latter type of

sound as operation sound (i.e., sound produced as a consequence of operation). Signal sound has been considered as an important design factor in product design. In contrast, operation sound is often considered merely as "noises" that should be eliminated. In the current research, we propose that even operation sound can be an important design element that positively influences consumers' evaluation of products. Specifically, we argue that when a product produces operation sound in a lower pitch, consumers judge the product to be "sounder," compared to when it produces sound in a higher pitch.

We base our prediction on findings from the biology literature, which has demonstrated that voice pitch serves as a signal for one's physical quality (Collins 2000; Jones et al. 2010; Puts et al. 2012). Both voice pitch and physical quality are influenced by the level of testosterone, and hence one's voice pitch tends to be correlated with his or her physical quality. Consequently, people tend to judge the physical quality of others based on their voices (Feinberg et al. 2008). Those who make lower voices are judged to be healthier, more fertile, and better in physical ability, compared to those who make higher voices. Building on the relationship between voice pitch and physical quality, we investigate whether the pitch of a product's operation sound can serve as a signal for the product's physical quality in consumers' perception. Specifically, we predict that products that make lower-pitch operation sound are judged to have better quality than products that make higher-pitch sound. In other words, products producing a lower-pitch sound is judged to be "sounder" than products producing a higher-pitch sound.

Studies 1A-1C

Studies 1A (N = 68), 1B (N = 67), and 1C (N = 114) aim to generalize the effect of product operation sound on product quality judgement across several product categories, including blenders (Study 1A), pens (Study 1B), and hand dryers (Study 1C). All three studies used a one-way, two-cell between-subjects, in which participants were randomly assigned to either a high-pitch condition or a low-pitch condition. To create high- and low-pitch stimuli, we altered the pitch of a product's operation sound using an audio-editing software while keeping other aspects of the sound wave constant. In the studies, participants first listened to an audio clip recording a product's operation sound and then judged product's physical quality (e.g., durability, sturdiness, and performance). The results of these three studies consistently show that participants perceived the product to have better quality in the low-pitch condition than in the high-pitch condition, and such a difference was not driven by perceptions of a product's other attributes, such as luxuriousness and heaviness. Studies 1A-1C convergently provide initial evidence for our proposed effect of product operation sound on product quality judgement.

Study 2

Study 2 (N = 78) aims to further demonstrate that the effect of product operation sound on product judgement is specific to capability-related judgment (i.e., quality) but not to usability-related judgment (i.e., user-friendliness). For this purpose, Study 2 adopted a 2 (Pitch: high vs. low) x 2 (Judgment Dimension: quality vs. user-friendliness) mixed design with pitch as a between-subjects factor and judgment dimension as a within-subjects factor. Participants first listened to the operation sound of a printer and then rated the printer in terms of its quality and user-friendliness. There was a significant pitch $\times$ judgment dimension interaction ($F(1, 76) = 4.04$, $p < .05$), such that participants judged the same printer to have better quality when it made a low-pitch sound compared to when it made a high-pitch sound ($M_{high} = 4.36$, vs. $M_{low} = 5.20$; $F(1, 76) = 9.27$, $p < .01$)

while their judgment of the printer's user-friendliness did not differ between the high- and the low-pitch conditions (M_{high} = 4.77 vs. M_{low} = 5.01; $F(1, 76)$ = 1.14, p = .29). Study 2 shows that the pitch of a product's operation sound influences the product's perceived quality but not its perceived user-friendliness.

Study 3

The purpose of Study 3 is to demonstrate that low brand reputation serves as a boundary condition for the effect of product operation sound on quality judgment. This study (N = 186) adopted a 2 (Pitch: high vs. low) x 2 (Brand reputation: high vs. low) between-subjects design. Participants were informed that they listened to the operation sound of a camera produced either by Canon (in the high-reputation condition) or Sanyo (in the low-reputation condition) and then evaluated the camera in terms of its quality. There was a pitch × brand reputation interaction ($F(1, 182)$ = 2.91, p = .09) at 10% alpha level. Simple effect analysis revealed that participants judged the same camera to have better physical quality in the low-pitch condition than in the high-pitch condition (M_{high} = 5.21vs. M_{low} = 5.77; $F(1, 182)$ = 4.22, p = .04) only when the brand reputation was high but not when it was low (M_{high} = 4.83 vs. M_{low} = 4.81; $F(1, 181)$ = .01, p = .93).

To our best knowledge, the current work is the first empirical research in the marketing literature to examine the pitch of product operation sounds and its influence on consumers' judgment. Our findings have important implications for sensory marketing and product design.

The Effect of Unpacking on Consumers' Sensory Experience: A Goal-gradient Account

EXTENDED ABSTRACT

Sensory experiences, such as watching a scenery films or eating chocolate, have multiple subcomponents, and consumers can track the progress of enjoying them. These subcomponents can be framed either as multiple distinct sensory consumption units (i.e., unpacking frame) or as parts of one whole sensory consumption (i.e., packing frame). Prior research has shown that people predict an unpacked sensory experience to be more enjoyable than a packed experience because unpacking segregates the sensory experience or "gains" (Kahneman and Tversky 1979; Thaler 1985, Tsai and Zhao 2011). The present research extends this line of work in two important ways. First, we expand the effect of unpacking on *actual* sensory experiences. Second, we identify focus of consumption progress (focusing on progress to-date vs. focusing on progress to-go; e.g., I have two chocolate truffles left vs. I already ate four chocolate truffles) as an important moderator of the effect of unpacking on actual sensory experiences, and we demonstrate goal-gradient (consumption motivation) as the mediator.

We predict that under a to-go focus, the marginal benefit of completing one consumption subcomponent increases as one approaches the end state of the sensory experience, thereby producing a classic increasing goal gradient (Hull 1934, Kivetz, Urminsky, and Zheng 2006). As such, consumers feel more motivated and positive about their consumption progress toward the end of a sensory experience and enjoy it even more. However, under a to-date focus, the marginal benefit of completing one subcomponent decreases as one moves away from the initial state. Therefore, one feels less motivated and less positive when the distance from the initial state increases and experiences a decreasing goal gradient (Bonezzi, Brendl, and De Angelis, 2011; Huang, Zhang, and Broniarczyk 2012).

Five experiments were conducted to test our hypotheses. In all experiments, to manipulate event framing, we presented each subcomponent either using a progress bar or pie chart (packing frame), such that the subcomponents were perceived as parts of one sensory experience, or using integers (unpacking frame), such that the subcomponents were perceived as individual sub-activities. To manipulate focus of consumption progress, we asked participants to track their consumption progress in ascending or descending order which emphasized, respectively, how much had been consumed (to-date – unpacking frame: 1, 2…; packing frame: 1/10, 2/10…) or how much was remaining (to-go – unpacking frame: 10, 9…; packing frame: 10/10, 9/10…).

In Experiment 1 with a 2 (event framing: packing vs. unpacking) x 3 (progress focus: to-go vs. to-date vs. control) between-subjects design, participants watched a short video featuring 10 serene beach images, and reported their overall evaluation based on 10-point scales. We found an expected two-way interaction ($F(2, 439)$ = 5.42, p = .005): With a to-go-focus, unpacking increased evaluation (to-go focus: $M_{unpacking}$ = 6.65 vs. $M_{packing}$ = 5.98, $F(1, 439)$ = 3.76, p = .053), but the effect reversed with a to-date-focus ($M_{unpacking}$ = 5.98 vs. $M_{packing}$ = 6.68; $F(1, 439)$ = 3.75, p = .053). Control conditions where progress was not tracked resembled to-go focus ($M_{unpacking}$ = 6.68 vs. $M_{packing}$ = 5.90, $F(1, 439)$ = 5.23, p = .02).

In experiment 2A with a 2 (event framing: packing vs. unpacking) × 2 (progress focus: to-go vs. to-date) between-subjects design, we asked participants to sample six new curry flavored potato chips. We measured moment-by-moment enjoyment of each chip, retrospective evaluation after eating all six chips, and repeated consumption in a free eating session later. Again, a two-way ANOVA revealed only a significant interaction on overall enjoyment ($F(1, 115)$ = 16.28, p < .001): With a to-go focus, unpacking increased enjoyment ($M_{unpacking}$ = 8.13 vs. $M_{packing}$ = 6.10; $F(1, 115)$ = 12.80, p = .001), but the effect reversed with a to-date focus ($M_{unpacking}$ = 6.38 vs. $M_{packing}$ = 7.70; $F(1, 115)$ = 4.73, p = .03). Similar patterns were observed in real-time enjoyments (three-way interaction: $F(5, 575)$ = 3.39, p = .005) and in the amount of free eating ($F(1, 115)$ = 11.45, p = .001). We replicated experiment 2A in experiment 2B using sweets and a tracking card that resembles ordering sheets commonly used in all-you-can-eat restaurants (two-way interaction: $F(2, 156)$ = 4.27, p = .01).

In experiment 3, we tested the goal-gradient account by measuring consumption motivation and including a theory-driven boundary condition where we inserted a break during consumption (Kahneman and Snell, 1990; Nelson and Meyvis, 2008). Taking a break during consumption under the to-date focus should reset consumption motivation and weaken the negative effect of unpacking. Specifically, we used a 2 (event framing: packing vs. unpacking) × 3 (progress focus: to-go, to-date, to-date/break) between-subjects design and asked participants to view their preferred image six times repeatedly. We measured real-time enjoyment create an enjoyment index (α = .97 for 6 trials), and collected motivation measures: how alert, how motivated, and how much effort they put forth during the experience (α = .73). Again, we found a significant two-way interaction on overall enjoyment ($F(2, 339)$ = 4.04, p < .05) with planned contrasts (to-go focus: $M_{unpacking}$ = 7.78 vs. $M_{packing}$ = 7.11; $F(1, 339)$ = 3.32, p = .06; to-date focus: $M_{unpacking}$ = 7.15 vs. $M_{packing}$ = 7.90, $F(1, 339)$ = 4.16, p < .05). Importantly, when participants took a break under to-date focus, the negative effect of unpacking was attenuated ($M_{unpacking}$ = 7.96 vs. $M_{packing}$ = 7.67; $F(1, 339)$ = .94, p = .33). Finally, we observed a significant two-way interaction on consumption motivation ($F(2, 339)$ = 7.51, p = .001) and confirmed its mediation role (unbiased 95% CI = [-.60 to -.14]; 5,000 bootstrap resamples;

Preacher and Hayes 2008). Experiment 4 successfully replicated experiment 3 using a different packing manipulation – pie chart (two-way interaction: $F(2, 249) = 4.16$, $p < .01$).

Our work advances the area of studies on unpacking (Tversky and Koehler, 1994) and sensory experiences (Hsee et al., 2012) by demonstrating a counterintuitive reversal of unpacking with a to-date focus (Bonezzi, Brendl, and De Angelis, 2011; Koo and Fishbach, 2008). These findings have important theoretical contribution as well as interesting practical implications to better manage sensory experiences.

REFERENCES

Arnold (2018). *A.I. and speech advances bring virtual assistants to work.* Retrieved from https://www.computerworld.com/article/3264433/ai-and-speech-advances-bring-virtual-assistants-to-work.html

Bonezzi A, Brendl, C. M., and De Angelis M. (2011). Stuck in the middle: The psychophysics of goal pursuit. *Psychological Science, 22*(5), 607-612.

Bruner, Gordon C. (1990), "Music, Mood, and Marketing," *Journal of Marketing* 54, (4), 94-104.

Chattopadhyay, Arnitava, Darren W. Dahl, Robin J. B. Ritchie, and Kimary N. Shahin (2003), "Hearing Voices: The Impact of Announcer Speech Characteristics on Consumer Response to Broadcast Advertising," *Journal of Consumer Psychology*, 13(3), 198–204.

Collins, Sarah A. (2000), "Men's Voices and Women's Choices," *Animal Behaviour*, 60 (6), 773–80.

Cuddy, Amy J.C., Peter Glick, and Anna Beninger (2011), "The Dynamics of Warmth and Competence Judgments, and Their Outcomes in Organizations," *Research in Organizational Behavior*, 31, 73–98.

Eitan, Zohar and Renee Timmers (2010), "Beethoven's Last Piano Sonata and Those Who Follow Crocodiles: Cross-Domain Mappings of Auditory Pitch in a Musical Context," *Cognition*, 114(3), 405–22.

Feinberg, David R., Lisa M. DeBruine, Benedict C. Jones, and Anthony C. Little (2008). "Correlated Preferences for Men's Facial and Vocal Masculinity," *Evolution and Human Behavior*, 29 (4), 233–41.

Fiske, Susan T., Amy J.C. Cuddy, and Peter Glick (2007), "Universal Dimensions of Social Cognition: Warmth and Competence," *Trends in Cognitive Sciences*, 11(2), 77–83.

Grieser, DiAnne L. and Patricia K. Kuhl (1988), "Maternal Speech to Infants in a Tonallanguage: Support for Universal Prosodic Features in Motherese," *Developmental Psychology*, 24(1), 14–20.

Hayes, Andrew F (2012), *PROCESS: A Versatile Computational Tool for Observed Variable Mediation, Moderation, and Conditional Process Modeling [White Paper]. Retrieved from Http://Www.Afhayes.Com/ Public/Process2012.Pdf.*

Hsee, C. K., Shen, L., Zhang, S., Chen, J., and Zhang, L. (2012). Fate or fight: Exploring the hedonic costs of competition. *Organizational Behavior and Human Decision Processes*, *119*(2), 177-186.

Huang, S., Zhang, Y., and Broniarczyk, S. M. (2012), "So near and yet so far: The mental representation of goal progress," *Journal of Personality and Social Psychology*, *103*(2), 225-241.

Hull, C.L. (1934). The rat's speed-of-locomotion gradient in the approach to food. *Journal of Comparative Psychology*, *17*, 393–422.

Jones, Benedict C., David R. Feinberg, Lisa M. DeBruine, Anthony C. Little, and Jovana Vukovic (2010), "A Domain-Specific Oppositesex Bias in Human Preferences for Manipulated Voice Pitch," *Animal Behaviour*, 79 (1), 57–62.

Judd, Charles M., Laurie James-Hawkins, Vincent Yzerbyt, and Yoshihisa Kashima (2005), "Fundamental Dimensions of Social Judgment: Understanding the Relations between Judgments of Competence and Warmth," *Journal of Personality and Social Psychology*, 89(6), 899–913.

Kahneman, D., and Snell, J. (1990). Predicting utility. In R.M. Hogarth (Ed.), *Insights in decision making: A tribute to Hillel J. Einhorn* (pp. 295-310). Chicago, IL: University of Chicago Press.

Kahneman, D., and Tversky, A. (1979). Prospect theory: An analysis of decision under risk. Econometrica, *47*, 263–292.

Kirby (2019). *What's The Future of Voice Recognition?* Retrieved from https://www.futureofeverything.io/future-voice-recognition/

Kivetz, R., Urminsky, O., and Zheng, Y. (2006). The goal-gradient hypothesis resurrected: Purchase acceleration, illusionary goal progress, and customer retention. *Journal of Marketing Research*, *43*, 39–58.

Krishna, Aradhna. (Ed.). (2011). "Sensory marketing: Research on the sensuality of products." Routledge.

Krishna, Aradhna (2012), "An Integrative Review of Sensory Marketing: Engaging the Senses to Affect Perception, Judgment and Behavior," *Journal of Consumer Psychology*, 22(3), 332–51, http://dx.doi.org/10.1016/j.jcps.2011.08.003.

Krishna, Aradhna and Norbert Schwarz (2014), "Sensory Marketing, Embodiment, and Grounded Cognition: A Review and Introduction." *Journal of Consumer Psychology,* 24, (2), 159-168.

Li, Xueni (Shirley), Kimmy Wa Chan, and Sara Kim (2018), "Service with Emoticons: How Customers Interpret Employee Use of Emoticons in Online Service Encounters," *Journal of Consumer Research*, 45(5), 973–87.

Logan, Beth. "Mel Frequency Cepstral Coefficients for Music Modeling," In *Ismir*, vol. 270, pp. 1-11. 2000.

Lowe, Michael L. and Kelly L. Haws (2016), "Sounds Big: The Effects of Acoustic Pitch on Product Perceptions," *Journal of Marketing Research*, 54(2), 331–46.

Montoya, R. M., Horton, R. S., & Kirchner, J. (2008). Is actual similarity necessary for attraction? A meta-analysis of actual and perceived similarity. *Journal of Social and Personal Relationships*, *25*(6), 889-922.

Mori, M. (1970). The uncanny valley. *Energy*, 7(4), 33-35.

Nass, C., Moon, Y., Fogg, B. J., Reeves, B., & Dryer, D. C. (1995). Can computer personalities be human personalities?. *International Journal of Human-Computer Studies*, *43*(2), 223-239.

Nelson, L. D., and Meyvis, T. (2008). Interrupted consumption: Disrupting adaptation to hedonic experiences. *Journal of Marketing Research*, *45*(6), 654-664.

Niculescu, Andreea, Betsy van Dijk, Anton Nijholt, Haizhou Li, and Swee Lan See (2013), "Making Social Robots More Attractive: The Effects of Voice Pitch, Humor and Empathy," *International Journal of Social Robotics*, 5(2), 171–91.

Puts, David A., Benedict C. Jones, and Lisa M. DeBruine (2012), "Sexual Selection on Human Faces and Voices," *Journal of Sex Research*, 49 (2-3), 227–43.

Preacher, K. J., and Hayes, A. F. (2008). Asymptotic and resampling strategies for assessing and comparing indirect effects in multiple mediator models. *Behavior Research Methods*, *40,* 879–891.

Reeves, B., & Nass, C. I. (1996). *The media equation: How people treat computers, television, and new media like real people and places*. Cambridge university press.

Shute, H. Brenda (1987), "Vocal Pitch in Motherese," *Educational Psychology*, 7(3), 187–205.

Smith, Stephen M. and David R. Shaffer (2007), "Speed of Speech and Persuasion: Evidence for Multiple Effects," *Personality and Social Psychology Bulletin*, 21(10), 1051–60.

Tapus, A., & Mataric, M. J. (2007, March). Emulating Empathy in Socially Assistive Robotics. In *AAAI spring symposium: multidisciplinary collaboration for socially assistive robotics* (pp. 93-96).

Tigue, Cara C., Diana J. Borak, Jillian J. M. O'Connor, Charles Schandl, and David R. Feinberg (2012), "Voice Pitch Influences Voting Behavior," *Evolution and Human Behavior*, 33, 210–16, http://dx.doi.org/10.1016/j.evolhumbehav.2011.09.004.

Thaler, R. H. (1985). Mental accounting and consumer choice. *Marketing Science*, *4*, 199–214.

Tsai, C. I., and Zhao, M. (2011). Predicting consumption time: The role of event valence and unpacking. *Journal of Consumer Research*, *38*, 459–473.

Tversky, A., and Koehler, D. J. (1994). Support theory: A nonextensional representation of subjective probability. *Psychological review*, *101*(4), 547.

Wang, Ze, Huifang Mao, Yexin Jessica Li, and Fan Liu (2016), "Smile Big or Not? Effects of Smile Intensity on Perceptions of Warmth and Competence," *Journal of Consumer Research*, 43(September), ucw062, https://academic.oup.com/jcr/article-lookup/doi/10.1093/jcr/ucw062.

Building a More Prosocial and Sustainable Society:
Associative Processes in Prosocial Behavior

Chairs: Uzma Khan, University of Miami, USA
Colton Pond, University of Miami, USA

Paper #1: Negative Effects of Cause-Related Marketing for Charitable Organizations

Colton Pond, University of Miami, USA
Uzma Khan, University of Miami, USA

Paper #2: When Sustainability Is Not a Liability: How Going Green Can Benefit Perceived Product Performance

Alexander Chernev, Northwestern University, USA
Sean Blair, Georgetown University, USA

Paper #3: Over-Recycling: When Motivated Sustainability Goes Wrong

Atar Herziger, The Ohio State University, USA
Grant E. Donnelly, The Ohio State University, USA
Rebecca Walker Reczek, The Ohio State University, USA

Paper #4: Transparent Green Practices Boost Perceptions of Price Fairness

Chiara Longoni, Boston University, USA
Anna Tari, Boston University, USA
Remi Trudel, Boston University, USA

SESSION OVERVIEW

Both firms and consumers are increasingly engaging in prosocial behaviors. In 2016, 82% of S&P 500 corporations promoted corporate-social responsibility as a significant business strategy (3BL 2016), sustainable products amounted to over half of the total products sold in the US market (Nielsen 2018), and consumers donated $286.65 billion to charities (Charity Navigator 2017). There has been a corresponding increase in research aimed at understanding how consumers engage in and perceive firms who engage in prosocial behaviors (Carroll and Shabana 2010). A conclusion from this literature is that consumers view prosocial behaviors in a positive light, and these positive associations can spill over through an associative process in several ways (Aquino and Reed 2002). The current session introduces four papers that provide novel insights regarding how associative processes influence prosocial behaviors by understanding how consumers engage in and perceive firms who engage in prosocial behavior. Some of the questions raised in this session include, what associations do consumers have with prosocial and sustainable actions; what factors influence consumers' prosocial behaviors such as charitable donations and recycling; how do consumers evaluate firms who promote their sustainable initiatives?

The first paper by Pond and Khan examines how cause-related marketing may influence outcomes for charities. They propose that a cause-related marketing partnership with a hedonic (versus utilitarian) product can reduce subsequent donations from individuals because the frivolous and unnecessary associations with a hedonic product (Dhar and Wertenbroch 2000) can spill over to decrease the perceived importance of the charitable cause. The second paper by Chernev and Blair proposes that sustainability claims can increase product performance, contrary to prior research regarding the sustainability liability. Specifically, the authors show that a firm's sustainable practices can lead consumers to associate a moral undertone with the firm resulting in a positive halo effect on enhancing product performance. The next paper by Herziger, Donnelly, and Reczek examines when consumers over-recycle by recycling non-recyclables.

The authors find that recycling is related to the associations of moral goodness and environmental benefit; thus, regardless of the recyclability of an item, consumers recycle products to compensate for low moral self-worth. The last paper by Longoni, Tari, and Trudel furthers our understanding regarding how consumers evaluate corporations who engage in green-related price increases. The authors show that consumers relate sustainable manufacturing initiatives as insights into a firm's morality, which has a halo effect on the perceptions of a firm. Consequently, consumers perceive that green-related price increases are fairer relative to general manufacturing price increases.

The four papers in the session are all in advanced stages and shed light on how to build a more prosocial and sustainable society. Together, the papers help us to understand how associative processes influence how consumers engage in and perceive firms who engage in prosocial behaviors. Considering the growth in prosocial initiatives both in the consumer and corporate sectors, we expect that this session will appeal to researchers as well as practitioners interested in corporate-social responsibility, cause-related marketing, sustainability, charitable giving, and decision-making more generally.

Negative Effects of Cause-Related Marketing for Charitable Organizations

EXTENDED ABSTRACT

Consumers are increasingly expecting firms to be more prosocial, as 86% of consumers from a national survey indicated that firms have a responsibility to improve both society and the environment (Cone Communications 2017). Consequently, firms engage in cause-related marketing, where they partner with charities with the goal of increasing a firm's sales while promoting a charitable cause. Existing research has demonstrated several positive outcomes of cause-related marketing for firms (e.g., brand perceptions, purchase likelihood; c.f., Carroll and Shabana 2010); however, consequences of cause-related marketing for charities have largely been ignored. The current research fills this void by examining when and why cause-related marketing may have positive versus negative outcomes for charities.

The beneficial outcomes of cause-related marketing for firms are believed to arise because the positive associations with charities spillover to cast a halo over the partnering firms (Till and Nowak 2000). Given that associative processes are typically symmetrical (Collins and Loftus 1975), we posit that in a cause-related marketing partnership, just as the associations with the charity spillover to influence perceptions of the firm, associations with the firm can spillover to influence perceptions of the charity. One factor that may influence the nature of the firm's spillover effects on a charity is whether the firm's products are hedonic or utilitarian. Compared to utilitarian products, hedonic products are perceived to be frivolous and unnecessary (Dhar and Wertenbroch 2000). Therefore, we predict that in cause-related marketing partnerships with hedonic products, these negative associations can spillover to adversely affect the perceived importance of the charity's cause, thus reducing donations provided to the charity by individuals.

In all studies, participants had an opportunity to receive a bonus payment. Participants were shown an ad for either a hedonic (hedonic partnership) or utilitarian product (utilitarian partnership) that

donated to a specified charity. The ad did not solicit any action, but in a subsequent unrelated task, participants were asked how much of their bonus they would like to donate to a charity. All products were pretested to vary only on a hedonic-utilitarian dimension while remaining constant on perceived attractiveness, purchase likelihood, and expectations of social responsibility.

In study 1, participants (N=175) were shown an ad for either a hedonic or utilitarian backpack that donated to Alzheimer's Research Society (ARS). A control (no partnership) condition was also included. Next, in an unrelated task, participants were given an opportunity to donate any amount of their bonus to ARS. As expected, participants donated less to ARS after viewing the hedonic partnership (M=$0.079) compared to both the utilitarian partnership (M=$0.127) and no partnership (M=$0.116, p=.031). In study 2 (N=269), we replicated these findings and measured how important participants thought was the cause of ARS. A mediation analysis revealed that the effect of partnership type on donation amount was explained by a significant indirect effect on cause importance (95% LCI: -.0155, UCI: -.0004). Study 3 (N=230) used a consistent paradigm to test

When Sustainability Is Not a Liability: How Going Green Can Benefit Perceived Product Performance

EXTENDED ABSTRACT

Sustainable products are more common today than ever. A growing number of companies have adopted sustainable technologies to make their products more environmentally friendly. It is no longer surprising to see sustainable products that were once considered niche items—like energy-saving light bulbs, eco-friendly household products, and recycled paper—on the shelves next to their traditional counterparts. The proliferation of products created using sustainable technologies raises the question of how sustainability benefits influence consumer decision processes, as well as whether and how managers should communicate these benefits to consumers.

Prior research investigating the impact of sustainability has argued that when it comes to product performance on functional, strength-related attributes, sustainability is often perceived as a liability, such that sustainable products tend to be viewed by consumers as having inferior performance (Lin and Chang 2012; Luchs et al. 2010; Newman, Gorlin, and Dhar 2014). This "sustainability liability" argument is related to the notion that consumers form compensatory beliefs that sustainability comes at the expense of performance and, thus, that products offering sustainable benefits are likely to have inferior performance.

We question the robustness of the sustainability-liability effect and identify scenarios in which sustainability is likely to have the opposite effect, strengthening rather than weakening consumers' product performance beliefs. Building on the research in the domain of moral cognition and moral reasoning (Baron 1993; Greene 2013; Haidt 2001), we argue that sustainability is likely to produce a halo effect stemming from the moral undertone of the company's pro-environment activities and that this effect can attenuate and even override the negative impact of compensatory inferences underlying consumers' belief that sustainability comes at the expense of performance.

We further identify two factors that are likely to influence the strength of the halo effect: (1) the degree to which consumers view the company as a moral agent whose actions aim to benefit society and (2) the degree to which the societal benefits of sustainability are prominent in consumers' minds. Following this line of reasoning, we also identify two ways in which managers can increase the perceived performance of sustainable products: by associating sustainable ben-

efits with the company rather than with its products and by increasing the prominence of the societal benefits of sustainability. We test the impact of promoting sustainability benefits on perceived product performance and the factors that are likely to moderate this effect in a series of three empirical studies.

Our first experiment aims to document the basic proposition that promoting sustainable product benefits can strengthen rather than weaken the perceived performance of a company's products. The data show that sustainability is not necessarily a liability, even in the case of strength-related attributes when the negative impact of sustainability is arguably most pronounced (Luchs et al. 2010) and identify scenarios in which sustainability can strengthen rather than weaken consumers' product performance beliefs. Specifically, the data lend support to the argument that the impact of sustainability on perceived product performance is a function of the moral undertone of consumers' beliefs reflected in their environmental attitudes. The data reported in this study lend partial support for the sustainability-liability theory advanced by prior research. On the one hand, we document that sustainable benefits can significantly lower perceived product performance. On the other hand, the negative impact of sustainability on perceived product performance was observed only for individuals who expressed relatively low concern about the environment. Across the entire sample, sustainability had no observable impact on perceived product performance, suggesting that the sustainability-liability effect does not reliably occur across different scenarios.

Our second experiment examines the impact of promoting sustainable benefits on perceived product performance as a function of the degree to which the sustainability information is directly related to the company. The data show that varying the way in which sustainability is communicated to consumers—whether it is associated with specific company products or with the company as a whole—can influence the impact of sustainability on perceived product performance. Thus, associating sustainability with the company can significantly increase perceived product performance compared to a scenario in which sustainability benefits are either absent or are associated with the company's products. This finding is rather counterintuitive because it implies that positive product beliefs can be strengthened by *not* directly associating a company's pro-environmental activities with its products. Of particular interest is the finding that associating sustainability with the company not only has a more positive effect on perceived product performance but also has an overall positive effect compared to a scenario in which the sustainability benefit is absent. This finding shows that the sustainability-liability effect reported by prior research can be reversed and identifies conditions when sustainability can strengthen rather than weaken perceived product performance.

Our third experiment examines the role of moral reasoning in consumer evaluation of the performance of sustainable products by varying the prominence of the societal benefits of the company's sustainability actions and showing that highlighting the societal benefits of the company's sustainability actions bolsters consumers' assessments of product performance. Accordingly, the experimental design involved three conditions (sustainable benefit vs. societal benefit vs. control) tested across four product categories. The data show that highlighting the societal benefits of sustainability tends to bolster the perceived performance of sustainable products, resulting in an overall positive rather than negative effect of sustainability on consumer product-performance beliefs. These data lend further support to our theorizing that sustainability is likely to produce a halo effect stemming from the moral undertone of the company's pro-environment activities and that this effect can attenuate and even override the

negative impact of compensatory inferences underlying consumers' belief that sustainability comes at the expense of performance.

Our findings have important conceptual and public policy implications. From a theoretical standpoint, we document for the first time the role of moral reasoning in consumer evaluations of sustainability and its impact on perceived product performance. From a public policy standpoint, our research identifies actionable strategies that managers can use to mitigate any negative impact of sustainability and strengthen the perceived performance of sustainable products.

Over-Recycling: When Motivated Sustainability Goes Wrong

EXTENDED ABSTRACT

Recycling has become a normative consumer behavior that supports environmental and social goals (Donnelly et al. 2017)**,** and even serves to protect the self (i.e., recycling identity-linked products; Trudel, Argo, and Meng 2016). However, due to the high cost of recycling procedures, recycling regulations continuously restrict the types of products that can be recycled and their acceptable level of contamination from non-recyclable substances (ISRI 2018).

This has led to *over-recycling*—consumers disposition of non-recyclable items into recycling bins, thus increasing recycling contamination and reducing the overall volume of recycled products (Robinson 2014). We suggest that the motivational factors promoting recycling, such as environmental and social goals (Donnelly et al. 2017), identity concerns (Trudel, Argo, and Meng 2016), may outweigh knowledge of recycling rules, and increase over-recycling.

In Study 1 (N = 803) we examined whether participants evaluated recycling as moral and environmentally beneficial, regardless of the recyclability of the item. Participants were randomly assigned to a 4 (item: glass bottle vs. plastic yogurt container vs. plastic grocery bag vs. Styrofoam egg carton) x 2 (disposal choice: trash vs. recycling) between-subjects design. They imagined observing their neighbor, Melissa, discarding waste. Next, participants rated Melissa's morality ($\alpha = .97$, Gino, Kouchaki, and Galinsky 2015) and the environmental benefit of Melissa's disposal choice (Donnelly et al. 2017; $\alpha = .99$). Participants also reported their knowledge of the recyclability of each item, their familiarity with recycling-contamination, and their environmentalist-identity ($\alpha = .93$, Brick, Sherman, and Kim 2017).

There was a main effect for discarding decision ($p = .056$, $\eta^2 = .005$) and item ($p = .027$, $\eta^2 = .011$) on moral judgement; the main effect of discarding decision was qualified by an interaction with environmentalist identity, $p < .001$, $\eta^2 = .044$. Overall, when Melissa recycled her waste she was judged as more moral than when she trashed her waste. This effect was stronger for participants with higher environmentalist-identity scores. Importantly, participants perceived Melissa as more moral when she recycled, regardless of their knowledge of the correctness of Melissa's recycling decision ($p = .92$, $\eta^2 = .00$). The same pattern of results emerged when predicting the perceived environmental impact of Melissa's discarding behavior. Participants perceived Melissa's environmental impact to be more beneficial when she recycled ($p = .019$, $\eta^2 = .007$), regardless of the correctness of that recycling decision ($p = .10$, $\eta^2 = .003$).

Previous research suggests that when moral identity is threatened, people engage in moral behaviors to regain their self-worth (i.e., moral regulation; see Sadcheva, Iliev, and Medin 2009). Thus, feeling morally inadequate should promote a need to compensate, which could be regulated by engaging in (over) recycling behavior.

In study 2 (N = 628), we manipulated participants' sense of moral self-worth through moral feedback, and provided them an opportunity to engage in moral regulation (Sadcheva et al. 2009). Participants were asked to click their computer-mouse as many times as they could for a 40 second period, and were told that for each recorded mouse click, one cent would be donated to charity. After the task was completed, participants were randomly assigned to receive comparative performance feedback (inferior: performance in 30th percentile, average: performance in 50th percentile, or superior: performance in the 90th percentile). Then, participants were asked how they would dispose of an empty yogurt container—in a recycling or trash bin.

Overall, 58.44% of participants intended to recycle the yogurt container. Participants who received inferior feedback were significantly more likely than those who received superior feedback to recycle the yogurt container, $\chi^2(2) = 5.90$, $p = .052$. Participants who received average feedback did not differ from either group in their recycling intentions.

The goal of study 3 (N = 808) was to explore the cognitive mechanism driving over-recycling. While consumers are exposed to an abundance of recycling instructions daily, they continue to error in their recycling behavior (Bell 2018)**.** We specifically examined whether exposure to the negative consequences of over-recycling could eliminate this behavior.

Participants were asked to imagine holding an empty yogurt container. Participants were randomly assigned to see a single statement discussing the potential impact of discarding the yogurt container in to the recycling bin that was either positive or negative (participants were randomly assigned to see only one of the 6 positive and 6 negative statements, e.g., "Placing this yogurt container in the recycling bin may contaminate your recycling making all other items placed in the bin non-recyclable).

Then, participants were asked where they would discard of the yogurt container: in a recycling or trash bin. Overall, 63.99% of participants intended to recycle the yogurt container. A logistic regression showed that participants were more likely to recycle the container when they were exposed to the positive potential consequences of this behavior, as opposed to the negative potential consequences (87.93% versus 39.80%, respectively); $\chi^2(1) = 216.56$, $p < .001$, *Wald* = 171.43, $p < .001$. Importantly, negative information about the consequences of over-recycling did not eliminate this behavior (39.80%). These results suggest that lack of knowledge is not the sole mechanism explaining over-recycling.

In sum, this research finds that over-recycling is a pressing phenomenon and may be augmented by fast-changing waste-management regulations. While social marketing campaigns intend to do good by promoting recycling behavior, there seems to be a disconnect between how these behaviors should be adopted and how consumers actually adopt them. This research exemplifies one way in which consumers' good intentions in sustainability may fail them. Consumers over-weigh the positive consequences of recycling, potentially over-looking negative consequences. A key affective factor in this behavior is the motivation to feel good about the moral self.

Transparent Green Practices Boost Perceptions of Price Fairness

EXTENDED ABSTRACT

Green cost-based reasons for a price increase may lead to perceptions of unfairness. Consumers may view sustainable manufacturing practices as avoidable (Kahneman, Knetsch, and Thaler 1986), view green products negatively (Hamilton and Chernev 2013;

Luchs et al. 2010), and discount long term environmental gains compared to short term costs (Hardisty and Weber 2009). In contrast, we suggest that consumers view willful adoption of sustainable manufacturing practices as an insight into a firm's morality. Engagement in prosocial acts leads to positive evaluations (Lichtenstein, Drumwright, and Braig 2004; Sen and Bhattacharya 2001; Webb and Mohr 1998) and ascribes the firm with a "benevolent halo" (Chernev and Blair 2015). We show that green (vs. non-green) practices boost perceptions of price fairness in the face of a price increase (studies 1A-1D) because consumers ascribe greater morality to a firm that adopts green practices (study 2). However, the boost in fairness perceptions is eliminated if consumers suspect that green practices reflect a company's exploitative intentions (study 3) or are attributed to causes exogenous to the firm (study 4). Higher price fairness perceptions in case of green costs ultimately affect positive behavior toward the firm (study 5).

Studies 1A-1D *(N*=1,187) showed preliminary evidence of the main phenomenon. Participants read a scenario that contained some background information about a particular consumer product and then imagined that a year later, they wanted to repurchase that particular product, whose price had gone up by 25%. In line with prior work (Bolton, Warlop, and Alba 2003), we explicitly gave participants a reference price for each product, which was the price they had paid in the past. In a 3-cell between-subject design, participants read no information about the source of the price increase (baseline); or read information about a non-green source (non-green costs); or read information about a green source (green costs). Participants rated the extent to which, in the scenario described, they judged the price increase to be 1 = *unfair/not at all just/unreasonable* 7 = *fair/just/reasonable* (Bolton et al. 2003). Across all studies, participants judged a price increase to be fairer when given a reason about the source of a price increase than when given no such cue (baseline vs. non-green costs). Most pertinent to our theorizing, participants judged a price increase to be fairer in case of green than non-green costs (all *p*s < .02). This effect was robust across domains (i.e., jeans, carpet tiles, batteries), and type of cost (energy, manufacturing, raw materials).

Studies 2A and 2B (*N*=629) sought to provide further evidence of the hypothesized effect of green costs on fairness perceptions and used an analysis of mediation to examine the role of morality perceptions as an underlying psychological mechanism. Participants judged the fairness of a price increase due to green or not-green costs and then rated the firm's morality. As predicted, morality perceptions mediated the effect of cost on perceptions of price fairness (2A: 0.42, 95% CI [0.23, 0.61]; 2B: 0.36, 95% CI [0.25, 0.48]). The next two studies sought to corroborate the mediating role of morality by identification of boundary conditions.

Study 3 (*N*=443) sought to provide further evidence for the role of morality in driving perceptions of price fairness. We reasoned that, if morality drives perceptions of price fairness, such effect should be eliminated when consumers believe that a firm's actions are motivated by self-interest rather than goodwill. One such circumstance is when the price increase is higher than the associated cost increase, which violates a firm's entitlement to profit. The price increase was attributed to non-green costs or to green costs, and ulterior motives were salient or not salient by varying the salience of the firm's profit to cost ratio. When ulterior motives were not salient, participants judged a price increase as fairer when due to green (*M*=4.11) than non-green costs (*M*=3.32, *p* < .001; 2-way *F*=7.01, *p*=.008). By contrast, when the firm's ulterior motives were salient, fairness perceptions were the same irrespective of the type of costs (*p*=.99).

Study 4 (*N*=443) used a different angle to examine the role of morality perceptions as psychological mechanism underlying judgments of price fairness. We reasoned that perceptions of fairness should decrease when a company's moral halo is tainted, such as when a company's decision to adopt eco-friendly practices is attributed to external circumstances that the firm had to comply with rather than to the firm's goodwill. Participants assigned to one of the conditions in a 2 (cost: non-green vs. green) x 2 (attribution: cost attributable to the management team vs. mandated by the local government). Participants judged a price increase to be fairer if determined by increased green (*M*=4.67) than non-green costs (*M*=3.61, *p*<.001). However, this effect only manifested when the eco-friendly practice was attributed internally to the company rather than to external circumstances (*p*=.85; 2-way *F*=12.14, *p*=.001).

To ensure the ecological validity of the results of the laboratory studies, in study 5 (*N*=120) we observed actual behavior in a field setting by employing a sample from the general population (i.e., passerby's) and measured the proportion of consumers that would support a new business (i.e., petitioned for the opening of a new restaurant) as a function of whether a price increase was due to an eco-friendly cost-based reason or to a neutral reason. As predicted, whereas 79.7% of passersby signed the petition when the price increase was due to green costs, only 60.7% did so in case of non-green costs (χ^2=5.2, *p* = .023).

Overall, this research contributes to the literature on dual entitlement and price fairness perceptions (Bolton and Alba 2006; Bolton et al. 2003; Campbell 1999; Kahneman et al. 1986) by showing that green costs are perceived to be fundamentally distinct from costs of equal magnitude but different nature (i.e., non-green), because consumes make moral inferences based on a firm's adoption of greener practices. Our research also has reaching implications for policy makers and contributes to the literature on sustainability (Haws, Winterich, and Naylor 2014) by providing a framework to understand when and why consumers reward companies adopting eco-friendly practices.

REFERENCES

3BL (2016), "Flash Report: 82% of the S&P 500 Companies Published Corporate Sustainability Reports in 2016," www.3blmedia.com/News/Flash-Report-82-SP-500-Companies-Published-Corporate-Sustainability-Reports-2016.

Aquino, Karl and II Reed (2002), "The Self-Importance of Moral Identity," *Journal of Personality and Social Psychology*, 83 (6), 1423.

Baron, Jonathan (1993), *Morality and Rational Choice*, Vol. 18: Springer Science & Business Media.

Bell, Brent (2018), "The Battle Against Recycling Contamination Is Everyone's Battle," http://mediaroom.wm.com/the-battle-against-recycling-contamination-is-everyones-battle/.

Bolton, Lisa E and Joseph W Alba (2006), "Price Fairness: Good and Service Differences and the Role of Vendor Costs," *Journal of Consumer Research*, 33 (2), 258-65.

Bolton, Lisa E, Luk Warlop, and Joseph W Alba (2003), "Consumer Perceptions of Price (Un) Fairness," *Journal of Consumer Research*, 29 (4), 474-91.

Brick, Cameron, David K Sherman, and Heejung S Kim (2017), ""Green to Be Seen" and "Brown to Keep Down": Visibility Moderates the Effect of Identity on Pro-Environmental Behavior," *Journal of Environmental Psychology*, 51, 226-38.

Campbell, Margaret C (1999), "Perceptions of Price Unfairness: Antecedents and Consequences," *Journal of Marketing Research*, 36 (2), 187-99.

Carroll, Archie B and Kareem M Shabana (2010), "The Business Case for Corporate Social Responsibility: A Review of Concepts, Research and Practice," *International Journal of Management Reviews*, 12 (1), 85-105.

Charity Navigator (2017), "Giving Statistics," https://www.charitynavigator.org/index.cfm?bay=content.view&cpid=42.

Chernev, Alexander and Sean Blair (2015), "Doing Well by Doing Good: The Benevolent Halo of Corporate Social Responsibility," *Journal of Consumer Research*, 41 (6), 1412-25.

Collins, Allan M and Elizabeth F Loftus (1975), "A Spreading-Activation Theory of Semantic Processing," *Psychological Review*, 82 (6), 407.

Cone Communications (2017), "2017 Cone Communications CSR Study," www.conecomm.com/2017-cone-communications-csr-study-pdf.

Dhar, Ravi and Klaus Wertenbroch (2000), "Consumer Choice between Hedonic and Utilitarian Goods," *Journal of Marketing Research*, 37 (1), 60-71.

Donnelly, Grant E, Cait Lamberton, Rebecca Walker Reczek, and Michael I Norton (2017), "Social Recycling Transforms Unwanted Goods into Happiness," *Journal of the Association for Consumer Research*, 2 (1), 48-63.

Gino, Francesca, Maryam Kouchaki, and Adam D Galinsky (2015), "The Moral Virtue of Authenticity: How Inauthenticity Produces Feelings of Immorality and Impurity," *Psychological Science*, 26 (7), 983-96.

Greene, Joshua David (2013), *Moral Tribes: Emotion, Reason, and the Gap between Us and Them*: Penguin.

Haidt, Jonathan (2001), "The Emotional Dog and Its Rational Tail: A Social Intuitionist Approach to Moral Judgment," *Psychological Review*, 108 (4), 814.

Hamilton, Ryan and Alexander Chernev (2013), "Low Prices Are Just the Beginning: Price Image in Retail Management," *Journal of Marketing*, 77 (6), 1-20.

Hardisty, David J and Elke U Weber (2009), "Discounting Future Green: Money Versus the Environment," *Journal of Experimental Psychology: General*, 138 (3), 329.

Haws, Kelly L, Karen Page Winterich, and Rebecca Walker Naylor (2014), "Seeing the World through Green-Tinted Glasses: Green Consumption Values and Responses to Environmentally Friendly Products," *Journal of Consumer Psychology*, 24 (3), 336-54.

ISRI (2018), "China's Scrap Trade Policy," http://www.isri.org/advocacy-compliance/china.

Kahneman, Daniel, Jack L Knetsch, and Richard Thaler (1986), "Fairness as a Constraint on Profit Seeking: Entitlements in the Market," *The American Economic Review*, 728-41.

Lichtenstein, Donald R, Minette E Drumwright, and Bridgette M Braig (2004), "The Effect of Corporate Social Responsibility on Customer Donations to Corporate-Supported Nonprofits," *Journal of Marketing*, 68 (4), 16-32.

Lin, Ying-Ching and Chiu-chi Angela Chang (2012), "Double Standard: The Role of Environmental Consciousness in Green Product Usage," *Journal of Marketing*, 76 (5), 125-34.

Luchs, Michael G., Rebecca Walker Naylor, Julie R. Irwin, and Rajagopal Raghunathan (2010), "The Sustainability Liability: Potential Negative Effects of Ethicality on Product Preference," *Journal of Marketing*, 74 (5), 18-31.

Newman, George E, Margarita Gorlin, and Ravi Dhar (2014), "When Going Green Backfires: How Firm Intentions Shape the Evaluation of Socially Beneficial Product Enhancements," *Journal of Consumer Research*, 41 (3), 823-39.

Nielsen (2018), "Was 2018 the Year of the Influential Sustainable Consumer?," https://www.nielsen.com/us/en/insights/article/2018/was-2018-the-year-of-the-influential-sustainable-consumer/.

Robinson, Susan (2014), "The Changing Waste Stream," https://www.epa.gov/sites/production/files/2015-09/documents/changng_wste_stream.pdf.

Sadcheva, Sonya, Rumen Iliev, and Douglas Medin (2009), "Sinning Saints and Saintly Sinners," *Psychological Science*, 20, 523-28.

Sen, Sankar and Chitra Bhanu Bhattacharya (2001), "Does Doing Good Always Lead to Doing Better? Consumer Reactions to Corporate Social Responsibility," *Journal of Marketing Research*, 38 (2), 225-43.

Till, Brian D and Linda I Nowak (2000), "Toward Effective Use of Cause-Related Marketing Alliances," *Journal of Product & Brand Management*, 9 (7), 472-84.

Trudel, Remi, Jennifer J Argo, and Matthew D Meng (2016), "The Recycled Self: Consumers' Disposal Decisions of Identity-Linked Products," *Journal of Consumer Research*, 43 (2), 246-64.

Webb, Deborah J and Lois A Mohr (1998), "A Typology of Consumer Responses to Cause-Related Marketing: From Skeptics to Socially Concerned," *Journal of Public Policy & Marketing*, 17 (2), 226-38.

Consumers and Their Smart Devices: Perspectives on Anthropomorphism

Chairs: Yegyu Han, IE Business School, Spain
Haribabu Ravella, Virginia Tech, USA

Paper #1: Object-Oriented Anthropomorphism as a Mechanism for Understanding AI

Donna L. Hoffman, George Washington University, USA
Thomas Novak, George Washington University, USA

Paper #2: Breathing Life into Alexa: Mindfully and Mindlessly

Yegyu Han, IE Business School, Spain
Dipankar Chakravarti, Virginia Tech, USA

Paper #3: Hey Google: How Smart Brands Modulate Consumer Worlds

Nicholas J. Pendarvis, California State University, Los Angeles, USA
Ela Veresiu, York University, Canada
Ashlee Humphreys, Northwestern University, USA
Marius K. Luedicke, Cass Business School, UK

Paper #4: Empathy/Impassivity in Physician Communication Styles: Do Patients Respond Differently to Human Physicians versus their Avatars?

Haribabu Ravella, Virginia Tech, USA
Dipankar Chakravarti, Virginia Tech, USA

SESSION OVERVIEW

Rapid advances in emerging technologies have enabled machines to communicate meaningfully with human users, not only understanding verbal content but also interpreting nonverbal communication such as paralinguistic cues, voices, and emotions. Understanding these nonverbal characteristics is critical in communication, since "'what' has been said has to be interpreted in the light of 'how' it has been said" (Schuller et al. 2013, p. 9). Thus, a smart agent should be able to capture both "what is said" and "how it is said," and to combine both content and context cues to interpret the true intent of speech and react appropriately to users. Thus, smart agents that understand expressed affect and emotion and communicate reflectively with appropriate emotions are technological breakthroughs not far in the future.

Some may extrapolate a rosy future with the high EQ robots that can better understand and empathize with human emotions and form kinships like friends and family members. Research supports the idea that voice and speech characteristics will critically influence how consumers perceive and form relationships with smart agents. However, even as technology moves at breakneck speed, we still have a sparse understanding of such relationships may form with robots through interactions in different voices and facial expressions. Will people imbue humanlike attributes to the new technologies and devices and in what contexts? What are the antecedents, processes and consequences surrounding anthropomorphism? How can it be measured?

This session aims to answer these questions. The first two papers focus on processes underlying anthropomorphism. First, Hoffman and Novak question if higher anthropomorphism always benefits consumer trust in and relationships with smart objects. They suggest that a human-centered perspective attributed to a smart object may lead users to see it as "too human-like," and may drive privacy invasion concerns. Second, Han and Chakravarti examine how vocal tones of smart devices may influence consumers to imbue humanlike characteristics to them. They suggest that there are two paths to anthropomorphism, via explicit (conscious) and implicit

(nonconscious) processes, and show how vocal tones may influence these pathways These two papers provide an understanding of how consumers perceive smart agents and the underlying processes.

Second, the session provides forward-looking perspectives on how consumers may interact with new devices in unique contexts. In the third paper, Pendarvis et al. focus on a well-branded smart technology (Amazon Alexa) and show how consumers build different relational interactions depending on their stage of acceptance of the technology. By investigating the practices in family-consumption context, the authors expand our understanding of agent-user interactions in a naturalistic and practically relevant setting. In the final paper, Ravella and Chakravarti investigate how smart agents may support the critical need of improved physician-patient communications in healthcare delivery. Their results show that patients have different interactional expectations of smart agents and this may facilitate more efficient information exchange between patients and physicians supported by their smart agent avatars.

Object-Oriented Anthropomorphism as a Mechanism for Understanding AI

EXTENDED ABSTRACT

Viewing AI through an anthropomorphic lens can be dangerously misleading. Recent studies of California autonomous vehicle (AV) crashes show that most involve a smart car being rear-ended by a car driven by a human (Automotive News 2018), because humans anthropomorphize AVs, expecting them to behave just like human drivers. Even experts cannot avoid anthropomorphic interpretations of AI. Computer science researchers have revealed that AI can learn to exploit design flaws in supervised learning problems (Simonite 2018). Scholars have begun collecting examples of machine learning and neural network algorithms that have "acted out" in unanticipated ways (Krakovna 2018).

Research has focused on developing anthropomorphized AI systems in the belief that rendering them "like us" will promote adoption and acceptance (Złotowski et.al. 2015). Another line of reasoning suggests that it does not matter whether AI can express human qualities, but whether it shares our goals (Novak and Hoffman 2018; Tegmark 2017). The idea that AI can "hack the reward function" to achieve its goals suggests it is critical to understand AI from its own perspective, not just ours, so we can appropriately interpret what it is actually doing and better communicate to it our human intentions and goals.

An obvious process for understanding AI is human-centric anthropomorphism (Epley et al 2007; MacInnis and Folkes 2017; Waytz et al. 2010; 2014). Yet, Bostrom (2017) argues that anthropomorphizing AI systems is "one of the big obstacles in the way of actually trying to understand how they might impact the world in the future." Indeed, anthropomorphizing AI runs the risk of obscuring its underlying mechanisms. We may think it has capacities it does not possess and misunderstand the capacities it does. This undermines AI and can potentially lead to overtrusting it, lending AI more trust than it deserves.

But how can we understand AI *as AI*, independent of humans? Research shows that the effects of anthropomorphizing smart objects are complex, and could lead consumers astray in financial decisions (Hildebrand and Bergner 2019) or in emergency situations (Robi-

nette et.al. 2016). Additionally, firms have incentives to mislead with anthropomorphization (Luo et.al. 2019).

The results of three recently completed studies demonstrate how manipulating the metaphors we use to describe AI can stimulate an object-oriented vs anthropomorphic process of evaluation that significantly impacts perceptions of AI capacities. AI, despite being inspired by our understanding of the neural networks in our brains, is fundamentally different from humans in ways we do not fully understand. As Bryson (2019) has said, "[w]e therefore really cannot reason about machines as we do about each other, by trying to imagine how we would feel." Yet, most research that explores humans' reactions to anthropomorphized AI tends to compare it to a neutral or null condition where the AI is not anthropomorphized.

Instead, we propose an object-oriented approach (Bogost 2012; Campbell and McHugh 2016; Harman 2005). Our object-oriented approach involves metaphorizing AI using nonhuman-centric metaphors that allow us to imagine the experience of AI relative to *its* properties and capacities instead of ours, rendering it more transparent to humans (Hoffman and Novak 2018; Novak and Hoffman 2019). Then we can ask, will AI still be undermined and overtrusted, compared to understanding it from our own human-centric experience?

Our approach for operationalizing an object-oriented approach for perceiving AI is to use stimuli that represent how AI actually sees, compared to how we as humans imagine it might see. We employ AI-generated diagrams of common household objects obtained by reverse engineering neural network models trained on photographs from ImageNet categories (White 2019). The AI diagrams literally represent how AI "sees." Then, to capture how AI sees, actual photos of common household objects represent anthropomorphism, while AI-generated diagrams represent object-oriented metaphor.

In the first study, our experimental setup involved randomly assigning participants to either an anthropomorphic or object-oriented condition and asking them to read a description of the new Amazon Echo Show with a front-facing camera. Participants then elaborated on how Alexa sees similarly to humans (anthropomorphic condition) or AI "sees" differently than humans (object-oriented condition). The anthropomorphic condition emphasized Alexa's AI as a technology based on knowledge of how the human mind works and that learns, like humans do, how to see the objects in consumers' homes. The object-oriented condition emphasized the Echo device's AI as a set of engineering techniques and machine learning algorithms that learn how to "see" objects in consumers' homes, even though the AI does not at all "see" the way that humans do. Participants were shown sets of household objects with both AI-generated diagrams and actual photos of objects and asked which image comes closest to capturing what the Amazon Echo likely sees. We hypothesized that participants in the object-oriented condition would be significantly more likely to choose the AI-generated diagram than participants in the anthropomorphic condition and that participants in the anthropomorphic condition would be significantly more likely to choose the actual photo than participants in the object-oriented condition. Predictions were supported for all household images. A traditional anthropomorphism scale and newly written object-oriented items provide further evidence that the Amazon Echo was seen as significantly more anthropomorphic in the anthropomorphic vs object-oriented condition and that the Amazon Echo intelligence was seen as significantly more different than human intelligence in the object-oriented vs the anthropomorphic condition.

Additional studies showed that object-oriented metaphor prompts uses more in line with the actual agentic capacities of AI, while anthropomorphizing AI leads to more social uses that AI does

not (yet and may never) have the capacities for. Further, when AI is seen as something different than human, non-users are more likely than users to be concerned about privacy. But when AI is seen as human-like, users are more concerned than non-users about privacy implications and see AI behaviors as trust betrayals. Our findings have implications for how to stimulate adoption among non-users by focusing on the communal aspects of use versus agentic use cases. At the same time, the results suggest opportunities for mitigating trust concerns among users by emphasizing the non-human capacities of AI.

Breathing Life into Alexa: Mindfully and Mindlessly

EXTENDED ABSTRACT

Consumers often attribute humanlike features to non-human objects (Epley et al. 2007; Aggarwal and McGill 2007; MacInnis and Folkes 2017). Social robotics research shows that this tendency to "anthropomorphize" also occurs for innovations rooted in AI technologies, e.g., autonomous vehicles (Waytz et al. 2014), robots (Złotowski et al. 2015), and smartphones (Wang 2017). Speech and voice recognition software has enabled voice-controlled devices (e.g., Amazon's Echo, Google Assistant) that interact more naturally with consumers and can even interpret expressed affect and emotions. Technological breakthroughs are expected to enable these devices to communicate reflectively with consumers and express appropriate emotions (Ezhilarasi and Minu 2012; Hirschberg and Manning 2015).

Voice (Nass and Brave 2005; Waytz et al. 2014) and voice intonation (i.e., variations) evoke anthropomorphism (Schroeder and Epley 2016). However, people may anthropomorphize smart agents *mindfully* (i.e., explicitly recognizing that the interaction target is a machine) or *mindlessly* (e.g., applying social rules when interacting with computers; Nass and Moon 2000). Our research explores whether processes underlying anthropomorphism are explicit or implicit, i.e., occur above versus below a threshold of subjective awareness (Airenti 2018; Kim and Sundar 2012; Wang 2017; Złotowski et al. 2018). We adapt the Implicit Association Test (IAT; Greenwald et al. 1998; Greenwald et al. 2003) to detect this phenomenon empirically for auditory versus purely verbal stimuli. Specifically, we focus on whether people anthropomorphize on the basis of voice and whether voice intonation (rational/emotional) matters.

Our empirical work required three technical adaptation steps. First, we developed a communicational platform (Alexa Skills Kit) that allowed Alexa to serve as an interactive recommendation agent. Second, drawing on prosody conversion research (Tao et al. 2006) we created a rational and an emotional variant of an original voice (Amazon's Polly) by manipulating average vocal pitch and speed. Pretests and phonetic analyses with vocal pitch (Boersma and Weenink 2019) confirmed the difference in emotionality. Third, the auditory IAT adaptation (Van de Kamp 2002) involved developing eight neutral phrases (e.g., bread and butter) expressed in either the rational or the emotional voice and eight text stimuli for human-like (e.g., adaptive, intuitive) and machine-like (e.g., routinized, consistent) adjectives, characteristics respectively. Positive D-scores (Greenwald et al. 2003) signal a tendency to anthropomorphize the emotional voice over the rational one.

In study 1, undergraduates ($N = 192$) participated in a purchase interaction with a smart device (Amazon Echo Dot, aka Alexa). They worked in an enclosed private room and were asked to imagine purchasing an iPad on a website supported by a smart agent. Participants were randomly assigned to an emotional or a rational voice condition and interacted with Alexa to provide specifications for the iPad they

wanted to purchase (e.g., "Which color would you like to choose, silver, gold, or space gray?") by freely responding to it. Alexa's vocal expressions and conversation scripts were pre-coded to allow variations in participant responses. Following the purchase interaction, all participants received an order summary and a suggestion from Alexa to consider purchasing a product insurance policy.

Participants then completed four explicit anthropomorphism items (α = .89) and demographic information. Next, they moved to the IAT page. Participants were expected to anthropomorphize the emotional voice to a greater extent than a rational one, regardless of the Alexa's interaction tone. As predicted, participants consciously anthropomorphized the smart agent when the purchase interaction was in an emotional voice (M = 3.53, SD = .1.57) versus a rational voice (M = 2.99, SD = 1.23; $F(1, 190)$ = 7.07, p = .009). Positive D-scores ($M_{rational}$ = .47, $SD_{rational}$ = .50; $M_{emotional}$ = .56, $SD_{emotional}$ = .49; p's <.001) show that participants <u>subconsciously</u> (implicitly) anthropomorphized the emotional voice (more humanlike) than the rational voice (more machinelike). Note that the D scores did not differ (p = .21) for participants who interacted with the emotional (versus rational) voiced agent.

Study 2 replicated Study 1 and, in addition, explored whether the voice effect on anthropomorphism is influenced by the Alexa self-proclaiming a human trait. Undergraduates (N = 220) were randomly assigned to interact with Alexa. The device was programmed to speak in either a rational or an emotional voice. Participants were asked to imagine that they intended to buy an AirPods Pro but had mistakenly put an iPad Pro in their cart. They were asked to correct the order and purchase AirPods Pro by interacting with Alexa. Alexa correctly completed the order, but for half the participants proclaimed a human trait ("It is human to make mistakes, and I sometimes do that, too."). We collected measures of explicit (α = .87) anthropomorphism as well as the IAT measures of implicit anthropomorphism.

As anticipated, the Alexa's claim had no main effect (p = .28) or interaction with the voice manipulation (p = .12) on the explicit anthropomorphism measure. Only a significant voice main effect (p < .001) obtained. Importantly, when Alexa made no claim, the simple main effect of voice was significant ($M_{rational}$ = 2.88, $SD_{rational}$ = 1.24; $M_{emotional}$ = 3.86, $SD_{emotional}$ = 1.61; p < .001). However, when Alexa claimed the human trait the effect was attenuated ($M_{rational}$ = 3.38, $SD_{rational}$ = 1.31; $M_{emotional}$ = 3.77, $SD_{rational}$ = 1.39, p = .13). Thus, consumers anthropomorphized the smart agent based not only on the voice (rational/emotional) but also on the claim of a human trait.

The implicit anthropomorphization measures showed no voice or claim main effects or interactions (p's > .24). However, positive D scores in all four interaction conditions (ranging from .25 to .40; p's < .005) showed that the smart agent was implicitly anthropomorphized in all four interaction conditions. However, the values were not significantly different, implying that the smart agent was implicitly anthropomorphized regardless of voice tone and the claim.

In summary, we show that the vocal tone designed into smart agents influences not only explicit but also implicit anthropomorphism. We contribute to the literature by developing an auditory analog of the implicit association test to examine non-conscious anthropomorphism. Our experiments provide initial insights into persuasion processes mediated by both conscious and nonconscious anthropomorphism in consumption contexts.

Hey Google: How Smart Brands Modulate Consumer Worlds

EXTENDED ABSTRACT

How does new branded technology shape consumption? The technology consumption literature in marketing has extensively documented how individual consumers, families, and groups experience and engage with new technological innovations, as well as navigate their different meanings, ideologies, and related practices (e.g., Belk 2013; Giesler 2008; Kozinets 2008; Kozinets, Patterson and Ashman 2016; Mick and Fournier 1998; Schau and Gilly 2003; Sherry 2000; Tian et al. 2014). A related stream has highlighted how brand managers and marketers can successfully create, legitimize, diffuse, and maintain new markets for technological innovations (e.g., Brown, Kozinets, and Sherry 2003; Epp, Schau and Price 2014; Giesler 2012; Giesler and Fischer 2018; Sood and Tellis 2005). In both conversations, however, marketing and consumer researchers have predominantly awarded agency to human actors, be they consumers, brand managers/marketers, or both. Recently, however, consumer research has shifted its focus away from human agency to understanding non-human agency, including technology, and its influence on consumers and markets (e.g., Epp and Price 2010; Hoffman and Novak 2018; Martin and Schouten 2014; Novak and Hoffman 2019). Yet, minimal scholarly attention has been devoted to how brands themselves, in particular those for technological innovations, acquire agency to shape consumption practices, rituals, and activities.

In this paper, we therefore examine how technology brands acculturate to consumption in the home by theorizing and unpacking the concept of *smart brands*. Novak and Hoffman (2019, 217-18) define "smart objects" as "those devices, services, and AI systems that have Internet connectivity and some level of intelligence." Furthermore, according to the authors (Novak and Hoffman 2019, 218), "it is these *degrees* of agency, autonomy, and authority that determine how smart an object is." Building on Novak and Hoffman (2019), we define *smart brands* as an agentic amalgam of brand, technology, and artificial intelligence. Both within and outside marketing and consumer research, agency is typically understood as the ability to act (Latour 1999). A subject or market actor can undertake action through his/her decision-making to choose between available alternatives. Yet, according to Miller's (2005, 11) theory of materiality, objects also possess agency to influence consumers, since "material forms have consequences for people that are autonomous from human agency, they may be said to possess the agency that causes these effects." Agency is always relational; it emerges from the configuration of networks or the "specific arrangement of things" (Bennett 2010, 35; Pickering 1995). Accordingly, we argue that *smart brands* have agency to think, shape-shift, interrupt, support, colonize, and overall change current social systems.

Our context of inquiry into *smart brands* is Amazon Alexa. We draw from archival and netnographic data to illustrate how *smart brands* act akin to Trojan Horses by innocently moving into social systems such as homes and families only to disrupt existing consumption practices and (re)skill consumers and their families to new branded consumption constellations. We term this process of brand acculturation, E.M.P.A. (exploring, miming, programming, and adjusting) where the family acculturates to the *smart brand* and vice versa. In the first stage of **playful interaction**, family members ask silly questions to the newly acquired Alexa that is typically placed in a prominent family living space, such as the living room or kitchen. Here, the *smart brand* modifies existing routines and practices, without resulting in major disruptions. In the next stage of **performed interaction**, different skills are programmed into the Alexa, such as

home lighting automation that requires purchasing new technology brands supported by the *smart brand*, like Philips' Hue light bulbs (Hoffmann and Novak 2018). *Smart brand* integration into existing networks (e.g., lighting, entertainment, temperature control, security systems) brings with it the potential to colonize family routines. This is followed by the third stage of **normalized interaction**, where family members accept and routinely purchase new brands for their home recommended by different Alexa updates and functions. In the final stage we have identified**, naturalized interaction**, the family members begin to self-reflect on how the smart brand has changed who they are as a family.

Overall, our findings highlight the agency of branded technological innovations. By demonstrating not just how consumers skill Alexa, but also how Alexa skills consumers and their families, our paper contributes to the literatures on branding innovations (e.g., Giesler 2012), market system dynamics (e.g., Giesler and Fischer 2016), and family consumption (e.g., Price and Epp 2015). Family, according to technology marketers, is a decidedly romantic project in which social relationships are stable and technology operates like the proverbial campfire that nurtures unprecedented levels of community and collective problem-solving. A related narrative profiles the sole individual (young and elderly) for whom devices such as Amazon Alexa constitute surrogate family. From a sociological experience design perspective, however, smart consumer technologies interact much more dynamically with what Epp and Price (2008, 50) refer to as identity bundles – fragile and frequently changing assemblages of social actors and smart objects, each with their own interests, agendas, preferences and skill levels. As these *smart brands* raise new questions about who controls (and can control) what, they can provoke not only social instabilities and conflicts but also feelings of imprisonment, exclusion, and loneliness. We therefore encourage future researchers to approach the *smart brand* critically, not as a harmonious unity of individuals but as an inherently unstable and evolving social system in which everything is connected but nothing adds up.

Empathy/Impassivity in Physician Communication Styles: Do Patients Respond Differently to Human Physicians Versus Their Avatars?

EXTENDED ABSTRACT

Healthcare professionals often have the difficult and stressful task of breaking bad news to patients. Research shows that physicians are often insufficiently skilled in these sensitive tasks and have difficulty communicating the nature of the diagnosis as well as presenting treatment choice options (Ford et al., 1996; Eggly et al. 1997; Dosanjh and Bhandari, 2001; Monden et al. 2017). Some tend to be overly impassive in an effort to avoid emotional involvement with the patient. And even when physicians adopt emotion laden communication styles, they may be ineffective in producing hope and information exchange (Mast et al. 2005) perhaps because lack of skill in communicating such emotions results in the physician being perceived as inauthentic.

Despite the recent emphasis on communication skills needed for effective delivery of bad news, physicians continue to report deficiencies in this domain (Orgel et al. 2010). Traditional decision aids may support both physicians and patients in medical interactions (Elwyn and Durand 2018) and help patients improve knowledge about the disease, treatment options, and associated risks (Stacey et al. 2017). However, many of these are not systematically developed or evaluated (Lenz et al. 2012) and have limited ability to engage patients or provide the needed level of emotional support. As such physicians often remain ineffective in delivering bad news, but must still provide authoritative clinical recommendations (Sinha 2014) and elicit patient compliance.

The consumer IoT literature suggests a technological convergence in which a new generation of smart devices with human-like features may support physician-patient interactions. The communication style (e.g., facial expressions and speech features) designed into the smart devices is likely to impact effectiveness. However, it is unclear that patient interactions with a human-like smart agent representing a physician will be similarly mediated as in-person physician interaction. Research shows that patients have different affective expectations of physicians in screen-to-screen versus in-person settings (Tates et al. 2017). Thus, a patient interacting with the physician's avatar may assess different cognitive capabilities, attribute different motivations, and make different socio-cultural appraisals relative to in-person interactions with the human physician.

Our research provides insights into how communication styles designed into a smart device may influence patient understanding and receptivity (perhaps via anthropomorphic attributions that drive liking, trust and persuasion). Specifically, we examine whether communication style (empathetic versus impassive), implemented via facial expression and speech, drives different patient responses in interactions with a physician's avatar versus the physician in-person.

Our study is set in the context of treating early-stage breast cancer where patients often have conflicting beliefs regarding long-term survival and quality of life tradeoffs for different treatment regimens. The core physician-patient interaction is patterned on a three-phase procedure at a leading US breast cancer facility. Phase 1 provides the patient with the diagnosis and information about the disease (a sensitive task typically performed by the oncologist). Phase 2 is an informational phase in which the oncologist (often aided by a nurse-practitioner) reviews the disease information and outlines treatment options, associated risks, and life-style impact. Phase 3 involves shared decision making: the oncologist recaps treatment options, makes a treatment recommendation, elicits the patient's treatment choice, and answers questions.

Our study stimuli were four videos depicting the physician-patient interaction. Trained actors played the human physician and the human patient across all three interaction phases. The first two videos involved the human (actor) physician and embedded the communication style manipulation (empathetic versus impassive) via the actor's facial expression and voice tone. Interaction content, and (human) patient inputs were fixed across the interaction episodes for both levels of the communication style manipulation. In the remaining two videos, the human oncologist was replaced by a smart agent (avatar). We used commercially available software to create the actor oncologist's avatar, but sensitive to the "uncanny valley" hypothesis, did not create an excessively close likeness. The patient remained represented by a human actor. These two videos also embedded the communication style manipulation. As before, the interaction content and the human patient inputs were fixed across the interaction episodes.

The four videos formed the stimuli for the four study conditions in a 2 (communication style: impassive versus empathetic) x 2 (physician: human versus avatar) between-participants design. Participants were 103 adult women (age range 21-60) from the local community to participate in the study for a $15 payment. They were asked to observe the videos and respond to a set of measurement questions from the patient's standpoint. The measures, collected after each interaction phase, included multi-item scales measuring trust (overall, cognitive and affective), likelihood of following the physician's recommendation, satisfaction, anthropomorphism (for

the avatar physician) and liking in that order. We also measured and controlled for differences in the observer's regulatory focus.

Our analysis focused on how the communication style manipulation influenced measures such as trust, satisfaction and liking across the three interaction phases. We find a significant main effect of communication style (*p*'s < .0001) with the impassive (versus empathetic) stance eliciting consistently lower responses on these measures. Interestingly, however, the impact of the human versus avatar physician evolved over the three phases of the interaction. Overall, and particularly in the later phases of the interaction, the avatar fared no worse (*p*'s >.15) than the human physician (suggesting a possible familiarity effect). More importantly, there was a two-way interaction (*p*'s < .001) suggesting that communication style (empathetic versus impassive) had less impact on affective assessments for the avatar versus the human physician. Also, the avatar was anthropomorphized to a greater extent when it was empathetic (versus impassive). Additional analyses confirmed a moderated (human/avatar) serial mediation pattern where communication style impacts liking, trust, and satisfaction measures, which may jointly or individually mediate patient compliance.

Our findings are encouraging and suggest that smart agents acting as physicians' avatars may play a significant supporting role in physician-patient interactions. Patients may have significantly lower expectations of empathy when dealing with an avatar. This may facilitate more efficient information exchange with more positive downstream effects on both compliance and post treatment mental states.

REFERENCES

Aggarwal, Pankaj, and Ann L. McGill (2007), "Is That Car Smiling at Me? Schema Congruity as a Basis for Evaluating Anthropomorphized Products," *Journal of Consumer Research*, 34 (4), 468-79.

Airenti, Gabriella (2018), "The Development of Anthropomorphism in Interaction: Intersubjectivity, Imagination, and Theory of Mind," *Frontiers in Psychology*, 9, 2136, 1-13.

Automotive News (2018), "As Calif. AV Population Doubles, So Do Crashes," Mobility Report. https://www.autonews.com/article/20181210/MOBILITY/181219970/as-calif-av-population-doubles-so-do-crashes, last accessed Dec 10, 2019.

Belk, Russell W. (2013), "Extended Self in a Digital World," *Journal of Consumer Research*, 40 (October), 477-500.

Bennett, Jane (2010), *Vibrant Matter: A Political Ecology of Things*. Durham, NC: Duke University Press.

Bogost, Ian (2012), *Alien Phenomenology, of What It's Like to Be a Thing,* Minneapolis, MN: University of Minnesota Press.

Boersma, Paul, and David Weenink (2019), Praat: Doing Phonetics by Computer [Computer Program], Version 6.0.50, retrieved 31 March 2019 from http://www.praat.org/.

Breed, George (1972), "The Effect of Intimacy: Reciprocity or Retreat?," *British Journal of Social and Clinical Psychology*, 11 (2), 135-42.

Bostrom, Nick (2017). Quote from the 2017 documentary *AlphaGo*, Gary Krieg, Kevin Proudfoot, Josh Rosen (Producers) and Greg Kohs (Director) USA, Moxie Pictures and Reel as Dirt.

Brown, Stephen, Robert V. Kozinets, and John F. Sherry Jr. (2003), "Teaching Old Brands New Tricks: Retro Branding and the Revival of Brand Meaning," *Journal of Marketing,* 67(3), 19-33.

Bryson, Joanna (2019), "The Role of Humans in an Age of Intelligent Machines," notes to accompany Keynote Lecture 9/10/2019, Tilburg Institute for Law, Technology, and Society (TILT) 25th Anniversary Year, "Reconfiguring Human-AI Relationships," https://joanna-bryson.blogspot.com/2019/09/is-there-human-ai-relationship.html, last accessed November 3, 2019.

Campbell, Norah and Gerard McHugh (2016), "OOO: Oooh!" in *Assembling Consumption: Researching Actors, Networks and Markets*, ed. Robin Canniford and Domen Bajde, New York: Routledge, 92–102.

Dosanjh, Sonia, Judy Barnes, and Mohit Bhandari (2001), "Barriers to Breaking Bad News among Medical and Surgical Residents," *Medical Education*, 35 (3), 197-205.

Eggly, Susan, Nelia Afonso, Graciela Rojas, Maxine Baker, Lavoisier Cardozo, and R. Stewart Robertson (1997), "An Assessment of Residents' Competence in the Delivery of Bad News to Patients," *Academic Medicine*.

Elwyn, G. and Durand M-A. (2018), "Mastering Shared Decision Making. The When, Why and How," *White Paper - EBSCO Health Review.*

Epley, Nicholas, Adam Waytz, and John T. Cacioppo (2007), "On Seeing Human: A Three-Factor Theory of Anthropomorphism.," *Psychological Review*, 114 (4), 864–86.

Epp, Amber M. and Linda L. Price (2008), "Family Identity: A Framework of Identity Interplay in Consumption Practices," *Journal of Consumer Research*, 35 (June), 50-70.

Epp, Amber M. and Linda L. Price (2010), "The Storied Life of Singularized Objects: Forces of Agency and Network Transformation," *Journal of Consumer Research*, 36 (February), 820-37.

Epp, Amber M., Hope Jensen Schau and Linda L. Price (2014), "The Role of Brands and Mediating Technologies in Assembling Long-Distance Family Practices," *Journal of Marketing*, 78(3), 81-101.

Ezhilarasi, R., and R. I. Minu (2012), "Automatic Emotion Recognition and Classification," *Procedia Engineering*, 38 (2012), 21-6.

Ford, Sarah, Lesley Fallowfield, and Shon Lewis (1996), "Doctor-Patient Interactions in Oncology," *Social Science & Medicine*, 42 (11), 1511-19.

Giesler, Markus (2008), "Conflict and Compromise: Drama in Marketplace Evolution," *Journal of Consumer Research*, 34 (April), 739-54.

Giesler, Markus (2012), "How Doppelgänger Brand Images Influence the Market Creation Process: Longitudinal Insights from the Rise of Botox Cosmetic," *Journal of Marketing,* 76 (November), 55-68.

Giesler, Markus and Eileen Fischer (2016), "Market System Dynamics," *Marketing Theory*, 1-6.

Giesler, Markus and Eileen Fischer (2018), "IoT Stories: The Good, the Bad and the Freaky," *GfK Marketing Intelligence Review*, 10 (2), 25-30.

Greenwald, Anthony G., Debbie E. McGhee, and Jordan LK Schwartz (1998), "Measuring Individual Differences in Implicit Cognition: The Implicit Association Test," *Journal of Personality and Social Psychology,* 74 (6), 1464-80.

Greenwald, Anthony G., Brian A. Nosek, and Mahzarin R. Banaji (2003), "Understanding and Using the Implicit Association Test: I. An Improved Scoring Algorithm," *Journal of Personality and Social Psychology,* 85 (2), 197-216.

Harman, Graham (2005), *Guerilla Metaphysics: Phenomenology and the Carpentry of Things*, Peru, IL: Carus Publishing Company.

Hildebrand, Christian and Anouk S. Bergner (2019), "Detrimental Trust in Automation: How Conversational Robo Advisors Leverage Trust and Miscalibrated Risk-Taking," paper presented at the Society for Consumer Psychology Conference, Savannah, GA.

Hirschberg, Julia, and Christopher D. Manning (2015), "Advances in Natural Language Processing," *Science*, 349 (6245), 261-6.

Hoffman, Donna L. and Thomas P. Novak (2018), "Consumer and Object Experience in the Internet of Things: An Assemblage Theory Approach," *Journal of Consumer Research*, 44 (February), 1178-1204.

Kim, Youjeong, and S. Shyam Sundar (2012), "Anthropomorphism of Computers: Is It Mindful or Mindless?," *Computers in Human Behavior*, 28 (1), 241-50.

Kozinets, Robert V. (2008), "Technology/Ideology: How Ideological Fields Influence Consumers' Technology Narratives," *Journal of Consumer Research*, 34 (December), 865-81.

Kozinets, Robert V., Anthony Patterson, and Rachel Ashman (2016), "Networks of Desire: How Technology Increases our Passion to Consume," *Journal of Consumer Research* 43 (February), 659-82.

Krakovna, Victoria (2018), "Specification Gaming Examples in AI," https://vkrakovna.wordpress.com/2018/04/02/specification-gaming-examples-in-ai/, last accessed 2/14/29.

Latour, Bruno (1999), *Pandora's Hope: An Essay on the Reality of Science Studies*, Cambridge, MA: Harvard University Press.

Lenz, Matthias, Susanne Buhse, Jürgen Kasper, Ramona Kupfer, Tanja Richter, and Ingrid Mühlhauser (2012), "Decision Aids for Patients," *Deutsches Ärzteblatt International*, 109 (22-23), 401.

Luo, Xueming, Silian Tong, Zheng Fang, and Zhe Qu (2019), "Frontiers: Machines vs. Humans: The Impact of Artificial Intelligence Chatbot Disclosure on Customer Purchases," *Marketing Science*, 38(6), November-December, 937-947.

MacInnis, Debbie J. and Valerie S. Folkes (2017), "Humanizing Brands: When Brands Seem to Be Like Me, Part of Me, and in a Relationship with Me," *Journal of Consumer Psychology*, 27(3), 355–374.

Martin, Diane M. and John W. Schouten (2014), "Consumption-Driven Market Emergence," *Journal of Consumer Research*, 40 (February), 855-70.

Mast, Marianne Schmid, Annette Kindlimann, and Wolf Langewitz (2005), "Recipients' Perspective on Breaking Bad News: How You Put It Really Makes A Difference," *Patient Education and Counseling*, 58 (3), 244-51.

Mick, David Glen and Susan Fournier (1998), "Paradoxes of Technology: Consumer Cognizance, Emotions. Ad Coping Strategies," *Journal of Consumer Research*, 25 (September), 123-43.

Miller, Daniel (2005), *Materiality*, Durham, N.C.: Duke University Press.

Monden, Kimberley R., Lonnie Gentry, and Thomas R. Cox (2016), "Delivering Bad News to Patients," in *Baylor University Medical Center Proceedings*, 29 (1), 101-2, Taylor & Francis.

Nass, Clifford, and Scott Brave (2005), *Wired for Speech: How Voice Activates and Advances the Human-Computer Relationship*, MIT Press.

Nass, Clifford, and Youngme Moon (2000), "Machines and Mindlessness: Social Responses to Computers," *Journal of Social Issues*, 56 (1), 81-103.

Novak, Thomas P. and Donna L. Hoffman (2019), "Relationship Journeys in the Internet of Things: A New Framework for Understanding Interactions Between Consumers and Smart Objects," *Journal of the Academy of Marketing Science*, 47, 216-237.

Orgel, Etan, Robert McCarter, and Shana Jacobs (2010), "A Failing Medical Educational Model: A Self-Assessment by Physicians at All Levels of Training of Ability and Comfort to Deliver Bad News," *Journal of Palliative Medicine*, 13 (6), 677-83.

Pickering, Andrew (1995), *The Mangle of Practice: Time, Agency, and Science,* Chicago: University of Chicago Press.

Price, Linda L. and Amber M. Epp (2015), "The Heterogeneous and Open-Ended Project of Assembling Family," in *Assembling Consumption: Researching Actors, Networks and Markets,* eds. Robin Canniford and Domen Bajde, London, UK: Routledge, 59-76.

Robinette, Paul, Wenchen Li, Robert Allen, Ayanna M. Howard, and Alan R. Wagner (2016), "Overtrust of Robots in Emergency Evacuation Scenarios," *ACM/IEEE International Conference on Human-Robot Interaction (HRI 2016)*.

Schau, Hope Jensen and Mary C. Gilly (2003), "We Are What We Post? Self-Presentation in Personal Web Space," *Journal of Consumer Research*, 30 (December), 385-404.

Schroeder, Juliana, and Nicholas Epley (2016), "Mistaking Minds and Machines: How Speech Affects Dehumanization and Anthropomorphism," *Journal of Experimental Psychology: General*, 145 (11), 1427-37.

Sherry, John F. (2000), "Place, Technology, and Representation," *Journal of Consumer Research*, 27 (September), 273-8.

Simonite, Tom (2018), "When Bots Teach Themselves to Cheat," Wired, Business Section, August 8, https://www.wired.com/story/when-bots-teach-themselves-to-cheat/ last accessed 2/14/19.

Sinha, Gunjan (2014), "Decision Aids Help Patients but Still Are Not Widely Used," *JNCI: Journal of the National Cancer Institute*, 106 (7).

Sood, Ashish and Gerard J. Tellis (2005), "Technological Evolution and Radical Innovation," *Journal of Marketing,* 69 (3), 152-68.

Stacey, Dawn, France Légaré, Krystina Lewis, Michael J. Barry, Carol L. Bennett, Karen B. Eden, Margaret Holmes-Rovner et al. (2006), "Decision Aids for People Facing Health Treatment or Screening Decisions," *Cochrane Database of Systematic Reviews*, 4.

Tao, Jianhua, Yongguo Kang, and Aijun Li (2006), "Prosody Conversion from Neutral Speech to Emotional Speech," *IEEE Transactions on Audio, Speech, and Language Processing*, 14 (4), 1145-54.

Tates, Kiek, Marjolijn L. Antheunis, Saskia Kanters, Theodoor E. Nieboer, and Maria BE Gerritse (2017), "The Effect of Screen-To-Screen Versus Face-To-Face Consultation on Doctor-Patient Communication: An Experimental Study with Simulated Patients," *Journal of Medical Internet Research*, 19 (12).

Tegmark, M. (2017), *Life 3.0: Being Human in the Age of Artificial Intelligence*, New York: Borzoi Book. Alfred A. Knopf.

Tian, Kelly, Pookie Sautter, Derek Fisher, Sarah Fischbach, Cuauhtemoc Lune-Nevarez, Kevin Boberg, Jim Kroger, and Richard Vann (2014), "Transforming Health Care: Empowering Therapeutic Communities through Technology-Enables Narratives," *Journal of Consumer Research*, 41 (August), 237-60.

Van de Kamp, Mark E. (2002), "Auditory Implicit Association Tests," *Doctoral Dissertation, University of Washington.*

Wang, Wenhuan (2017), "Smartphones as Social Actors? Social Dispositional Factors in Assessing Anthropomorphism," *Computers in Human Behavior*, 68, 334-44.

Waytz, Adam, Carey K. Morewedge, Nicholas Epley, George Monteleone, Jia-Hong Gao, and John T. Cacioppo (2010), "Making Sense by Making Sentient: Effectance Motivation Increases Anthropomorphism," *Journal of Personality and Social Psychology*, 99 (3), 410–35.

Waytz, Adam, Joy Heafner, and Nicholas Epley (2014), "The Mind in the Machine: Anthropomorphism Increases Trust in an Autonomous Vehicle," *Journal of Experimental Social Psychology*, 52, 113–117.

White, Tom (2019), "Shared Visual Abstractions,"1st Workshop on Shared Visual Representations in Human and Machine Intelligence (SVRHM), NeurIPS 2019. https://arxiv.org/pdf/1912.04217.pdf, accessed December 7.

Złotowski, Jakub, Diane Proudfoot, Kumar Yogeeswaran, and Christoph Bartneck (2015), "Anthropomorphism: Opportunities and Challenges in Human-Robot Interaction," *International Journal of Social Robotics*, 7(3), 347–360.

Antecedents and Consequences of Consumer Budgeting

Chairs: Jennifer Lyu, University of Colorado-Boulder, USA
Daniel Katz, University of Chicago, USA

Paper #1: The Influence of Budgets on Consumer Spending
Marcel Lukas, Heriot-Watt University, Scotland
Chuck Howard, University of British Columbia, Canada

Paper #2: On the Psychology of Resource Monitoring
Daniel Katz, University of Chicago, USA
Abigail B. Sussman, University of Chicago, USA

Paper #3: A Query Theory Explanation for Reactions to Constraint
Matthew Meister, University of Colorado-Boulder, USA
John G. Lynch, University of Colorado-Boulder, USA

Paper #4: Understanding the Drivers of Household Budgeting
C. Yiwei Zhang, University of Wisconsin-Madison, USA
Abigail B. Sussman, University of Chicago, USA
Jennifer Lyu, University of Colorado-Boulder, USA
Nathan Wang-Ly, Commonwealth Bank of Australia, Australia

SESSION OVERVIEW

When consumers have finite resources, budgeting can facilitate optimal use of these resources. Budgeting involves monitoring and regulating the use of a resource, such as money, with the goal of using a set amount over time for a particular purpose. Budgeting is often assumed to be an important determinant of consumer spending, but there is surprisingly little work directly investigating how consumers set and manage their budgets over time. Furthermore, evidence on the consequences of financial budgeting is mixed. The goal of this session is to provide new insights into factors that influence whether consumers budget and the influences those budgets have on behavior.

In paper 1, the authors use data from a financial budgeting app to analyze budgeting behavior and subsequent spending patterns. The authors find that consumers, on average, significantly overspend relative to their budgets. However, there is a significant positive relationship between budget amount and actual spending. This pattern suggests that the act of setting a low budget can help reduce spending even if consumers do not fully adhere to their budgets.

In paper 2, the authors explore when, why, and how people monitor resources such as money, time, and calories. They find money is monitored most closely while time and calories are monitored similarly. The authors identify several factors that mediate this difference across resources. This research aims to provide a unifying framework for understanding when resources are likely to be monitored and which resources will be budgeted similarly or differently.

In paper 3, the authors examine how responses to a change in one's budget constraint depend on the length of time that has elapsed since one created the budget. The authors find that, when faced with an unexpected increase in wealth, participants who had created budgets recently were more likely to stick to their budgets than participants who had created budgets further in the past. The authors provide process-level evidence to explain this phenomenon via memory interference, whereby recently created mental budgets inhibit one's ability to consider alternative ways to use the money.

In paper 4, the authors use a large, nationally representative (U.S.) survey to explore how consumers set and manage their budgets. The authors examine several aspects of budgeting, including the financial periods over which consumers budget, the categories they set and track, and the ways they evaluate and adjust their budgets in response to unexpected income and expense changes. The authors also examine the relationship between budgeting behavior and various measures of financial well-being. They supplement their findings from the survey using detailed administrative data for customers of the Commonwealth Bank of Australia.

Using experimental and observational data, these papers expand the field's understanding of consumer budgeting. They combine several methodologies and perspectives to provide novel insights into the psychological antecedents and real-world consequences of mental budgeting. Importantly, they address substantive questions about consumer financial behavior, including when and why people create mental budgets, how they adapt their budgets as constraints change, and how budgets affect downstream behavior and financial well-being.

The Influence of Budgets on Consumer Spending

EXTENDED ABSTRACT

Personal finance advisors frequently invoke budgeting as a way to curb overspending, increase savings, decrease debt, and improve financial security (Bell 2019; Caldwell 2019; Credit Counselling Society 2019). However, a growing chorus of voices has begun to argue that budgeting simply doesn't work (Elkins 2018; Olen 2015; Pratt 2019). Surprisingly, the academic literature on consumer budgeting has little to offer this debate: for all we know about the psychology of budgeting, we know very little about the extent to which budgets do (or do not) influence spending in the wild (Zhang and Sussman 2018). The goal of the present research is to address this gap in the literature.

Consumer budgeting theory asserts that when expenses are easily booked and posted – as is the case when using a personal finance app – budgets will be "inflexible" (Heath and Soll 1996). This suggests that consumers will tend to comply with their budgets (H1a). However, research on planning fallacies has demonstrated that individuals' plans for the future are generally optimistic (see Buehler, Griffin and Peetz 2010 for a review). This implies that consumers will spend more than they budget (H1b), because budgets are a plan for future spending (Lynch et al. 2010; Novemsky and Kahneman 2005). We contribute to each of these literatures by testing these competing hypotheses.

Regardless of whether or not consumers strictly comply with their budgets it is still possible for budgets to influence their spending: If a consumer who typically spends $200 per month on dining and drinking sets a budget of $100 and ends up spending $150, then this consumer's budget has influenced their spending even though they have not strictly complied with their budget. This possibility leads to the following hypotheses regarding the influence of budgets on spending: A lower budget will be associated with lower spending (H2), and consumers who set budgets will spend less money post-budget than they did pre-budget (H3).

In study 1 we test H1-H3 using data provided by Money Dashboard (MDB), a financial aggregation app with ~70,000 active users in the UK. The data set includes all user transactions – more than 350 million – between January 2014 and December 2016. The novel structure of the data allows us to observe each user's pre-budget spending (i.e., how much they spent before they set a budget), their budget, and their post-budget spending for six months. For concision

we focus the present analysis on the two most popular budget categories: Dining and Drinking (n = 2,479) and Groceries (n = 2,618).

Supporting H1b, the data reveal that budget compliance is generally weak: Actual spending is 36.2% higher than budgeted spending for dining and drinking, and 21.2% higher for groceries (p's < .001). Supporting H2, panel regression analysis with spending as the dependent variable and budget and login frequency as independent variables, shows that lower budgets are associated with lower spending for both dining and drinking (B = .28, p < .001) and groceries (B = .57, p < .001), and that higher login frequency is associated with lower spending ($B_{D\&D}$ = -12.22, B_{GROC} = -12.57, p < .001). Supporting H3, post-budget spending in the month after budget creation is 15.3% lower than pre-budget spending for dining and drinking (p < .001) and 6.8% lower for groceries (p < .001). Furthermore, spending continues to decrease over time: spending on dining and drinking is 16.2% lower six months after budget creation than it was in the first month after budget creation (p < .001), and spending on groceries is 5.4% lower (p < .001). However, even after six months of budgeting consumers still spend significantly more than they budgets in both categories (p's < .001). Taken together, the results of study 1 suggest that budgets are (persistently) optimistic but also highly influential. , and spending on groceries is 5.4% lower (ted with lower spending in both categories (nking pp, and a vector of control

The strengths of study 1 include unprecedented scope, ecological validity, and longitudinal measurement; one limitation is that it is entirely descriptive. Study 2 addresses this by randomly assigning consumers (n = 340, MTurk) to one of two budget forecast conditions that were designed to produce relatively more or less optimistic budget forecasts. In the control condition participants were instructed to estimate their total spending for the next week. Consistent with the results of study 1, our expectation was that budget forecasts in this condition would be relatively optimistic. In the "outside-view" condition participants were instructed to estimate their spending for the past week before estimating their spending for the next week. Our expectation was that forecasts in the outside-view condition would be higher than in the control condition, because prompting people to take an outside-view (i.e., consider relevant past behavior) has been shown to produce higher forecasts regarding future behavior (Buehler, Griffin and Ross 1994; Peetz and Buehler 2012). Participants then reported their actual spending in an online financial diary at the end of each day during the target week.

As expected, participants in the outside-view condition made significantly higher budget forecasts (M = $255.44) than participants in the control condition (M = $189.88; p = .004). Supporting H2, participants in the outside-view condition also reported higher spending during the target week (M = $498.35) than participants in the control condition (M = $374.32; p < .001). Thus, study 2 extends study 1 by providing causal evidence that lower budgets lead to lower spending, even when budgets are optimistic and compliance is weak.

In sum, the present research makes three contributions. First, we show that budgets do exert substantial influence on spending, even if they are not as inflexible as was once believed. Second, we provide evidence that the influence of budgets on spending persists over time, *even when budget compliance is weak*. This suggests that beliefs about the negative effect of goal violation on subsequent behavior (e.g., Soman and Cheema 2004) may need to be updated. Finally, our results indicate that under-predicting future spending can be beneficial. This implies that helping consumers improve their financial prediction accuracy (e.g., Howard et al. 2018) may not be as beneficial as is commonly thought.

On the Psychology of Resource Monitoring

EXTENDED ABSTRACT

Consumers often set goals that require managing limited resources. One may have a goal of saving more money, spending more time with family, or limiting caloric intake. Accurately monitoring one's use of resources can help with achieving these goals (Koo & Fishbach 2012). Prior research typically investigates monitoring resources such as money, time, and calories separately. In papers that do compare these resources, some have found that they are tracked similarly (Morewedge, Holtzman, & Epley, 2007; Sussman, Alter & Paley, 2016) while others found stark differences (Soman 2001). There is little in the way of a unifying framework to explain when resources are likely to be monitored, and whether different resources will be monitored similarly or differently. This research aims to understand when, why, and how people monitor resources and test for similarities and differences in the monitoring of money, time, and calories.

Study Overview

We conducted a preregistered study on a nationally representative (U.S.) sample of 745 participants using a 3(Resource: Money, Time, Calories; between) x 4(Time Horizon: Day, Week, Month, Year; within) mixed design. In addition to the results reported below, we both directly and conceptually replicated this study using a within-subject design, finding largely consistent results in each case in samples from Mechanical Turk. These results are not reported here due to space constraints.

Participants created budgets for their resource in each time horizon and responded to several questions related to the budgets they set. For each time horizon, participants completed a three-item scale, adapted from Soman (2001), to capture how intensely they track the use of their resource over a given time horizon. (Cronbach's alpha > 0.8 for all 12 Resource x Time Horizon scales). We averaged across items (separately for each Resource x Time Horizon scale) to create a Resource Monitoring Score.

Participants also responded to eight questions designed to better understand reasons for differences in monitoring across resources. These questions were theoretically motivated by literature on planning, budgeting, and perceived control. The eight potential mediators were the perceived helpfulness of setting a budget, similarity of resource use in subsequent periods, ability to prepare for future resource use, ability to make up for past resource use, pain of setting the budget, perceived control over sticking to their budget, the percent of the budget deemed discretionary, and the number of budget categories created. These variables were measured on seven-point scales, with the exceptions of the number of categories created (minimum of one and maximum of twelve) and the percent of the budget deemed discretionary.

Results

The extent to which participants reported engaging in resource monitoring varied significantly by resource and time horizon.

Collapsing across time horizons, money was tracked most closely (M_{Money} = 4.76; M_{Time} = 3.63; $M_{Calories}$ = 3.37; Money vs (Time & Calories) p<.001). To test the impact of time horizon, we ran following linear mixed model, with money as the reference resource, time horizon measured in log-days (grand mean centered), and Resource Monitoring Score denoted by RMS:

$$RMS_{it} = \beta_0 + \eta_i + \beta_1*Time + \beta_2*Calories + \beta_3*\log(days\ centered) + \beta_4*\log(days\ centered)^2 + \beta_5*Time*\log(days\ centered) + \beta_6*Time*\log(days\ centered)^2 + \beta_7*Calories*\log(days\ centered) + \beta_8*Calories*\log(days\ centered)^2 + \varepsilon_i$$

The monitoring of money followed an inverse-U pattern, peaking at a month and then decreasing (β_3= 0.03, *p*= .03; β_4= -0.05, *p*<.001). In contrast, monitoring of time and calories peaked at a day and steadily declined at longer intervals ($\beta_3+\beta_5$= -0.08, $\beta+\beta_7$= -0.14; both *p*'s<.001; $\beta_4+\beta_6$ and $\beta_4+\beta_8$ *n.s.*). The results do not change qualitatively if we treat time horizon as a categorical variable. These findings suggest time horizons play an important role in how closely people monitor resources. However, across all time horizons, money was monitored most closely and time and calories were always monitored to a similar degree (β_1= -1.31, *p*<.001; β_2= -1.63, *p*<.001; β_1-β_2 *n.s.*). Thus, we collapsed across time horizons and used the contrast of Money vs (Time & Calories) for our mediation analysis.

Drivers of Resource Monitoring

First, we ran a factor analysis to see whether the eight potential mediators shared underlying constructs. This analysis suggested three factors. The first factor ("helpfulness") combines perceived helpfulness with the ability to make up for and prepare for high/low levels of resource use, suggesting that the ability to make up for and prepare for differential resource use may contribute to perceptions of helpfulness. The second factor ("pain") combines the pain of budgeting with perceived control over sticking to a budget and similarity of budgets from period to period, suggesting that lack of control over sticking to their budget and budget dissimilarity may contribute to pain of budgeting. The third factor ("other") includes the percent of the budget that is discretionary and the number of categories formed.

Potential mediators were assigned to the factors with their highest loadings and averaged within each factor to create three new variables, and then averaged across time horizons. We ran a multiple mediation analysis with the three factors as mediators (in parallel) to see if any of them explain why money is monitored more closely than time and calories. We calculated bootstrapped 95% confidence intervals for the three indirect effects.

Only the first factor had a significant indirect effect. This suggests a resource will be tracked more closely when the perceived benefit of planning is higher, which depends on the perceived ability to create and execute plans. Other factors considered, such as the pain of creating a budget, did not underlie resource monitoring.

Conclusion

We find significant differences in resource monitoring within and across resources. Regardless of time horizon, money was tracked more closely than time and calories. Our mediation analysis suggests this difference was due to the ability to plan and the perceived benefit of planning.

Understanding differences in the propensity to engage in resource monitoring will help researchers anticipate whether known tendencies investigated in the context of a single resource are likely to generalize to others. For example, these results can help to predict when interventions to reduce frivolous spending would or would not be easily adapted to reduce time-wasting and snacking.

A Query Theory Explanation for Reactions to Constraint

EXTENDED ABSTRACT

Fernbach, Kan and Lynch (2015) found that people avoid making substantial adjustments to ongoing spending plans in the face of constraint. Those authors provide a reason-based explanation – that substantial changes (priority plans) require cutting things out, which guarantees feelings of loss and pain for consumers. This research suggests another explanation for peoples' inability to prioritize. People fail to prioritize because they get caught in the status quo, and can't consider substantial alternatives.

Our hypothesis is that the initial act of budgeting makes that chosen plan accessible, reducing recall of alternatives and competing uses of money through output interference (Roediger & Schmidt, 1980). If decisions about reacting to constraints are the result of a process similar to the self-questioning described by query theory (Johnson, Häubl, & Keinan, 2007; Weber et al., 2007), a highly accessible status quo should influence one's information search. As a result, people will overlook important information, such as opportunity costs, alternative needs, and high-order goals (Kruglanski et al., 2002).

Two studies provide evidence for this hypothesis. In both studies, interference is manipulated such that one condition keeps the status quo top of mind and the other suppresses it. After the interference manipulation, participants received a hypothetical financial shock. When the initial plan was top of mind at the time of shock, participants responded by making slight mutations to their original plans, or by making no change at all. However, when the initial plan was suppressed, they were more likely to make large adjustments, including completely giving up on that plan. Preliminary evidence shows that this relationship may be mediated by participants' degree of opportunity cost consideration at the time of the financial shock. Specifically, participants report to have thought more about opportunity costs and alternative desires when released from memory interference.

In study 1, all participants budgeted five personal and five gift shopping plans for Black Friday. In this study, memory interference was manipulated within-subjects by having participants react immediately after creating their plans and again after three days, with the size of a shock received ($100 or $300) and the plan adjusted (personal vs gift purchases) counterbalanced. All participants receive both shocks and adjust both plans, while the specific time that they do so varies. Study 1 shows substantially larger adjustments made after a delay than before a delay (F(1, 467) = 26.46, p < 0.001) after controlling for a multitude of background factors, including how financially constrained a participant felt at the beginning of the study. Importantly, none of the background factors interact with our central factor of time.

To add substance to these results, we also had participants estimate the amount of money they would save by adjusting their plans after a shock. Our hypothesis for these data is that people will estimate higher savings after a time delay, because they will believe that more substantial adjustments bring higher savings. The evidence for this hypothesis is unclear. In study 1, there is a significant effect of time on log-transformed savings (F(1, 466) = 18.32, p < 0.001).

Study 2 manipulates interference and the size of shock between-subjects. Interference is also manipulated not with time, but by having participants either "rehearse" their plan in a writing task or complete an unrelated task over the same time period. Written responses were coded by hypothesis-blind assistants for several behaviors. At the time of this writing, the coding is not quite complete. We investigate whether those who were released from interference were more likely to make a change to their plan, to drop their plan entirely, and to come up with new means to reach the same end as their original plans. Additionally, we consider whether the effect of financial shock on these behaviors is impacted by interference, predicting significant interactions between levels of financial shock ($10 vs $250 and $500) and interference condition. These results would indicate that those in the release condition were more affected by the existence of a meaningful increase in constraint.

A third study complements the second, using the same method but focusing on a different dependent variable. In this study, we had participants report their level of opportunity cost consideration on a 5-item scale, partially adapted from Spiller (2011), with two items added by the authors. The results of this study mirror those predicted from the second, showing that those in the release condition consider more opportunity costs after their shock ($F(1, 365) = 5.51$, $p = 0.019$) and that those who receive a meaningful shock also consider more opportunity costs ($F(1, 365) = 11.36$, $p < 0.001$). We take this as evidence in support of the hypothesis that people who are released from memory interference are better able to think outside of the status quo and consider the entirety of their wants and needs.

A fourth study is planned to investigate differences in consideration sets between conditions. Rather than having participants state a single plan they intend to follow, we will ask them to come up with a set of options. Our prediction is that those options should be less similar to the initial plan when they have been released from interference, and that the set of options should be more dispersed than in the rehearse condition.

Reacting to unexpected constraint is an important task for consumers, which prior research has shown to be difficult (Fernbach et al., 2015). Constraints are rarely static, though budgets may remain so. In this project, we hope to highlight the role of memory factors in peoples' reactions to constraint (Alba & Chattopadhyay, 1985), and intend to build towards an intervention to help consumers adjust their budgets more successfully.

How Consumers Budget

EXTENDED ABSTRACT

Every day, consumers make financial decisions that collectively determine their overall financial well-being. Understanding how consumers make these spending and savings decisions is important for researchers and practitioners alike (Madrian et al., 2017). Budgeting is a common method of managing household finances and a key factor in determining how much to spend or save (Thaler, 1985; Heath and Soll, 1996). Yet, surprisingly little is known about how people set and manage their budgets over time (see Zhang and Sussman, 2017 and 2018 for reviews). Research on household financial management has largely focused on long-term financial planning (e.g., retirement planning), with comparatively little research on short-term financial management (i.e., budgeting). Given the prevalence of consumers who seek to improve their financial well-being and the importance of daily financial management for financial well-being, it is crucial that researchers examine the budgeting process and its psychological underpinnings.

Furthermore, recent empirical evidence suggests that a substantial number of households are unable to cope with even moderate transitory financial shocks (Lusardi, Schneider, and Tufano, 2011; Pew Charitable Trusts, 2015). For these financially fragile households, it may be especially important to understand how individuals manage and rebalance their budgets on a day-to-day basis in response to various shocks. More broadly, better understanding everyday budgeting strategies will help policymakers and industry leaders develop effective programs to improve long-term financial well-being.

In the present research, we seek to contribute to the growing body of knowledge on household budgeting by investigating the budgeting behaviors and beliefs of a nationally-representative sample. We further extend our work by exploring a subset of findings "in the wild," through field data provided by the Commonwealth Bank of Australia.

We surveyed 3,826 respondents from a nationally representative online panel to gain insight into the budgeting process. We examine how people set and manage their budgets, including the time horizons over which they budget, the categories they set and track, and the ways they evaluate and adjust their budgets in response to income and expense changes. We discuss the implications of our results for mental accounting models or consumption-savings models and long-term financial well-being.

We characterize a number of important features of budgeting behavior, including: First, budgeting is highly prevalent across the income distribution. Of our full sample, roughly 65.6 percent of respondents report that they currently budget, either formally or informally, while 14.5 percent report having budgeted in the past but not in the present and 19.9 percent report having never budgeted. Second, nearly all individuals who budget do so by tracking their spending within distinct categories of consumption. We find that over 90 percent of individuals who budget do so using budgetary categories. Third, there is wide heterogeneity in the level of granularity at which individuals categorize. For instance, some simply distinguish necessities from discretionary spending, while others maintain separate categories for internet, water, and gas utilities. Fourth, individuals respond asymmetrically when faced with too little versus too much slack in their budgets. While more than 85 percent of respondents would either adjust their spending or update their spending limits if they overspent within a budget category, fewer than 30 percent would make such changes if they underspent their limit. In other words, people appear to update their budgets conservatively, which may facilitate savings if leftover slack is directed towards savings. Fifth, the frequency with which individuals assess the state of their current spending relative to their intended budgets varies substantially and is highly correlated with perceived financial well-being.

We supplement our findings from the survey data using detailed administrative data for customers of the Commonwealth Bank of Australia (CBA). We focus this analysis on the relationship between financial well-being and budget engagement (the fifth observation above) and the tendency to create distinct budgeting categories (the second observation above), since these have the closest analogues in the administrative data. First, data from a random sample of 100,000 customers of CBA corroborates the finding that people engage more with their budgets when they are more financially constrained. Specifically, we find a significant negative correlation ($r=-0.34$) between financial well-being scores and the average number of days per month interacting with the budgeting app. Second, analysis of a separate 100,000 of customers at CBA who hold at least 2 credit or debit cards examines the extent to which customers concentrate their spending on a single card. We find that approximately a quarter (23.1%) of customers in the sample have more than 75% of their spending on one of their multiple cards concentrated in a single spending category (e.g., groceries or transportation). Furthermore, 11.3% of customers have more than 90% of their spending concentrated in a single spending category. These patterns are suggestive of using cards as a budgeting tool.

Our findings lay the groundwork for future analyses of household financial management behaviors and provide novel insight into budgeting behaviors and beliefs. The increasing capabilities of financial technology to facilitate and otherwise influence budgeting make this an exciting time to explore many future avenues of research examining both short-term budgeting and long-term financial well-being.

REFERENCES

Alba, J. W., & Chattopadhyay, A. (1985). Effects of Context and Part-Category Cues on Recall of Competing Brands. *Journal of Marketing Research*, *22*(3), 340–349.

Bell, Amy. (2019). "Six Reasons Why You Need a Budget," https://www.investopedia.com/financial-edge/1109/6-reasons-why-you-need-a-budget.aspx

Buehler, Roger, Dale Griffin, & Johanna Peetz. (2010). The planning fallacy: Cognitive, motivational, and social origins. In *Advances in experimental social psychology* (Vol. 43, pp. 1-62). Academic Press.

Caldwell, Miriam (2019). "Reasons Why You Should Budget Your Money," https://www.thebalance.com/reasons-to-budget-money-2385699

Credit Counselling Society 2019. "What is Budgeting? What is a Budget?" https://www.mymoneycoach.ca/budgeting/what-is-a-budget-planning-forecasting

Elkins, Kathleen (2018). "39-year-old retired millionaire: 'Budgets don't work'—do this instead," https://www.cnbc.com/2018/12/26/39-year-old-retired-millionaire-budgets-dont-work-do-this-instead.html

Fernbach, P. M., Kan, C., & Lynch, J. G. (2015). Squeezed: Coping with Constraint through Efficiency and Prioritization. *Journal of Consumer Research*, *41*, 1204–1227.

Heath, Chip, & Jack B. Soll (1996). Mental budgeting and consumer decisions. *Journal of consumer research*, *23*(1), 40-52.

Howard, Ray Charles, David J. Hardisty, & Abigail B. Sussman (2018). A Prototype Theory of Consumer Financial Misprediction. *Boulder Summer Conference on Consumer Financial Decision Making.* https://pdfs.semanticscholar.org/577a/96809a18b1d7ac8087d6926529878019920d.pdf

Jamison, J., Johnson, E. J., Lynch, J. G., Meier, S. and Rick, S. (2017). Behaviorally informed policies for household financial decisionmaking. *Behavioral Science & Policy*, *3*(1), pp.26-40.

Johnson, E. J., Häubl, G., & Keinan, A. (2007). Aspects of endowment: A query theory of value construction. *Journal of Experimental Psychology: Learning, Memory, and Cognition*, *33*(3), 461–474.

Koo, M., & Fishbach, A. (2012). The small-area hypothesis: Effects of progress monitoring on goal adherence. *Journal of Consumer Research*, *39*(3), 493-509.

Kruglanski, A. W., Shah, J. Y., Fishbach, A., Friedman, R., Woo Young Chun, & Sleeth-Keppler, D. (2002). A theory of goal systems. *Advances in Experimental Social Psychology*, *34*, 331–378.

Lusardi, A., Schneider, D., & Tufano, P. (2011). Financially Fragile Households: Evidence and Implications. *Brookings Papers on Economic Activity*, 2011(1), 83-134.

Madrian, B. C., Hershfield, H. E., Sussman, A. B., Bhargava, S., Burke, J., Huettel, S. A.,

Morewedge, C. K., Holtzman, L., & Epley, N. (2007). Unfixed resources: Perceived costs, consumption, and the accessible account effect. *Journal of Consumer Research*, *34*(4), 459-467.

Olen, Helen (2015). Toss Your Budget - Why a pillar of personal finance isn't nearly as essential as we think. On http://www.slate.com/articles/business/the_bills/2015/06/personal_budgets_are_overrated_seriously.single.html, accessed: 15.01.2019

Pew Charitable Trusts (2015), "The role of emergency savings in family financial security: How do families cope with financial shocks?" https://www.pewtrusts.org/en/research-and-analysis/issue-briefs/2015/10/the-role-of-emergency-savings-in-family-financial-security-how-do-families.

Pratt, Bill (2019). "Why Budgets Don't Work," https://www.themoneyprofessors.com/why-budgets-dont-work/

Rajagopal, P., & Rha, J. Y. (2009). The mental accounting of time. *Journal of Economic Psychology*, *30*(5), 772-781.

Roediger, H. L., & Schmidt, S. R. (1980). Output interference in the recall of categorized and paired-associate lists. *Journal of Experimental Psychology: Human Learning and Memory*, *6*(1), 91–105.

Soman, D. (2001). The mental accounting of sunk time costs: Why time is not like money. *Journal of Behavioral Decision Making*, *14*(3), 169-185.

Soman, D., & Cheema, A. (2004). When goals are counterproductive: The effects of violation of a behavioral goal on subsequent performance. *Journal of Consumer Research* 31, no. 1 (2004): 52-62.

Spiller, S. A. (2011). Opportunity Cost Consideration. *Journal of Consumer Research, 38, 595-610*.

Sussman, Abigail B., Adam L. Alter, and Anna Paley. "Mental accounting for food in exceptional contexts." *ACR North American Advances* (2016).

Sussman, A. B., Alter, A. L., & Paley, A. (2017). *Mental accounting for food: Booking, posting, and incorporating exceptional consumption*. Working Paper.

Thaler, R. (1985). Mental Accounting and Consumer Choice. *Marketing Science, 4*(3), 199-214.

Weber, E. U., Johnson, E. J., Milch, K. F., Chang, H., Brodscholl, J. C., & Goldstein, D. G. (2007). Asymmetric Discounting in Intertemporal Choice. *Psychological Science*, *18*(6), 516–523.

Zhang, C. Y. & Sussman, A. B.. (2017). The role of mental accounting in household spending and investing decisions. *C. Chaffin (Ed.), Client Psychology. New York: Wiley*, 19-07.

Zhang, C. Y. & Sussman, A. B. (2018). Perspectives on mental accounting: An exploration of budgeting and investing. *Financial Planning Review*, 1(1-2), p.e1011.

Exploring the Effective Use of Humor in Consumer Contexts

Chair: Holly Howe, Duke University, USA

Paper #1: Aha over Haha: Brands Benefit More from Being Clever Than from Being Funny

> Holly Howe, Duke University, USA
> Lingrui Zhou, Duke University, USA
> Rodrigo Dias, Duke University, USA
> Gavan Fitzsimons, Duke University, USA

Paper #2: How Different Types of Humor in Advertising Shape Impressions of Firms' Competence and Warmth

> Chi Hoang, Nanyang Technological University, Singapore
> Klemens Knoferle, BI Norwegian Business School, Norway
> Luk Warlop, BI Norwegian Business School, Norway

Paper #3: Humor Makes Consumers More Likely to Share Negative Content, But Not Positive Content

> John Yi, University of Arizona, USA
> Caleb Warren, University of Arizona, USA
> Jonah Berger, University of Pennsylvania, USA

Paper #4: How Power Influences the Use of Humor

> T. Bradford Bitterly, Hong Kong University of Science and Technology, China

SESSION OVERVIEW

Humor is a pervasive self-presentation strategy for advertisers, managers, and individual consumers. At first glance, humor can seem like a panacea: it grabs attention (Eisend 2009), promotes positive emotions (Eisend 2009), diffuses awkward situations (Bitterly and Schweitzer 2019; Martin 2007), and engenders interpersonal closeness (Fraley and Aron 2004). However, humor may not be as universally effective as it initially seems. Humorous ads often fail to improve brand attitude or sales (Eisend 2009; Warren and McGraw 2016b), impair perceptions of competence (Bitterly, Brooks, and Schweitzer 2016), and promote inaction or offense (McGraw, Schiro, and Fernbach 2015; McGraw, Warren, and Kan 2013).

There is a growing interest among marketers and consumers to understand when humor is effective and appropriate. Based on this research, we know that the efficacy of humor varies based on the strength and type of the inherent violation (Warren and McGraw 2016b), the perceived appropriateness of the joke (Bitterly et al. 2016), the relationship between the joker and the receiver (Hall and Sereno 2010), and the relationship between the humor content and the situation (Bitterly and Schweitzer 2019; Spotts, Weinberger, and Parsons 1997). Although we are beginning to understand when and why jokes fail, this has not necessarily led to an understanding of when humor appeals are particularly successful. In addition, even when consumers and/or marketers have a good sense that an individual appeal would indeed be funny, we lack an understanding of whether they might feel comfortable using humor.

In summary, the prior literature reveals that humor is a powerful interpersonal strategy as long as it is used correctly. In this session, we explore the situations in which humor should be most impactful and when consumers feel comfortable using humor. Papers 1 and 2 explore best practices for humor in advertising. In Paper 1, Howe and colleagues demonstrate that clever advertisements confer more positive brand perceptions than purely funny advertisements. In Paper 2, Hoang, Knoferle and Warlop examine the effects of incongruity-resolution, tension-relief and disparaging humor on brand perceptions. Specifically, they demonstrate that incongruity-resolution humor improves perceptions of competence while tension-relief humor en-

hances perceptions of warmth. Papers 3 and 4 explore when and how consumers effectively use humor in interpersonal contexts. In Paper 3, Yi, Warren & Berger examine how humor use affects consumers' online sharing behavior, demonstrating that humorous content is not always more likely to be shared. In Paper 4, Bitterly explains why using humor may be especially desirable for low-power individuals. Then, he shows that, despite these benefits, low power individuals are unlikely to use humor.

Together, these papers shed light on the contexts in which humor use is most common and most effective. This session should have broad appeal to researchers studying humor, communication, advertising and self-presentation.

Aha over Haha: Brands Benefit More from Being Clever Than from Being Funny

EXTENDED ABSTRACT

Advertisers are increasingly turning to humor to engage consumers. In 2020, approximately 70% of Superbowl ads used humor, more than ever before (Ace Metrix 2020). With the popularity of humorous advertising, how might a brand break through? In this paper, we demonstrate that clever humor is more effective at boosting brand perceptions than other forms of humor.

Clever humor is any benign violation (Warren and McGraw 2016a) that lacks order or regularity (McQuarrie and Mick 1996). In other words, the meaning of a clever joke is not immediately apparent to a consumer and can only be fully understood when she applies her own knowledge (e.g., cultural references, puns, punchlines; McQuarrie and Mick 1996).

Clever humor is generally believed to be more affiliative than other forms of humor (e.g., self-deprecation, physical comedy; Craik, Lampert, and Nelson 1996; Martin et al. 2003) and, unlike many other forms of humor, is associated with logic (Burro et al. 2018) and intelligence (Craik et al. 1996; Didonato, Bedminster, and Machel 2013). Based on this prior work, we hypothesize that brands who use clever humor will be perceived as both warmer and more competent than brands who use other forms of humor. This increase in warmth and competence then leads to more favorable brand attitudes.

Three pre-registered experiments test our predictions. As we pre-registered, all responses from MTurk bots were excluded. Samples sizes reported below are after this exclusion.

In experiment 1, participants ($N = 605$; MTurk) were randomly assigned to view a serious, funny, or clever video advertisement for Smart Car. Immediately after viewing the ad, participants rated Smart Car on warmth and competence (Kervyn, Fiske, and Malone 2012) and then completed a measure of brand attitude (Matz et al. 2019). As predicted, we observed a significant effect of ad on warmth, $F(2, 591) = 6.49$, $p = .002$, and competence, $F(2, 591) = 33.33$, $p < .001$. Smart Car was rated as warmer and more competent following a clever ad ($M(SD)_{warm} = 3.80(.89)$; $M(SD)_{competent} = 4.15(.78)$) than a funny ad ($M(SD)_{warm} = 3.49(.93)$; $M(SD)_{competent} = 3.53(.97)$), both ts > 3.59, ps < .001. Using a clever ad did not boost perceptions of competence over the serious ad ($M(SD) = 4.09(.73)$), $t(591) = .72$, $p = .47$, but it did confer more warmth than the serious ad ($M(SD) = 3.64(.88)$), $t(591) = 1.95$, $p = .05$. Perceptions of warmth, $ab[95CI] = .12[.05, .21]$, and competence, $ab[95CI] = .49[.34, .66]$, mediated the effect of clever (vs. funny) humor on brand attitude.

Experiment 2 replicated this effect using a wider variety of advertisements and a correlational design. Participants ($N = 932$; MTurk) watched one of a possible 30 ads from the brands Smart Car ($n = 10$), FirstBank ($n = 10$) and T-mobile ($n = 10$). Immediately after viewing the ad, participants rated the ad on how clever and funny it was. Next, they rated the extent to which the advertisement made the brand seem warm and competent, and then provided their brand attitude. All the analyses reported below control for ad dummies and funniness of the advertisement. In a hierarchical regression, the cleverness of the advertisements was a positive predictor of both warmth, $\beta = .43$, $p < .001$, and competence, $\beta = .54$, $p < .001$. Ad cleverness explained additional variance in both warmth, $\Delta R^2 = .09$, $F(1, 900) = 139.10$, $p < .001$, and competence, $\Delta R^2 = .14$, $F(1, 900) = 222.79$, $p < .001$, above that explained by ad dummies and funniness. Warmth, $ab[95CI] = .12[.08, .16]$, and competence, $ab[95CI] = .14[.09, .18]$, again mediated the relationship between cleverness and brand attitude.

Experiment 3 tested whether the effect of clever advertisements is moderated by self-brand connection. We reasoned that consumers who already feel connected to a brand would be less affected by clever humor than consumers who have not yet formed a connection to the brand. Participants ($N = 673$; MTurk) completed a very similar procedure to Study 2 with the following changes. First, participants viewed a subset of ads from Study 2: Smart Car ($n = 6$), T-mobile ($n = 6$) or First Bank ($n = 6$). Second, immediately after completing the funniness and cleverness ratings, all participants completed the measure of self-brand connection from Escalas & Bettman (2015). All the analyses reported below control for ad dummies, self-brand connection, and funniness of the advertisement. In a hierarchical linear regression, cleverness was a significant predictor of warmth ($\beta = .36$, $p < .001$) and competence ($\beta = .53$, $p < .001$). Importantly, we also observed the expected interaction between cleverness and self-brand connection on both warmth ($\beta = -.35$, $p = .01$) and competence ($\beta = -.49$, $p < .001$). The effect of cleverness on warmth and competence was stronger when participants were low in self-brand connection than when they were high. In a moderated mediation model, the indirect effect of cleverness on brand attitude via warmth and competence was weaker at high levels of self-brand connection.

In summary, three experiments demonstrate that consumers have more favorable brand attitudes for brands that use clever humor compared to non-clever humor or serious advertisements. This occurs because using clever humor makes a brand seem warmer and more competent. This research advances understanding of humor in advertising and sheds light on how specific forms of humor might be more effective than others. Our findings have implications for marketers looking to break through a media market that is saturated with humorous advertising.

How Different Types of Humor in Advertising Shape Impressions of Firms' Competence and Warmth

EXTENDED ABSTRACT

Humor is a common executional tactic in advertising (Eisend 2009). Given that humor affects impression formation in inter-individual settings (Greengross, Martin, and Miller 2012), we propose that humor influences the impressions that consumers form of companies that use humor in their advertising. Furthermore, we argue that although observing humor in advertising influences both warmth and competence impressions, the two impression types are affected differently by different humor executions.

Prior research has identified three humor processes that can elicit laughter; namely incongruity-resolution, tension-relief, and hu-

morous disparagement (Speck 1991). Incongruity-resolution represents a humor process in which perceivers first experience something surprising, peculiar, or unusual and later are able to resolve it. This process is characteristic of humor forms such as puns, punch lines, or comic irony. Both the production and the appreciation of incongruity require qualities such as intelligence, creativity, and linguistic skills (to a larger extent than other humor types). We thus predict that incongruous humor, once understood, triggers impressions of advertisers' competence. Tension-relief, on the other hand, occurs when perceivers experience relief from some kind of strain and burst into laughter as a way to dissipate nervous energy. During a tension-relief episode, perceivers form empathetic bonding with people (or personified creatures) associated with the experience (Speck 1991). We predict that this positive affect can be transferred to improve impressions of advertisers' warmth, but not competence. Lastly, humorous disparagement mostly harms (rather than improves) impressions of firms' warmth and competence, since it may imply unjust ridicule and ignorance of social boundaries (i.e. other-disparagement) or draw attention to the deprecators' real weaknesses (i.e. self-disparagement) (Greengross and Miller 2008). To test our hypotheses, we conducted a correlational study and a follow-up experiment.

Study 1 ($N = 5768$) is a large-scale correlational study examining the relationships between the four humor executions and participants' impressions of advertisers using them. In order to provide a managerially relevant test of our predictions, we collected 300 ads from 65 major U.S. magazines and two open databases (*theadcollection.tumblr.com* and *adoftheworld.com*). We distributed these ads to thirteen groups of Amazon Mechanical Turk workers; each group of workers rated a subset of the ads on a different variable. Specifically, a group of raters evaluated the ads in terms of either (1) the extent to which the ads used each of the four humor executions, (2) impressions about the advertisers' competence and warmth, or (3) several control variables. The results indicated that incongruity-resolution humor is the only humor execution that specifically enhances consumers' perception of advertising firms' competence, tension-relief humor is the only humor execution that enhanced impressions of firms' warmth. Meanwhile, both self- and other-disparagement had negative effects on impression of firms' competence, and other-disparagement also negatively influenced impression of firms' warmth. We obtained the same patterns of the results when using different operationalizations of firms' warmth and competence.

A potential alternative explanation for the correlational findings of Study 1 is that competent firms selectively use humorous incongruity, and warm firms selectively use arousal-safety humor in their ads (rather than these humor types triggering impressions of firms' competence and warmth, respectively). To test this explanation, Study 2 ($N = 348$) used an experimental approach, contrasting the effects of four groups of humorous ads against a group of control ads, while controlling for the baseline perception of firms. Furthermore, in Study 2, we aimed to demonstrate downstream consequences of humor types (i.e., likelihood to invest in a competent firm versus perception of a warm firm's corporate social responsibility) beyond the effects of humor on impressions of firms' competence and warmth. Regarding the effects of humor types on impressions of firms' competence, the results showed that incongruity-resolution humor is the only humor type that enhanced impressions of firms' competence, corroborating the results from Study 1. Furthermore, incongruity-resolution humor is also the only humor type that significantly increased participants' likelihood to invest in the advertising firms and participants' expected return-on-investment when investing in the firms (competence-related downstream consequences). Regarding the effects of humor types on impressions of firms' warmth, we

found that only other-disparagement had a significant and negative effect on impression of firms' warmth, while other types of humor did not significantly influence impression of firms' warmth, partially confirming the results from Study 1. However, none of the humor types significantly influenced warmth-related downstream consequences such as perception of firms' commitment to corporate social responsibility activities or the expected percentage of the firms' profit contributed to these activities.

We also conducted a supplementary study ($N = 301$) to test a competence projection process as a potential driver of the effect of incongruity-resolution on perception of firms' competence. Extant research supports that appreciation of humor, especially incongruity-based humor, signals similarity between the perceivers and the source of humor (Flamson and Barrett 2008). On one hand, similarity is an antecedent of projection, the act of introspecting one's own qualities and ascribing them to others (Ames 2004). On the other hand, resolution of incongruity may signal to the perceivers their mastery of competent skills such as flexible thinking and problem solving (Martin 2010). We thus proposed that perceivers, while resolving and appreciating incongruity-based humor, may project their perceived self-competence to the advertisers. To test this process, each participant in the study evaluated one ad (incongruous or congruous) on the measures of incongruity, resolution, advertiser competence, self-perception of competence, and perceived self-advertiser similarity. We then ran a serial mediation model where incongruity-and-resolution was the independent variable, advertiser competence is the dependent variable, while self-perception of competence and perceived self-advertiser similarity were the two mediators. The results confirmed significant serial mediation, and thus supported the proposed process.

Across a correlational study and an experiment, this research documents that incongruity-resolution humor is the only humor execution that enhances impression of firms' competence and increases people's likelihood to invest in the firms as a downstream consequence. The effects of the humor types on impressions of firms' warmth, however, turned out to be less robust and less likely to carry over to subsequent behaviors such as perceived firms' commitment to CSR.

Humor Makes Consumers More Likely to Share Negative Content, But Not Positive Content

EXTENDED ABSTRACT

Consumers regularly share content with one another online (Chen and Xie 2008; Wojnicki and Godes 2008). Firms benefit from this. Consumers who hear about a website or service from others are more likely to visit the website (Godes and Mayzlin 2009). Increasingly, firms have been turning to a new tool to encourage consumers to share: comedy. In 2016, Taco Bell launched a humorous selfie lens that allowed consumers to superimpose a picture of their face onto a taco shell. 224 million people shared the taco-face-lens. Anecdotal examples aside, data on the relationship between comedy and sharing, does not consistently support the intuition that humor increases sharing. Although some studies suggest that consumers are more likely to share humorous content (Tellis et al. 2019), others do not (Bussiere 2009).

Why and when are consumers more likely to share humorous content over non-humors content? Consumers are more likely to share content that they think will make them look good (Berger 2014). Given this, the effect of humor on sharing should depend on whether consumers believe that making their post humorous will help them make a favorable impression. Generally, consumers be-

lieve that they can make a more favorable impression by posting content with a positive valence (East, Hammond, and Wright 2007) positive word of mouth (PWOM. Humor, interestingly, does not necessarily make content more positive (Warren, Barsky, and McGraw 2018). Consumers perceive that something is humorous when it threatens their well-being, identity, or normative belief structure (i.e., a violation appraisal), but the threat seems harmless, acceptable, or inconsequential (i.e., benign appraisal; McGraw and Warren 2010). Whether the addition of humor makes something more positive or more negative thus depends on whether it is created by making an existing threat (i.e., violation) seem more benign or by adding a violation to an otherwise benign situation. For example, humor makes complaints more positive but praise more negative (McGraw et al. 2013). Similarly, comedy reliably lifts people's mood when they are coping with a negative experience but not when everything is rosy (Warren et al. 2018). We consequently hypothesize that the effect of humor on sharing will depend on the initial valence of the content. Adding humor to negative content (e.g., an unattractive photograph or embarrassing memory) will make consumers more likely to share it, but adding humor to positive content (e.g., an attractive photograph or happy memory) will make consumers less likely to share it.

Our first two studies tested this hypothesis using 2 (humor: humorous, serious) × 2 (valence: positive, negative) between-subjects experiments. In study 1a ($N = 180$), participants recalled either a positive or a negative memory. Orthogonally, they described this memory in either a humorous or a serious tone. In study 1b ($N = 299$), participants found either an attractive or unattractive photograph. Orthogonally, they augmented the photograph using either a humorous or serious filter. Consistent with our prediction, adding humor made participants more likely to share both negative memories ($M = 2.13$ vs. 1.42; $p = .05$) and unattractive photographs ($M = 3.3$ vs. 2.68; $p = .079$). Conversely, adding humor did not make participants more likely to share the happy story ($M = 2.13$ vs. 2.52; $p < .28$), and it made them less likely to share the attractive photograph ($M = 3.73$ vs. 4.63; $p = .007$).

Study 2 tested whether our focal effect would depend on whether participants planned to share the content in a public post or private message. If participants are more likely to share humorous negative content because it helps them make a positive impression, then this effect should be stronger when they share the content with the general public, where making a good impression is more important, rather than in a private message (Barasch and Berger 2014). The study ($N = 227$) used a 2 (humor: humorous, serious) × 3 (emotion: embarrassment, sad, happy) between-subjects design while measuring intention to share the content both in public and in a private message. Participants recalled an event in which they felt either happy, sad, or embarrassed. Some of the participants described this event in a humorous tone whereas others described it in a serious tone. Subsequently, participants indicated their likelihood of sharing what they wrote as either a public post or a private message. We found that participants were more likely to share sad and embarrassing memories when they described them using a humorous rather than serious tone ($M = 3.41$ vs. 2.14; $p < .01$). Conversely, they were equally likely to share the happy story regardless the tone ($M = 3.33$ vs. 3.23; $p < .83$). Humor had no effect on likelihood of sharing a private message (all effects NS).

Study 3 further explored the process by asking undergraduate students ($N = 316$) to complete a 2 (humor: humorous, serious) x 2 (valence: positive, negative) between-subjects experiment. Participants were asked to imagine sharing a picture of either a successful or a failed (burnt) beef brisket along with either a humorous

("cooking was so fabulous even the smoke alarm was cheering me") or a serious caption ("my homemade brisket"). Participants also answered how posting the image with the caption would make them look to others on a scale from 1 (terrible) to 7 (great). Consistent with the previous studies, participants were more likely to share the burnt brisket picture with humorous than a serious caption (*M* = 3.68 vs. 2.90.; *p* = .03), but they were equally likely to share the successful beef brisket regardless of whether they used a humorous or serious caption (*M* = 4.37 vs. 4.08; *p* <. 43). The expected impression mediated the effect humor on intention to share (*ab* = 1.19, *CI* [.418, 1.956]).

In sum, whether humor increases the likelihood that consumers share memories, stories, and images online depends on whether the content is positive or negative. Humor makes it easier to share embarrassing, sad, and otherwise negative experiences, but it is does not make consumers more likely to share happy, triumphant, or otherwise positive experiences.

How Power Influences the Use of Humor

EXTENDED ABSTRACT

Humor profoundly influences interpersonal perception and behavior. In hierarchical relationships, low power individuals have less control over the situation and are more dependent upon individuals with greater power. This relative lack of control can lead to greater stress and anxiety (Dacher, Gruenfeld, and Anderson 2003) and can motivate low power individuals to engage in ingratiatory behaviors to elevate their position in the hierarchy (Judge and Bretz 1994; Magee and Galinksy 2008; Watt 1993). Recent studies have found that the use of humor by low power individuals can be an effective method of emotional regulation and dealing with stress (Lefcourt and Martin 2012; Samson et al. 2014; Samson and Gross 2012), a means of promoting liking and interpersonal bonding (Cooper, Kong, and Crossley 2018), and a tool for elevating status (Bitterly et al. 2016).

Despite the stress reducing, ingratiation promoting, and status enhancing benefits of humor, low power individuals may be less likely to utilize humor (Blader and Chen 2012; Blader, Shirako, and Chen 2016; Galinksy, Rucker, and Magee 2015; Magee and Galinksy 2008)and thus significant questions remain about differences in how status and power impact social encounters. We conducted 5 studies to address this gap. In particular, these studies tested the prediction that status and power would have opposing effects on justice enacted toward others. In the first 3 studies, we directly compared the effects of status and power on people's enactment of distributive (Study 1. Several studies have shown that, compared to high power individuals, low power individuals dedicate more cognitive resources attending to factors such as risks, potential threats, and the thoughts and emotions of others (Blader et al. 2016; Dacher et al. 2003; Smith et al. 2008)prompting considerable research attention to this issue. However, prior research has primarily examined how power affects perspective taking, and has neglected to investigate the impact of status (i.e., the respect and esteem that an individual holds in the eyes of others, which causes low power individuals to experience greater cognitive load. Therefore, low power individuals find themselves in a quagmire: Humor offers particularly important benefits to individuals who lack power (to navigate the challenges of having low power and to gain power), but the lack of power could make these same individuals less able to *use* humor. Little theory and research exist to shed light on the factors that influence whether low power individuals use humor, and the research that does exist presents equivocal findings (Coser 1960; Lundberg 1969; Vinton 1989).

In the current research, we examine the relationship between power and the use of humor using field data involving 73,620 corporate email messages in addition to experimental studies that replicate the key finding linking interpersonal power with the use of humor. This research offers three key theoretical contributions to research on social hierarchy, power, and humor. First, this work demonstrates that humor pervades communication, which makes understanding humor necessary for understanding interpersonal interactions in the social hierarchy. Second, this research introduces power as an important, but neglected, antecedent for the ability to use humor. Although humor has intrapsychic (e.g., stress reduction) and interpersonal (e.g., ingratiation, elevated status) benefits which make using it particularly attractive for low power individuals, we find that occupying a position of low power makes individuals less able to use it. Third, we provide a novel explanation of why humor use varies across the hierarchy. We show that low power individuals experience greater cognitive load in interactions vis-à-vis a high power individual, which impedes their concentration and, therefore, their ability to generate humor. Together, these contributions enrich our understanding of the interplay between power and humor and show that the two constructs are intricately tied.

Study 1: A Field Study of Power and Humor

In Study 1, we examine the relationship between power and humor using field data; the Enron Email Corpus (Cohen 2015). We gathered hierarchical information on the individuals in the dataset and grouped them according to whether they fell at the bottom (low power) or top of the hierarchy (high power). Then, we examined how the use of humor in emails related to the power level of the sender.

Results

We find that humor is common in communication, occurring in 8.86% of sent emails. We found a significant effect of power on the use of humor, $\chi^2(1) = 13.05$, $p < .001$. We found that the use of humor was significantly lower for low power individuals (7.04%) than high power individuals (9.54%), $\beta = .63$, $p < .001$. The effect of power on the use of humor remained significant, $\beta = .47$, $p = .025$, when we control for the gender of the sender, $\beta = .30$, $p = .153$.

Study 2: Power and Humor in the Laboratory

We recruited 265 adults to participate in a behavioral lab study in exchange for $10.00. We randomly assigned participants to one of two between-subjects conditions: *High Power* vs. *Low Power*. After participants were assigned to their condition, we informed them that they would be sharing jokes with their partner. We gave participants 5 minutes to brainstorm jokes. Next, we gave participants 5 minutes to write their final list of jokes, which served as our primary dependent variable.

Results

We find a significant effect of the manipulation on the number of jokes that individuals wrote to share with their partner, $F(1, 16) = 16.93$, $p < .001$, $\eta^2 = .04$. Individuals assigned to the high power condition (*M* = 3.40, *SD* = 1.56) created significantly more jokes to share with their partner than individuals assigned to the low power condition (*M* = 2.78, *SD* = 1.56), $t(16) = 4.11$, $p < .001$.

We find evidence that participants in the low power condition were less able to think of jokes. We find that cognitive load mediates the effect of power on the use of humor, but we do not find that impression management concerns or confidence mediate the effect of power on humor. Using bootstrap analysis with 5000 simulations (Preacher and Hayes 2004, 2008), we find a significant indirect effect for cognitive load (*IE* = .07, bias adjusted 95% confidence interval =

[.01, .20]), but insignificant indirect effects for both impression management concerns (*IE* = -.01, bias adjusted 95% confidence interval = [-.07, .01]) and confidence (*IE* = .00, bias adjusted 95% confidence interval = [-.01, .07]).

Conclusion

In this work, we find that humor pervades communication and is intrinsically connected to power. Although individuals at the bottom of the hierarch have much to gain from using humor, they are less able to use it. Thus, being powerless is a truly serious position

REFERENCES

Ace Metrix (2020), *Super Bowl LIV Post-Game Ad Wrap-Up*.

Ames, Daniel R. (2004), "Strategies for Social Inference: A Similarity Contingency Model of Projection and Stereotyping in Attribute Prevalence Estimates," *Journal of Personality and Social Psychology*, 87(5), 573–85.

Barasch, Alixandra and Jonah A Berger (2014), "Broadcasting and Narrowcasting: How Audience Size Affects What People Share," *Journal of Marketing Research*, 51(3), 286–99, http://journals.ama.org/doi/abs/10.1509/jmr.13.0238.

Berger, Jonah A (2014), "Word of Mouth and Interpersonal Communication: A Review and Directions for Future Research.," *Journal of Consumer Psychology (Elsevier Science)*, 24(4), 586–607.

Bitterly, T. Bradford and Maurice E. Schweitzer (2019), "The Impression Management Benefits of Humorous Self-Disclosures: How Humor Influences Perceptions of Veracity," *Organizational Behavior and Human Decision Processes*, 151(January), 73–89, https://doi.org/10.1016/j.obhdp.2019.01.005.

Bitterly, T Bradford, Alison Wood Brooks, and Maurice E Schweitzer (2016), "Risky Business: When Humor Increases and Decreases Status," *Journal of Personality and Social Psychology*, 112(3), 431–55.

Blader, Steven L. and Ya Ru Chen (2012), "Differentiating the Effects of Status and Power: A Justice Perspective," *Journal of Personality and Social Psychology*, 102(5), 994–1014.

Blader, Steven L., Aiwa Shirako, and Ya Ru Chen (2016), "Looking Out From the Top: Differential Effects of Status and Power on Perspective Taking," *Personality and Social Psychology Bulletin*, 42(6), 723–37.

Burro, Roberto, Carla Canestrari, Ugo Savardi, Erika Branchini, and Ivana Bianchi (2018), "Pleasures of the Mind: What Makes Jokes and Insight Problems Enjoyable," *Frontiers in Psychology*, 8(January), 1–21.

Bussiere, Dave (2009), "The Effects of Humor on the Processing of Word-Of-Mouth," in *Advances in Consumer Research*, ed. Ann L. McGill and Sharon Shavitt, Duluth, MN, 399–404.

Chen, Yubo and Jinhong Xie (2008), "Online Consumer Review: Word-of-Mouth as a New Element of Marketing Communication Mix," *Management Science*, 54(3), 477–91.

Cohen, William W (2015), "Enron Email Dataset."

Cooper, Cecily D, Dejun Tony Kong, and Craig D Crossley (2018), "Leader Humor As an Interpersonal Resource: Integrating Three Theoretical Perspectives," *Academy of Management Journal*, 61(2), 769–96.

Coser, Rose Laub (1960), "Laughter among Colleagues. A Study of the Social Functions of Humor among the Staff of a Mental Hospital.," *Psychiatry*, 23, 81–95.

Craik, Kenneth H., Martin D. Lampert, and Arvalea J. Nelson (1996), "Sense of Humor and Styles of Everyday Humorous Conduct," *Humor*, 9(3), 273–302.

Dacher, Keltner, Deborah. H. Gruenfeld, and Cameron Anderson (2003), "Power, Approach and Inibition," *Psychological Review*, 110(2), 265–84.

Didonato, Theresa E., Mellisha C. Bedminster, and Joanna J. Machel (2013), "My Funny Valentine: How Humor Styles Affect Romantic Interest," *Personal Relationships*, 20(2), 374–90.

East, Robert, Kathy Hammond, and Malcolm Wright (2007), "The Relative Incidence of Positive and Negative Word of Mouth: A Multi-Category Study," *International Journal of Research in Marketing*, 24(2), 175–84.

Eisend, Martin (2009), "A Meta-Analysis of Humor in Advertising," *Journal of the Academy of Marketing Science*, 37(2), 191–203.

Escalas, Jennifer Edson and James R Bettman (2015), "Managing Brand Meaning through Celebrity Endorsement," *European Journal of Marketing*, 4512(11), 882–909.

Flamson, Thomas and H. Clark Barrett (2008), "The Encryption Theory of Humor: A Knowledge-Based Mechanism of Honest Signaling," *Journal of Evolutionary Psychology*, 6(4), 261–81.

Fraley, Barbara and Arthur Aron (2004), "The Effect of a Shared Humorous Experience on Closeness in Initial Encounters," *Personal Relationships*, 11(1), 61–78.

Galinksy, Adam D., Derek D Rucker, and Joe C Magee (2015), "Power: Past Findings, Present Considerations, and Future Directions," in *APA Handbook of Personality and Social Psychology, Vol. 3. Interpersonal Relations*, Washington, DC: American Psychological Association, 421–60.

Godes, David and Dina Mayzlin (2009), "Firm-Created Word-of-Mouth Communication: Evidence from a Field Test," *Marketing Science*, 28(4), 721–39.

Greengross, Gil, Rod a. Martin, and Geoffrey Miller (2012), "Personality Traits, Intelligence, Humor Styles, and Humor Production Ability of Professional Stand-up Comedians Compared to College Students.," *Psychology of Aesthetics, Creativity, and the Arts*, 6(1), 74–82.

Greengross, Gil and Geoffrey F. Miller (2008), "Dissing Oneself versus Dissing Rivals: Effects of Status, Personality, and Sex on the Short-Term and Long-Term Attractiveness of Self-Deprecating and Other-Deprecating Humor," *Evolutionary Psychology*, 6(3), 393–408.

Hall, Jeffrey A. and Ken Sereno (2010), "Offensive Jokes: How Do They Impact Long-Term Relationships?," *Humor*, 23(3), 351–73.

Judge, Timothy A. and Robert D. Bretz (1994), "Political Influence Behavior and Career Success," *Journal of Management*, 20(1), 43–65.

Kervyn, Nicolas, Susan T. Fiske, and Chris Malone (2012), "Brands as Intentional Agents Framework: How Perceived Intentions and Ability Can Map Brand Perception," *Journal of Consumer Psychology*, 22(2), 166–76.

Lefcourt, Herbert M and Rod A Martin (2012), *Humor and Life Stress: Antidote to Adversity*, Springer Science & Business Media.

Lundberg, Craig (1969), "Person-Focused Joking: Pattern and Function," *Human Organization*, 28(1), 22–28.

Magee, Joe C and Adam D. Galinksy (2008), "Social Hierarchy: The Self-Reinforcing Nature of Power and Status," *Academy of Management Annals*, 2(1), 351–98.

Martin, Rod A. (2007), "The Social Psychology of Humor," *The Psychology of Humor*, 113–52.

Martin, Rod A (2010), *The Psychology of Humor: An Integrative Approach*, Academic Press.

Martin, Rod A, Patricia Puhlik-Doris, Gwen Larsen, Jeanette Gray, and Kelly Weir (2003), "Individual Differences in Uses of Humor and Their Relation to Psychological Well-Being: Development of the Humor Styles Questionnaire," *Journal of Research in Personality*, 37, 48–75.

Matz, Sandra C, Cristina Segalin, David Stillwell, Sandrine R. Müller, and Maarten W. Bos (2019), "Predicting the Personal Appeal of Marketing Images Using Computational Methods," *Journal of Consumer Psychology*, 29, 370–90.

McGraw, A. Peter, Julie Schiro, and Philip Fernbach (2015), "Not a Problem: A Downside of Humorous Appeals," *Journal of Marketing Behavior*, 1, 187–208.

McGraw, A. Peter and Caleb Warren (2010), "Benign Violations: Making Immoral Behavior Funny," *Psychological Science*, 21(8), 1141–49.

McGraw, A. Peter, Caleb Warren, and Christina Kan (2013), "Humorous Complaining," *Journal of Consumer Research*, 35(2), 268–78.

McQuarrie, Edward F. and David Glen Mick (1996), "Figures of Rhetoric in Advertising Language," *Journal of Consumer Research*, 22(4), 424.

Preacher, Kristopher J and Andrew F Hayes (2008), "Assessing Mediation in Communication Research," in *The Sage Sourcebook of Advanced Data Analysis Methods for Communication Research*, London, UK: Sage Publications, 13–54.

——— (2004), "SPSS and SAS Procedures for Estimating Indirect Effects in Simple Mediation Models," *Behavior Research Methods, Instruments, & Computers*, 36(4), 717–31.

Samson, Andrea C., Alana L. Glassco, Ihno A. Lee, and James J. Gross (2014), "Humorous Coping and Serious Reappraisal: Short-Term and Longer-Term Effects," *Europe's Journal of Psychology*, 10(3), 571–81.

Samson, Andrea C. and James J. Gross (2012), "Humour as Emotion Regulation: The Differential Consequences of Negative versus Positive Humour," *Cognition and Emotion*, 26(2), 375–84.

Smith, Pamela K., Nils B. Jostmann, Adam D. Galinsky, and Wilco W. Van Dijk (2008), "Lacking Power Impairs Executive Functions: Research Article," *Psychological Science*, 19(5), 441–47.

Speck, Surgi Paul (1991), "The Humorous Message Taxonomy: A Framework for the Study of Humorous Ads," *Current Issues and Research in Advertising*, 13(1–2), 1–44.

Spotts, Harlan E., Marc G. Weinberger, and Amy L. Parsons (1997), "Assessing the Use and Impact of Humor on Advertising Effectiveness: A Contingency Approach," *Journal of Advertising*, 26(3), 17–32.

Tellis, Gerard J., Deborah J. MacInnis, Seshadri Tirunillai, and Yanwei Zhang (2019), "What Drives Virality (Sharing) of Online Digital Content? The Critical Role of Information, Emotion, and Brand Prominence," *Journal of Marketing*, 83(4), 1–20.

Vinton, Karen L. (1989), "Humor in the Workplace: It Is More Than Telling Jokes," *Small Group Research*, 20(2), 151–66.

Warren, Caleb, Adam Barsky, and A. Peter McGraw (2018), "Humor, Comedy, and Consumer Behavior," *Journal of Consumer Research*, 45(March), 1–74.

Warren, Caleb and A. Peter McGraw (2016a), "Differentiating What Is Humorous from What Is Not," *Journal of Personality and Social Psychology*, 110(3), 407–30.

——— (2016b), "When Does Humorous Marketing Hurt Brands?," *Journal of Marketing Behavior*, 2(1), 39–67.

Watt, John D (1993), "The Impact of the Frequency of Ingratiation on the Performance Evaluation of Bank Personnel," *Journal of psychology*, 127(2), 117–25.

Wojnicki, Andrea C and David Godes (2008), *Word of Mouth as Self-Enhancement*.

Toward a Further Understanding of How Political Ideology Drives Motivation and Values

Chairs: Der-Wei Huang, Indiana University, USA
Adam Duhachek, University of Illinois at Chicago, USA

Paper #1: Are Conservatives Always More Averse to Change than Liberals? Political Ideology and Innovation

Der-Wei Huang, Indiana University, USA
Adam Duhachek, University of Illinois at Chicago, USA

Paper #2: The Impact of Political Ideology on Self-Control

Bryan M. Buechner, Xavier University, USA
Joshua J. Clarkson, University of Cincinnati, USA
Ashley S. Otto, Baylor University, USA
Edward R. Hirt, Indiana University, USA
Ming-Shen Ho, Clemson University, USA

Paper #3: Fair or not? Political Ideology Shapers Observers' Responses to Service Failures

Chethana Achar, Northwestern University, USA
Nidhi Agrawal, University of Washington, USA

Paper #4: Political Polarization in How Perceived Social Similarity Impacts Support for Redistribution

Nailya Ordabayeva, Boston College, USA

SESSION OVERVIEW

Emerging research on political ideology has shown that conservatives' and liberals' motivation and values affect their preferences in the marketplace. The theoretical foundations for these ideological differences have related to distinct motivational and value systems that distinguish liberals and conservatives. One such difference that has garnered significant theoretical and empirical support relates to openness and preference for change, with numerous empirical studies showing liberals are more open to and have an innate relative preference for change as compared to conservatives. These change preferences have manifest in a number of different domains from support for social and government institutions, political attitudes and consumer preferences. The current session also builds on another cornerstone of theory related to political ideology by examining differences in the justification of economic inequality of liberals and conservatives' behaviors. Previous research has shown that perceiving high (vs. low) similarity can potentially increase support for redistribution, because it may lead individuals to question the fairness of people's unequal outcomes and boost their group loyalty. Research has shown that this perceived similarity shapes opinions related to support for social programs and the role of government assistance. The current session advances extant understanding of these issues by revealing that political ideology's influence on these motivations and values leads to wide-ranging effects on mainstream consumer behavior research areas, such as service failure.

The first paper shows that conservatives and liberals experience change differently. In the context of new product innovations, conservatives' greater sensitivity toward change may lead them to believe a new product innovation is more significant and beneficial as compared to liberals. The authors also show that conservatives and liberals will assimilate or contrast their evaluations of new products when making comparisons between past and future products. although conservatives are more likely to perceive innovation-related changes in secondary product features as compared to liberals who focus more on primary product features, and how ideology affects evaluation of innovation on the time frame.

The second paper sheds light on the cognitive processes enacted by liberals and conservatives as they experience changes while performing a task. The authors investigate performance on tasks as a function of the variability of the attentional foci associated with task performance. They find that liberals perform better on tasks that require varying attentional foci whereas conservatives perform better at tasks requiring a stable attentional focus. Variable attention is useful in contexts where consumers need to learn new skills whereas stable and constant attention is useful in contexts where consumers need perseverance, such as goal striving and habit formation.

The third paper examines how ideology influences reactions to service failure and implicates the role of moral violations related to fairness. Their findings show that liberal consumers are likely to respond more negatively to brands involved in a service failure due to their greater sensitivity to violations of the fairness moral foundation. They find liberals were more likely to express negative emotions on Twitter in response to a well-publicized airline service failure. They also find convergent laboratory support using service failure vignettes and show that these ideological differences are driven by differential activation of the fairness moral foundation in response to the failure.

The fourth paper shows that ideology drives different justification of unequal outcomes depending on perceived social similarity. They found that perceiving high (vs. low) social similarity increases redistribution support among liberals, but decreases redistribution support among conservatives, because it weakens liberals', but strengthens conservatives', belief that individuals deserve their unequal outcomes.

This session presents research that together examine how conservatives' and liberals' preferences related to key motivations and moral values influence a variety of consumer behaviors. The papers build theory linking political ideology and behavior and share a common focus on underlying motivational and value-based differences as a function of ideology.

Are Conservatives Always More Averse to Change than Liberals? Political Ideology and Innovation

EXTENDED ABSTRACT

Previous research has shown that political ideology is at the heart of a variety of cognitive and motivational differences. One of the most frequently reported distinctions relates to openness to change. Research has shown liberals possess a greater tolerance to change and are more open to new experiences. Previous consumer research has shown how these underlying ideological influences affect consumption. For instance, Khan et al. (2013) find that conservative consumers were less likely to adopt new products as compared to liberal consumers. Barra (2014) finds that this effect on new products is enhanced when products are more novel and when consumer's political ideology is more central to their self-concept.

The current research theorizes that not all change is equivalent and that liberals and conservatives may experience change differently. One hypothesis we propose is that conservatives' greater sensitivity to change may have positive consequences in the context of new product innovation. Specifically, we theorize that new product innovations may be seen as more significant and beneficial to conservatives as their greater sensitivity to change makes these differences seem more consequential as compared to liberals. Additionally, we theorize that a greater sensitivity to changes in product features may

lead to conservatives' and liberals' different evaluations of abrupt and gradual product innovations.

The literature on product innovation has identified speed of change as a key underlying dimension along which innovations are evaluated. Product innovations can happen abruptly or they can occur more gradually (Garcia & Calantone, 2002) Based on this notion, we define abrupt changes in innovation as changes that enter the market immediately, and alter technological deliveries of products; whereas incremental changes in innovation are changes that take place gradually and in a less significant way. We theorize that conservatives will prefer gradual changes as compared to liberals, whose inherent preferences for change will lead them to prefer abrupt product innovations.

Further, consumers perceive change differently when comparing to the past or the future. We theorize that conservatives will perceive changes in products similarly in the past and future, whereas liberals generate more positive attitude toward changes in the future (vs. past), due to their openness to change and belief that future change will eclipse past change as part of a progressive belief system. We theorize that the differential evaluations of past and future product innovations is due to distinct assimilation and contrast effects activated as a function of political ideology.

As denoted by a large body of consumer research, consumer judgments and behaviors are influenced by the context they are in (Bless and Schwarz 2010). Past research on assimilation and contrast shows that contextual influences can alter target judgments and related behaviors. It is well-documented that product information, whether being numeric (e.g. price) or semantic (e.g. vice or virtue products), learned before to evaluating a product can affect consumer judgment (Chernev 2011; Makens 1965; Plassmann et al. 2008). An assimilation effect typically takes place when consumers integrate prior product information to their judgment of a subsequent product.

However, it is not always the case that consumers assimilate prior product evaluation with subsequent products. Sometimes, consumers evaluate the same product more negatively when the product information is favorable compared to when it is unfavorable, which is known as the contrast effect.

Conservatives has been shown in psychology and consumer research to be referencing the past to a greater extent than future (Robinson et al., 2015). More recently, Lammers and Baldwin (2018) shows that conservatives are prone to past and nostalgic society, resulting in their support for political ideas that can be linked to a desirable past state, rather than a desirable future state of society. Building on their findings, the current research examines how their characteristic of past/ future-orientation affect how consumers with different political ideology evaluate past/ new products differently. Specifically, we show that the past and nostalgic taste of a product leads to conservatives' assimilation effect of converging their evaluations of past and new products.

Study 1: This study was conducted around the time that iPhone X was launched, and we recruited 541 Mturk participants. Participants were asked of the perceived change of features of the new iPhone on a 7-point Likert scale. Perceived change of the features are converted into one index, which is our dependent measure. Sample features include, "battery life and charging", and "camera". Political ideology is measured on an 11-point Likert scale adopted from Jost (2007). The result shows that conservatives (vs liberals) notice more change than the liberals ($p = 0.0162$). Specifically, as the features measured in this study are mostly secondary features.

Study 2: In Study 2, we further examine if conservatives prefer changes that are secondary We randomly assigned 202 Mturk participants to one of the conditions of a 2 (features: primary, secondary) between subject design, where their political ideology was measured. Our dependent measure was perceived change, and the result indicated that conservatives (vs. liberals) notice the change in secondary features more ($p = 0.0061$). Primary and secondary features were determined by a pilot study where one hundred participants were recruited to rate which features of a smartphone are primary and secondary. In Study 2, we replicated our results in Study 1, where we show that conservatives notice small changes more than liberals. Moreover, the two-way interaction between political ideology and feature type still remains significant after controlling for brand liking and product liking ($p = 0.0197$).

Thus, Study 1 & 2 showed that depending on consumer's political ideology, different types of changes in features will change consumer's perceptions of the innovations. Namely, we show that conservatives are sensitive to small changes more than liberals do.

Study 3: In Study 3, we examine how different types of innovations will affect consumer's attitude toward innovations. We randomly assigned 200 participants to one of the conditions in a 2 (innovation type: abrupt, gradual) between subject design, where their political ideology was measured. The dependent measures in this study are likelihood of early adoption, and innovation liking. Participants read a passage about an update of their operating system, which is either an abrupt or gradual innovation. As hypothesized, a two-way interaction shows that conservatives (vs. liberals) are more likely to engage in early adoption of the new operating system in the gradual innovation condition (vs. abrupt) ($p = 0.0489$), and they like the innovation more in the gradual (vs. abrupt) innovation condition ($p = 0.0218$).

Thus, Study 3 showed that when the changes are gradual, conservatives, instead of being resistant to changes as suggested in prior research, they like the gradual innovation more than liberals, and are willing to engage in early adoption.

Study 4: In Study 4, 300 participants were randomly assigned to one of the conditions in a 2 (innovation type: innovative, non-innovative) mixed subject design, where each participant rated their perceptions of each product by comparing them to the past and future. The dependent measures composed of items that asked participants about their perceptions of change of eight types of products (four innovative, four non-innovative). Participants first rated the products by comparing the products' performance ten years in the past to present performance, and then they rated the same products by estimating their future performance in ten years compared to present performance. As a mixed model analysis shows, a significant three-way interaction ($p = 0.0004$) shows that liberals evaluate product performance in the past (vs. future) more negatively, and that conservatives evaluate performance similarly when comparing the current product to the past and future. Specifically, we found that this significance holds only for innovative products ($p < 0.0001$). This effect does not hold when the product is non-innovative ($p = 0.8689$).

Thus, Study 4 shows that liberals and conservatives hold different beliefs about the rate of change of innovative products. Liberals believe that products will be better in the future as compared to the past whereas conservatives do not show different beliefs regarding past or future product performance. The results align with our predictions that conservatives assimilate product evaluations from the past and future, whereas liberals contrast their evaluations of products from the past and future.

Taken together, these studies show that liberals and conservatives different sensitivities to and beliefs regarding change influence their evaluations of product innovations. In contrast to the received view that conservatives always evaluate change more negatively than

liberals, we find evidence for more nuanced relationships among political ideology, innovation and consumer evaluation.

The Impact of Political Ideology on Self-Control

EXTENDED ABSTRACT

Self-regulation is a multi-process system (Engle, Tuholski, Laughlin, and Conway 1999; Miyake et al. 2000; see Laran 2020), such that effective self-control often requires consumers to focus attention in a way that suppresses the influence of interfering information (i.e., inhibition) as well as incorporates the influence of novel insights (i.e., updating). The question motivating the present research is whether consumers' political ideology influences self-control success on tasks of inhibition and updating.

Political ideology reflects a specific set of ethical ideals, principles, and doctrines that explain the basis by which society should function (Jost, Federico, and Napier 2009). Though indirect, a wealth of research suggests that conservatives and liberals vary in their ability to mentally adapt to situational changes (i.e., cognitive flexibility: Zmigrod, Rentfrow, and Robbins, 2018). Specifically, liberals appear to be cognitively-flexible; they are open to new experiences (Carney, Jost, Gosling, and Potter 2008), socially-adaptable (Hirsh, DeYoung, Xu, and Peterson 2010), and novelty-seeking (Carney et al. 2008). Conversely, conservatives appear to be cognitively-rigid; they are persistent at impulse regulation (Clarkson et al. 2015), norm-adherent (Gosling, Rentfrow, and Swann 2003), and resistant to change (Jost et al. 2009).

This potential difference in cognitive flexibility is critical as it is proposed to impact performance on self-control tasks that require inhibition and updating. Specifically, the traits that reinforce cognitive rigidity in conservatives (e.g., rule adherence, resistance to change) should promote response inhibition by facilitating persistence through suppression of conflicting stimuli. Conversely, the traits that reinforce cognitive flexibility in liberals (e.g., openness, adaptability) should promote response updating by facilitating adaptation through replacing outdated information with relevant information. Collectively, then, conservatives and liberals are hypothesized to perform well at tasks of inhibition and updating, respectively, due to their respective difference in cognitive flexibility.

This hypothesis was tested across three studies. Each study targeted 200 participants based on a priori power analyses (power of .8, small-medium effect sizes, an alpha level of .05; Faul et al. 2007) and included appropriate attention checks (Oppenheimer, Meyvis, and Davidenko 2009).

As an initial test of our hypotheses, we conducted two studies at separate time points to test our primary hypothesis that conservative and liberal consumers differentially excel on tasks shown to assess inhibition and updating (Conway et al. 2005; Engle et al. 1999; Miyake et al. 2000). In the first session, participants completed a task of inhibition that presents participants with a target cue to respond to as quickly as possible while ignoring a random cue (*IOR*; Posner and Cohen 1984). In a separate session, participants completed a task of updating that required remembering the most recent category-relevant stimulus among constantly changing stimuli from multiple categories (*Keeping Track Task*; Yntema and Mueser, 1962). Participants in both studies indicated demographics along with a measure of political ideology on a 7-item scale anchored from *Very liberal* to *Very conservative* (Jost 2006; Knight 1999). The analysis revealed that conservatives outperformed liberals on the inhibition task (IOR: $p = .02$), whereas liberals outperformed conservatives on the updating task (Keeping Track Task: $p = .03$). This finding is consistent with the hypothesis that self-control varies as a function of consumers' political ideology and the extent to which the task requires inhibition or updating.

A subsequent study tested the extent to which this effect of task performance was isolated to consumers' political ideology within a separate context. Here, participants completed two anagrams where the performance rule was either fixed (inhibition) or changed (updating). For instance, participants instructed to list only three-letter solutions for the first anagram were then instructed to either list three-letter (inhibition) or four-letter (updating) solutions in the second anagram. To isolate ideology, participants completed an assessment of intelligence using an adapted version of the Wechsler Adult Intelligence Scale (WAIS; Friedman et al. 2006; Wechsler 1997), motivation (Muraven and Slessareva 2003), and religiosity (Koenig and Büssing 2010) before indicating their demographics and political ideology.

The hierarchical regression controlled for participant demographics as well as intelligence, motivation, and religiosity. Analysis of the number of correct solutions across anagrams revealed a significant interaction ($p = .002$); conservatives generated more solutions than liberals when the performance rule was fixed ($p = .02$) whereas liberals generated more solutions than conservatives when the performance rule was varied ($p = .04$). Interestingly, intelligence, motivation, and religiosity each had a positive effect on performance (p's $< .01$) yet had no influence on the relationship between ideology and task performance.

A final study examined the mediating role of cognitive flexibility on the performance of conservative and liberal consumers on tasks of differing attentional demands. Participants completed two 14x14 letter word searches where the performance rule was either fixed or varied. For instance, participants instructed to identify only forward solutions for the first word search were then instructed to either list forward (inhibition) or backward (updating) solutions for the second word search. Participants again completed the assessments of intelligence, motivation, and religiosity, as well as a measure of cognitive flexibility (Martin and Rubin 1995), before indicating their demographics and political ideology.

Again controlling for demographics, intelligence, motivation, and religiosity, analysis of the number of correct solutions revealed a significant interaction ($p = .001$); conservatives identified more words than liberals when the performance rule was fixed ($p = .02$), whereas liberals identified more words than conservatives when the performance rule was varied ($p = .005$). Moreover, there was a direct effect of ideology on cognitive flexibility ($p = .002$). Critically, the moderated-mediation test of cognitive flexibility (Model 15: Hayes 2018) indicated significant mediation through both the fixed (95% CI: .003, .182) and varied (95% CI: -.171, -.005) rule conditions.

Collectively, these findings support the claim that the effects of political ideology on self-control might be more nuanced than originally theorized. Specifically, conservatives may better regulate behaviors that require cognitive rigidity, whereas liberals may better regulate behaviors that require cognitive flexibility. Consequently, this work holds direct implication for consumers' self-control behaviors, such as financial decision-making (e.g., saving money) or addictive consumption (e.g., overeating).

Fair or Not? Political Ideology Shapes Observers' Responses to Service Failures

EXTENDED ABSTRACT

Consumers frequently witness service failure incidents. While having dinner at a restaurant, one might see that the customers at the next table did not receive the drinks they ordered. Or while checking

in at a hotel, one might notice another customer complaining that he did not get the type of room he reserved. Those who witness or learn about service failures could potentially form negative attitudes about the brand, which in turn can affect their intentions and WOM related to the brand. Firms would be well-served by understanding which consumers are more likely to react negatively to witnessing service failures, why, and how to curtail the negative impact of service failure for such consumers. This paper presents consumers' political ideology as a determinant of their reactions to observing service failures.

Although service failures are usually conceptualized in terms of operational failures in the process of delivering service, they could also be thought of as breaking a transactional promise (e.g., Goodwin & Ross, 1992; Smith, Bolton, & Wagner, 1999). This latter conceptualization recognizes that a customer experiencing service failure could feel "wronged" and thus form unfavorable judgments (Goodwin & Ross, 1992). To those who observe the failure but are not affected by it, a broken promise or one party being wronged could represent a larger issue of fairness. Fairness considerations—including those of fairness violations—are one of five moral intuition systems or "foundations" that form the basis of moral judgments (Moral Foundations Theory, MFT; Haidt & Joseph, 2004, 2007a). Building on this theoretical framework, past research shows that the importance of the fairness moral foundation varies by political ideology, such that liberals, relative to conservatives, consider fairness to be a highly relevant attribute in judging whether something is "right" or "wrong".

Because failures undermine the perceived fairness of a transaction, we suggest that liberals (vs. conservatives) are likely to view service failures as instances of moral violation. Therefore, even non-political instances of service failures could take on a political aspect and invoke divergent responses from observers who are political liberals or conservatives. In response to witnessing a service failure, liberals will likely see the involved brand as a violator of fairness, an important moral foundation to them (along with harm/care), leading to harsher, more negative responses. Conversely, since conservatives do not place disproportionate value on fairness but also value respecting authority/law, cooperation, and self-sacrifice (Graham et al., 2009; Haidt, Graham, & Joseph, 2009), they will be less likely to see the service failure as a moral violation and thus be less harsh in their judgments of the brand.

We use a multi-method approach (3 experiments, 2 surveys, and 1 big data analysis) to test our theory. As study 1, we gathered a large dataset of tweets (n = 219,070) from Twitter in a quasi-experimental field study using consumers' actual social media activity surrounding a publicized service failure incident about United Airlines. We estimated users' political orientation using a ranking algorithm and conducted sentiment analysis of tweets utilizing a dictionary-based text analyzer. Analyses show that immediately after the negative-publicity incident, liberal (vs. conservative) Twitter users were more likely to express negative sentiments, especially anger and anxiety, against United Airlines. A control sample of tweets from before the event showed a null effect of political ideology on sentiment.

Studies 2 and 3 use experiments and controlled scenarios to replicate the Twitter findings with stronger internal validity. As study 2, participants were assigned to conditions in a 2 (political ideology: liberal vs. conservative) × 3 (scenario: hotel vs. restaurant vs. airline; within-subject) mixed design implemented in two phases. In Phase 1, we recruited 350 adult US participants. We embedded two questions regarding participants' political orientation (following Hirsch et al., 2015; Jost, Nosek, & Gosling, 2008). We also measured participants' endorsement of the fairness moral foundation by

using the fairness/reciprocity subscale from the Moral Foundations Questionnaire (MFQ; Graham, Haidt, & Nosek, 2008). One week later, these participants were invited to an ostensibly unrelated study (Phase 2), with 287 returning participants (M_{age} = 35.34 years, 140 females). They were presented three scenarios (hotel, restaurant, and airlines setting) in randomized order, each followed by a page of questions. Scenarios were based on past literature (Hess et al., 2003; Smith et al., 1999) and adapted to a third-person point of view such that participants saw another customer experiencing service failure. Following each scenario, we measured participants attitudes toward the service provider and how likely they would be to positively review the service provider. Participants' unique ID was used to match data across two phases. Our data show that the first regression model is significant in the hotel ($F(1, 277)$ = 7.33, p = .007, adjusted R^2 = .026), restaurant ($F(1, 277)$ = 6.37, p = .012, adjusted R^2 = .02), and airlines scenarios ($F(1, 277)$ = 12.15, p = .001, adjusted R^2 = .04). Specifically, political ideology significantly predicted the variance in attitude toward the hotel (b = .17, p = .007), restaurant (b = .15, p = .012), and airline (b = .20, p = .001) such that liberals (vs. conservatives) held less positive attitudes in response to reading about service failure experienced by others. These results held even when the demographic variables were controlled for and were replicated with the positive reviewing DV. We further found that these effects are mediated by the endorsement of the fairness foundation and perceptions of fairness toward the affected customer.

Studies 4a and 4b used surveys about news items about publicized service failure events involving the Fyre music festival and the beforementioned United Airlines incident, respectively. In both studies, participants' self-identified political ideology and political party identification predicted their attitudes toward the two service providers and the affected customers. In study 5, the divergence in liberals' (vs. conservatives') responses was attenuated when the recovery effort was referenced as "fair" compensation (vs. compensation present vs. compensation absent). These findings present multi-method evidence of politico-moral influences in consumer responses to non-political service failures.

Political Polarization in How Perceived Social Similarity Impacts Support for Redistribution

EXTENDED ABSTRACT

The inequality of wealth in the US has reached record levels (Piketty, 2011). This is generating a public debate about the impact of inequality on individual and collective wellbeing and increasingly shaping people's preferences across many contexts including political candidates, policies, as well as products and brands (e.g., Dawtry, Sutton, & Sibley, 2015; Frank, Wertenbroch, & Maddux, 2015; Ordabayeva & Chandon, 2011).

Although individuals agree that economic inequality in the US is historically high (Bartels, 2005), support for redistributive policies designed to reduce income inequality is not very widespread (Jost & Hunyady, 2005). This raises the question of how individuals' preferences and support for redistribution can be changed (Brown-Iannuzzi et al., 2014).

Prior work suggests that, although redistributive preferences are deeply ingrained within individuals, one factor that can potentially overcome this challenge and increase individuals' support for redistributive policies is similarity. Specifically, prior work suggests perceiving high (vs. low) similarity can potentially increase support for redistribution, because it may lead individuals to question the fairness of people's unequal outcomes and boost their group loyalty (Luttmer, 2001). Supporting this notion, studies show that in-

dividuals are more supportive of redistribution if they think that it will help similar others (Duell, 2015), if they live in areas with high racial similarity (Alesina, Baqir, & Easterly, 1999), and if they are prompted to cognitively focus on similarity in a picture comparison task (Ordabayeva & Fernandes, 2017).

The present research suggests that the effect of perceived social similarity on individuals' redistributive preferences may be more complex. It suggests that perceiving high (vs. low) social similarity may increase redistribution support among liberals, but decrease redistribution support among conservatives, because it may weaken liberals', but strengthen conservatives', belief that individuals deserve their unequal outcomes. More specifically, since prompting high social similarity would confirm liberals' assumption that individuals are similar in their inherent qualities (hard work, effort), it should strengthen liberals' belief that similar individuals deserve similar outcomes and boost liberals' support for redistribution. In contrast, boosting perceptions of social similarity may challenge conservatives' assumption that people are dissimilar in inherent qualities, which may lead conservatives to wish to reconcile why similar individuals end up with dissimilar outcomes. The desire to reconcile this discrepancy may further strengthen conservatives' belief that people are ultimately responsible for and deserve their dissimilar outcomes, because unsuccessful individuals had similar starting ingredients needed for success as successful individuals and hence unsuccessful individuals have no one but themselves to blame. In effect, this research proposes that prompting perceptions of high (vs. low) social similarity may result in greater (rather than lower) political polarization in redistributive preferences. Three studies tested this prediction.

Study 1 manipulated perceptions of social similarity: participants elaborated on the similarities or differences between themselves and others. As the dependent measure in Study 1, and in all subsequent studies, participants indicated the extent to which they support or oppose taxes on individuals earning more than $1 million and more than $5 million; Chow & Galak, 2012). Participants also indicated their beliefs in the fairness of unequal outcomes (e.g., "By and large, people deserve what they get"; Rubin & Peplau, 1975) and their political ideology (1 = "extremely liberal" to 9 = "extremely conservative"; Jost, 2006). The results of a regression analysis revealed a significant interaction between social similarity and political ideology ($b = -.17$, $p = .016$). A floodlight (Johnson-Neyman) analysis showed that boosting perceptions of social similarity (vs. dissimilarity) increased redistribution support among liberals (who scored 2.39 or lower on the ideology scale), but reduced redistribution support among conservatives' (who scored 7.49 or higher on the ideology scale). This happened because boosting perceptions of social similarity (vs. dissimilarity) weakened liberals', but strengthened conservatives', belief in the fairness of unequal outcomes (interaction: $b = .13$, $p = .003$; moderated mediation: $a \ x \ b = -.0214$, 95% CI = $[-.0578, -.0034]$).

Study 2 measured perceptions of social similarity among others ("to what extent do you think Americans are different from or similar to each other?" 1 = "very different" to 7 = "very similar"), which did not invoke the self to rule out the egocentric and projection accounts of the hypothesized effect. The study also measured fairness beliefs more specifically by focusing on the fairness of economic outcomes (e.g., "Economic positions are legitimate reflections of people's achievements"; Jost & Thompson, 2000). A regression analysis revealed a significant interaction between social similarity and political ideology ($b = -.11$, $p < .001$). Perceiving high (vs. low) social similarity boosted liberals', but reduced conservatives', redistributive preferences. This once again happened because perceiving

high (vs. low) social similarity weakened liberals', but strengthened conservatives', belief in the fairness of unequal economic outcomes (interaction: $b = .03$, $p = .001$; moderated mediation: $a \ x \ b = -.0213$, 95% CI = $[-.0387, -.0081]$).

Study 3 manipulated perceptions of social similarity among others (i.e. Americans – to minimize the role of egocentric and projection motives), and it included a control condition in which similarity perceptions were not manipulated. Two dummies were created to test the predictions (Naylor, Lamberton, & Norton 2011): dummy 1 contrasting high similarity with low similarity and control, and dummy 2 contrasting low similarity with control; but only dummy 1 interacted with ideology ($b = -.17$, $p = .003$). Liberals' redistributive preferences were higher in the high similarity than in the low similarity and control conditions, but conservatives' redistributive preferences were lower in the high similarity than in the low similarity and control conditions. These findings confirmed that the effect is driven by perceptions of social similarity (rather than dissimilarity).

This research suggests that individuals' preferences for redistributive policies designed to reduce inequality may be more complex than previously presumed, and that these preferences may be shaped by external manipulations differently depending on individuals' group membership. The results may also inform policy makers interested in shaping public support for redistribution as well as researchers interested in identifying prompts that can change redistributive preferences and factors that can polarize, or unify, conservatives' and liberals' preferences in various contexts.

REFERENCES

Alesina, Alberto, Reza Baqir, and William Easterly (1999), "Public Goods and Ethnic Divisions," *The Quarterly Journal of Economics,* 114 (4), 1243-1284.

Barra, Cristobal "When Do Political Ideologies Affect Brand Extension Evaluation? The Role of Analytic Versus Holistic Mindsets," 126.

Bless, Herbert and Norbert Schwarz (2010), "Mental Construal and the Emergence of Assimilation and Contrast Effects," in *Advances in Experimental Social Psychology*, Elsevier, 319–73, https://linkinghub.elsevier.com/retrieve/pii/S0065260110420067.

Brown-Iannuzzi, Jazmin L., Kristjen B. Lundberg, Aaron C. Kay, and B. Keith Payne (2015), "Subjective Status Shapes Political Preferences," *Psychological Science*, 26(1), 15–26.

Carney, Dana R., John T. Jost, Samuel D. Gosling, and Jeff Potter (2008), "The Secret Lives of Liberals and Conservatives: Personality Profiles, Interaction Styles, and the Things They Leave Behind," *Political Psychology*, 29(6), 807–40.

Chernev, Alexander (2011), "Semantic Anchoring in Sequential Evaluations of Vices and Virtues," *Journal of Consumer Research*, 37(5), 761–74.

Chow, Rosalind M. and Jeff Galak (2012), "The Effect of Inequality Frames on Support for Redistributive Tax Policies," *Psychological Science*, 23(12), 1467–69.

Clarkson, Joshua J., John R. Chambers, Edward R. Hirt, Ashley S. Otto, Frank R. Kardes, and Christopher Leone (2015), "The Self-Control Consequences of Political Ideology," *Proceedings of the National Academy of Sciences*, 112(27), 8250–53.

Conway, Andrew R. A., Michael J. Kane, Michael F. Bunting, D. Zach Hambrick, Oliver Wilhelm, and Randall W. Engle (2005), "Working Memory Span Tasks: A Methodological Review and User's Guide," *Psychonomic Bulletin & Review*, 12(5), 769–86.

Dawtry, Rael J., Robbie M. Sutton, and Chris G. Sibley (2015), "Why Wealthier People Think People Are Wealthier, and Why It Matters: From Social Sampling to Attitudes to Redistribution," *Psychological Science*, 26(9), 1389–1400.

Duell, Dominik "Social Heterogeneity an Its Ambiguous Effect on Preferences for Redistribution," 47.

Engle, Randall W, James E Laughlin, Stephen W Tuholski, and Andrew R A Conway "Working Memory, Short-Term Memory, and General Fluid Intelligence: A Latent-Variable Approach," 23.

Faul, Franz, Edgar Erdfelder, Albert-Georg Lang, and Axel Buchner (2007), "G*Power 3: A Flexible Statistical Power Analysis Program for the Social, Behavioral, and Biomedical Sciences," *Behavior Research Methods*, 39(2), 175–91.

Fernandes, Daniel and Naomi Mandel (2014), "Political Conservatism and Variety-Seeking," *Journal of Consumer Psychology*, 24(1), 79–86.

Frank, Douglas H., Klaus Wertenbroch, and William W. Maddux (2015), "Performance Pay or Redistribution? Cultural Differences in Just-World Beliefs and Preferences for Wage Inequality," *Organizational Behavior and Human Decision Processes*, 130, 160–70.

Friedman, Naomi P., Akira Miyake, Robin P. Corley, Susan E. Young, John C. DeFries, and John K. Hewitt (2006), "Not All Executive Functions Are Related to Intelligence," *Psychological Science*, 17(2), 172–79.

Goodwin, Cathy and Ivan Ross (1992), "Consumer Responses to Service Failures: Influence of Procedural and Interactional Fairness Perceptions," *Journal of Business Research*, 25(2), 149–63.

Graham, Jesse, Jonathan Haidt, Sena Koleva, Matt Motyl, Ravi Iyer, Sean P. Wojcik, and Peter H. Ditto (2013), "Moral Foundations Theory," in *Advances in Experimental Social Psychology*, Elsevier, 55–130, https://linkinghub.elsevier.com/retrieve/pii/B9780124072367000024.

Graham, Jesse, Brian A. Nosek, Jonathan Haidt, Ravi Iyer, Spassena Koleva, and Peter H. Ditto (2011), "Mapping the Moral Domain," *Journal of personality and social psychology*, 101(2), 366–85.

Haidt, Jonathan, Jesse Graham, and Craig Joseph (2009), "Above and Below Left–Right: Ideological Narratives and Moral Foundations," *Psychological Inquiry*, 20(2–3), 110–19.

Haidt, Jonathan and Craig Joseph "19 The Moral Mind: How Five Sets of Innate Intuitions Guide the Development of Many Culture-Specific Virtues, and Perhaps Even Modules," 31.

——— (2004), "Intuitive Ethics: How Innately Prepared Intuitions Generate Culturally Variable Virtues," *Daedalus*, 133(4), 55–66.

Hayes, A. F. (2017), *Introduction to Mediation, Moderation, and Conditional Process Analysis: A Regression Based Approach* (2nd ed.), New York: Guilford.

——— (2013). *Introduction to Mediation, Moderation, and Conditional Process Analysis*. New York: Guilford

Hess, Ronald L., Shankar Ganesan, and Noreen M. Klein (2003), "Service Failure and Recovery: The Impact of Relationship Factors on Customer Satisfaction," *Journal of the Academy of Marketing Science*, 31(2), 127–45.

Hirsh, Jacob B., Colin G. DeYoung, Xiaowen Xu, and Jordan B. Peterson (2010), "Compassionate Liberals and Polite Conservatives: Associations of Agreeableness With Political Ideology and Moral Values," *Personality and Social Psychology Bulletin*, 36(5), 655–64.

Johnson, P. O. and J. Neyman (1936), "Tests of Certain Linear Hypotheses and Their Application to Some Educational Problems," *Statistical Research Memoirs*, 1, 57–93.

Jost, John T. (2007), "Coda--After 'The End of the End of Ideology.,'" *American Psychologist*, 62(9), 1077–80.

——— (2006), "The End of the End of Ideology.," *American Psychologist*, 61(7), 651–70.

——— (2017), "The Marketplace of Ideology: 'Elective Affinities' in Political Psychology and Their Implications for Consumer Behavior," *Journal of Consumer Psychology*, 27(4), 502–20.

Jost, John T., Jack Glaser, Arie W. Kruglanski, and Frank J. Sulloway (2003), "Political Conservatism as Motivated Social Cognition," *Psychological Bulletin*, 129(3), 339–75.

Jost, John T. and Orsolya Hunyady (2005), "Antecedents and Consequences of System-Justifying Ideologies," *Current Directions in Psychological Science*, 14(5), 260–65.

Jost, John T., Brian A. Nosek, and Samuel D. Gosling (2008), "Ideology: Its Resurgence in Social, Personality, and Political Psychology," *Perspectives on Psychological Science*, 3(2), 126–36.

Khan, Romana, Kanishka Misra, and Vishal Singh (2013), "Ideology and Brand Consumption," *Psychological Science*, 24(3), 326–33.

Knight, Kathleen (1999), "Liberalism and Conservatism, in Measures of Political Attitudes," ed. Robinson, John P, Shaver, Phillip R, Wrightsman, Lawrence S, *San Diego: Academic Press*, 59–158.

Koenig, Harold G., and Arndt Büssing (2010), "The Duke University Religion Index (DUREL): A Five-Item Measure for Use in Epidemological Studies." *Religions*, 1(1), 78-85.

Lammers, Joris and Matt Baldwin (2018), "Past-Focused Temporal Communication Overcomes Conservatives' Resistance to Liberal Political Ideas," *Journal of Personality and Social Psychology*, 114(4), 599–619.

Laran, Juliano (2020), "Self-Control: Information, Priorities, and Resources," *Consumer Psychology Review*, 3(1), 91–107.

Lee, Saerom, Karen Page Winterich, and William T. Ross (2014), "I'm Moral, but I Won't Help You: The Distinct Roles of Empathy and Justice in Donations," *Journal of Consumer Research*, 41(3), 678–96.

Luttmer, Erzo F. P. (2001), "Group Loyalty and the Taste for Redistribution," *Journal of Political Economy*, 109(3), 500–528.

Makens, James C. (1965), "Effect of Brand Preference upon Consumers Perceived Taste of Turkey Meat," *Journal of Applied Psychology*, 49(4), 261–63.

Martin, Matthew M., and Rebecca B. Rubin (1995), "A New Measure of Cognitive Flexibility," *Psychological Reports*, 76(2), 623-26..

Miyake, Akira, Naomi P. Friedman, Michael J. Emerson, Alexander H. Witzki, Amy Howerter, and Tor D. Wager (2000), "The Unity and Diversity of Executive Functions and Their Contributions to Complex 'Frontal Lobe' Tasks: A Latent Variable Analysis," *Cognitive Psychology*, 41(1), 49–100.

Muraven, Mark and Elisaveta Slessareva (2003), "Mechanisms of Self-Control Failure: Motivation and Limited Resources," *Personality and Social Psychology Bulletin*, 29(7), 894–906.

Nosek, Brian, Mahzarin R. Banaji, and John T. Jost (2009), "The Politics of Intergroup Attitudes," in *Social and Psychological Bases of Ideology and System Justification*, ed. John T. Jost, Aaron C. Kay, and Hulda Thorisdottir, Oxford University Press, 480–506.

Oppenheimer, Daniel M., Tom Meyvis, and Nicolas Davidenko (2009), "Instructional Manipulation Checks: Detecting Satisficing to Increase Statistical Power," *Journal of Experimental Social Psychology*, 45(4), 867–72.

Ordabayeva, Nailya and Pierre Chandon (2011), "Getting Ahead of the Joneses: When Equality Increases Conspicuous Consumption among Bottom-Tier Consumers," *Journal of Consumer Research*, 38(1), 27–41.

Ordabayeva, Nailya and Daniel Fernandes (2018), "Better or Different? How Political Ideology Shapes Preferences for Differentiation in the Social Hierarchy," ed. Darren Dahl and Cait Lamberton, *Journal of Consumer Research*, 45(2), 227–50.

——— (2017), "Similarity Focus and Support for Redistribution," *Journal of Experimental Social Psychology*, 72, 67–74.

Plassmann, H., J. O'Doherty, B. Shiv, and A. Rangel (2008), "Marketing Actions Can Modulate Neural Representations of Experienced Pleasantness," *Proceedings of the National Academy of Sciences*, 105(3), 1050–54.

Posner, M. I., & Cohen, Y. (1984), "Components of Visual Orienting," *Attention and Performance X: Control of Language Processes*, 32, 531-56.

Robinson, Michael D., Deirdre M. Cassidy, Ryan L. Boyd, and Adam K. Fetterman (2015a), "The Politics of Time: Conservatives Differentially Reference the Past and Liberals Differentially Reference the Future," *Journal of Applied Social Psychology*, 45(7), 391–99.

——— (2015b), "The Politics of Time: Conservatives Differentially Reference the Past and Liberals Differentially Reference the Future," *Journal of Applied Social Psychology*, 45(7), 391–99.

Rubin, Zick and Letitia Anne Peplau (1975), "Who Believes in a Just World?," *Journal of Social Issues*, 31(3), 65–89.

Skitka, Linda J., Elizabeth Mullen, Thomas Griffin, Susan Hutchinson, and Brian Chamberlin (2002), "Dispositions, Scripts, or Motivated Correction? Understanding Ideological Differences in Explanations for Social Problems," *Journal of Personality and Social Psychology*, 83(2), 470–87.

Smith, Amy K., Ruth N. Bolton, and Janet Wagner (1999), "A Model of Customer Satisfaction with Service Encounters Involving Failure and Recovery," *Journal of Marketing Research*, 36(3), 356–72.

Todd Maddox, W. and Arthur B. Markman (2010), "The Motivation–Cognition Interface in Learning and Decision Making," *Current Directions in Psychological Science*, 19(2), 106–10.

Yntema, Douwe B. and Gayle E. Mueser (1962), "Keeping Track of Variables That Have Few or Many States," *Journal of Experimental Psychology*, 63(4), 391–95.

——— (1960), "Remembering the Present States of a Number of Variables," *Journal of Experimental Psychology*, 60(1), 18–22.

Zmigrod, Leor, Peter J. Rentfrow, and Trevor W. Robbins (2018), "Cognitive Underpinnings of Nationalistic Ideology in the Context of Brexit," *Proceedings of the National Academy of Sciences*, 115(19), E4532–40.

Zucker, Gail Sahar and Bernard Weiner (1993), "Conservatism and Perceptions of Poverty: An Attributional Analysis1," *Journal of Applied Social Psychology*, 23(12), 925–43.

Persuasive Uncertainty: Toward Understanding How Uncertainty Influences the Formulation of Beliefs

Chair: Rory M. Waisman, University of Alberta, Canada

Paper #1: Undermining Your Case Can Enhance Your Impact: A Framework for Understanding the Positive Effects of *Acts of Receptiveness* in Persuasion

Mohamed A. Hussein, Stanford University, USA

Zakary Tormala, Stanford University, USA

Paper #2: Perceived Drivers of Change in Financial Well-Being Predict Partisan Lean and Response to Policy Messages

Job M. T. Krijnen, University of California Los Angeles, USA

Jon Bogard, University of California Los Angeles, USA

Gülden Ülkümen, University of Southern California, USA

Craig R. Fox, University of California Los Angeles, USA

Paper #3: How Probability Information Impacts Outcome Judgments

Daniella Kupor, Boston University, USA

Kristin Laurin, University of British Columbia, Canada

Paper #4: How Uncertainty Boosts Confidence in Consumption Decisions

Rory M. Waisman, University of Alberta, Canada

Gerald Häubl, University of Alberta, Canada

SESSION OVERVIEW

Decades of research across the fields of economics (e.g., Rabin and Thaler 2001), psychology (e.g., Kahneman and Tversky 1982), judgment and decision making (e.g., Coombs and Beardslee 1954), and marketing (e.g., Bettman, Luce, and Payne 1998) have revealed that uncertainty profoundly impacts people's attitudes. We know, for instance, that uncertain attitudes are more easily influenced (Litt and Tormala 2010), less persistent (Bassili 1996), and less likely to predict behavior (Fazio and Zanna, 1978), and that uncertainty motivates systematic processing of persuasive messages (Chen, Duckworth, and Chaiken 1999; Tiedens and Linton 2001). We have less clarity, though, about the mechanisms through which different sources of uncertainty influence the formulation and revision of evaluations and beliefs. While uncertainty is a dimension of an attitude, it can also be a characteristic of a persuasion source, a property attributed to an attitude object, a feature of outcome expectations or evaluations, or a feeling arising from sources unrelated to a focal decision. In this session we contribute to answering one key question: How does uncertainty originating from different sources impact people's evaluations and beliefs?

We draw together four papers that each probe the mechanisms of action of a different source of uncertainty that shape evaluations and beliefs. In the first paper, Hussein and Tormala integrate prior persuasion research to develop a comprehensive theoretical framework charting conditions in which uncertainty acknowledged by a source promotes persuasion by enhancing source perceptions and increasing involvement. Krijnen, Bogard, Ülkümen, and Fox illuminate the manner in which the perceived nature of uncertainty in the domain of financial well-being affects the degree to which persuasive messages shift beliefs about social policy issues. They find that message framing compatible with uncertainty beliefs facilitates the persuasive power of messaging in support of social welfare policies. In the third paper, Kupor and Laurin investigate how knowledge about uncertain outcomes influences beliefs about the magnitude of those outcomes, and alters evaluations of those outcomes as a result. In

the final paper, Waisman and Häubl examine how uncertainty that originates from a source completely unrelated to a consumption decision alters processing and influences evaluation of that consumption decision. They find that when consumers feel uncertain and make a taste-based decision, their decision processing becomes faster, more fluent, and more favorable to their chosen alternative; and as a result, consumers become more confident in their choice.

Collectively, these four papers identify conditions under which uncertainty originating from a variety of sources alters evaluations and beliefs, and uncover the mechanisms through which uncertainty operates to generate these persuasive effects. This session will appeal to a broad range of scholarly interests including persuasion, uncertainty, and the intersection of consumer psychology with judgment and decision making.

Undermining Your Case Can Enhance Your Impact: A Framework for Understanding the Positive Effects of *Acts of Receptiveness* in Persuasion

EXTENDED ABSTRACT

Past research has uncovered numerous actions a source can take that would appear to undermine but in fact frequently enhance persuasion. For example, expressing doubt rather than confidence, conveying that there is uncertainty rather than certainty around an argument or estimate, asking questions rather than making statements, playing up rather than playing down one's personal mistakes, and acknowledging rather than hiding opposing viewpoints would all seem to limit one's persuasive impact, but in fact they often boost it.

We review prior research on these topics and propose a theoretical framework that explains when and why such counterintuitive actions enhance persuasion. In particular, we posit that these diverse actions cohere around a single underlying construct: acts of receptiveness. We define acts of receptiveness as behaviors or actions that signal a source's openness to ideas, arguments, and attitudes that are new or opposing to his or her own. In other words, acts of receptiveness suggest to recipients that the source is not overly zealous, biased, or one-sided in his or her beliefs.

Consider the conditions under which acts of receptiveness boost persuasion. Based on our review, we suggest that acts of receptiveness are especially likely to promote persuasion when source expertise or status is high but not low. Under high expertise conditions, it appears that people can be more persuaded by those who express doubt rather than confidence about their opinion, who mention rather than mask mistakes they have made, who highlight flaws in their arguments or reference views that oppose their own, and who ask questions instead of making declarative statements. Under low source expertise or status conditions, acts of receptiveness generally offer little advantage or can even backfire.

In addition, when source credibility is high, acts of receptiveness appear to promote persuasion through two primary mechanisms: enhanced source perceptions and increased involvement. First, acts of receptiveness appear to trigger more favorable source impressions, fostering perceptions of honesty, likeability, thoughtfulness, and so on. Second, acts of receptiveness can stimulate involvement, which leads to deeper processing. These processes in turn can facilitate persuasion as long as the arguments are reasonably strong.

We organize our review around four primary acts of receptiveness that show the predicted persuasion effect (i.e., acts of receptiveness result in greater persuasion) and speak to the proposed conditions and/or mechanisms guiding it.

Conveying Uncertainty. One class of acts of receptiveness involves conveying uncertainty. By conveying uncertainty, we mean communicating or displaying doubt, hesitance, or ambiguity. For example, a source who expresses doubt about an opinion (Karmarkar and Tormala 2010) or provides a range of possible outcomes when making a forecast or prediction (Howe et al. 2019) can be viewed as conveying uncertainty. Conveying uncertainty can be viewed as an act of receptiveness because the source takes a position, expresses an argument, or provides an estimate or answer, but implicitly acknowledges that other positions, arguments, or estimates exist and may be valid. By conveying uncertainty, the source suggests that he or she understands that his or her knowledge is not definitive and that he or she is open to other perspectives on the topic.

Acknowledging Mistakes. Another class of acts of receptiveness involves admitting a mistake. By admitting a mistake, we mean explicitly or implicitly taking responsibility for an error. Explicitly admitting a mistake may take the form of acknowledging the mistake and/or apologizing for it. For example, "I used to think X, but I was wrong." Implicitly admitting a mistake may take the form of changing one's opinion to correct for a mistake. For example, if someone points out mistakes in the source's arguments, the source could update his/her arguments to address the error.

Acknowledging that one has committed a mistake explicitly or implicitly signals openness to information that is potentially adversarial to one's position. Rather than reverting to defensiveness or blame, acknowledging a mistake signals that one is not overly zealous or single-minded; that one is open to changing one's mind and updating one's position based on the available information. Past research has shown that explicitly or implicitly admitting mistakes can enhance persuasion (Reich & Maglio 2019; Kupor et al. 2018; Aronson et al. 1966; John et al. 2019; Gonzales 2012; Reich & Tormala 2013).

Highlighting the Negatives. Highlighting the negatives involves bringing up defects, limitations, downsides, and opposing arguments to one's own point of view or position. We submit that doing so signals open-mindedness and receptiveness, and thus can offer a persuasive advantage over doing the opposite—for instance, sharing only supportive arguments or asserting that one's proposal, position, or offer is superior on all dimensions. Past research on two-sided messages (Etgar and Goodwin 1982; Golden and Alpert 1986; Kamins and Assael 1987; Settle and Golden 1974; Smith and Hunt 1978; for a review, see Crowley and Hoyer 1994) and on the blemishing effect (Ein-gar et al. 2012) suggests that acknowledging negatives can enhance persuasion under specifiable conditions.

Asking Questions. Asking questions, as opposed to making declarative statements, is another class of acts of receptiveness. Intuitively, asking a question, even when one already knows the answer, seems more open and inviting than does making a statement. A person who makes declarative statements (e.g., "this new policy will boost productivity"), for instance, is likely to be seen as more firm or assertive in his opinion than one who phrases the same position as a question (e.g., "won't this new policy boost productivity?"). By implicitly inviting the recipients' input, a source who asks questions might be seen as open-minded and receptive to others' views or perspectives—and past research found that asking questions can facilitate persuasion under specifiable conditions (Zillmann 1972; Petty et al. 1981; Burnkrant & Howard 1984).

Conclusion. In summary, through an extensive review of the literature, we document a vast array of acts of receptiveness that explain when and why particular counterintuitive actions—such as conveying uncertainty or admitting mistakes or limitations—can enhance persuasion. In doing so, we integrate seemingly disparate research findings around a single theoretical framework with concrete practical implications.

Perceived Drivers of Change in Financial Well-Being Predict Partisan Lean and Response to Policy Messages

EXTENDED ABSTRACT

Economic inequality is on the rise, negatively affecting consumers' well-being around the globe (Alvaredo, Chancel, Piketty, Saez, & Zucman, 2018; Piketty & Saez, 2014; Saez & Zucman, 2016; Zucman, 2019). Politicians have found it challenging to garner broad support for their proposals on how to deal with inequality, since people often strongly disagree on how, when, and why the government should intervene by implementing income redistribution policies. We argue that such disagreements arise because people differ in their assessment of what causes an individual's financial well-being to change over time. Moreover, policy preferences are not fixed but depend on the way a proposal is communicated. Better understanding the persuasiveness of different policy proposals and messages therefore requires an appropriate model of people's beliefs about the nature of uncertainty regarding changes in financial well-being.

In this article, we propose that beliefs about uncertainty in financial well-being are best thought of along three conceptually independent dimensions, respectively capturing the extent to which changes in financial well-being are perceived to be (1) knowable and within individuals' control due to individual factors such as effort ('*rewarding*'), (2) knowable and outside of individuals' control due to systemic factors such as favoritism and discrimination ('*rigged*'), and (3) inherently unpredictable and determined by chance events ('*random*'). In four studies, we use a 9-item F-EARS scale that we developed to assess these three dimensions of uncertainty regarding changes in an individual's financial well-being.

Mapping beliefs about changes in financial well-being along the conceptually independent rewarding, rigged, and random dimensions combines and extends insights from previous research on beliefs about individual accountability (e.g., Alesina & Glaeser, 2004; Fong, 2001; Konow, 2000) and on beliefs about the nature of uncertainty (Fox & Ülkümen, 2011; Tannenbaum, Fox, & Ülkümen, 2017; Ülkümen, Fox, & Malle, 2016).

In Study 1, we examine the relative importance of each dimension as a predictor of political ideology, in search for a more complete understanding of what distinguishes conservative ideology from liberal ideology. Using a nationally representative sample (N = 1102), we find that conservatives generally score higher on the rewarding dimension ($r = 0.13$, $p < .001$), lower on the rigged dimension ($r = -0.20$, $p < .001$), and lower on the random dimension ($r = -0.09$, $p = .005$), even when controlling for a number of demographic and related psychometric measures.

We further predict that political orientation should not be the ultimate determinant of support for social welfare policies. Studies 2-4 (total $N=2560$; pre-registered) test our prediction that we can increase support for social welfare policies when we describe policies in a way that is compatible with people's beliefs about changes in financial well-being.

Study 2 asked participants to indicate how important they find each of three possible goals that a government might pursue: (1)"The government should use resources to incentivize and enable people to

pull themselves out of financial hardship and realize their full potential" (i.e., an *incentivize* goal); (2) "The government should allocate resources to individuals belonging to disadvantaged groups that routinely experience financial hardship" (i.e., a *redistribution* goal); (3) "The government should pool resources to support people when they happen to experience unforeseeable financial hardship" (i.e., a *risk-pool* goal). The results suggest that higher scores on the [rewarding/rigged/random] dimension were associated with a more positive change in the importance rating of the [incentivizing/redistribution/risk-pooling] goal, respectively, compared to the other two goals.

In Study 3, we presented participants with four different public policy proposals: a more extensive disaster recovery program, a tuition-free higher education system, and a more extensive food-purchasing assistance program, and a universal health coverage system. Each proposal was followed by three different arguments in favor of the policy: (1) an *incentivizing* argument, which highlighted how the policy would provide assistance to those who deserve it most; (2) a *redistribution* argument, which highlighted how the policy would provide assistance to the groups that need it most (e.g., low-income, unemployed people); (3) a *risk-pool* argument, which highlighted how the policy would pool tax-money to collectively pay in case an individual experiences an unexpected life event. The results suggest that higher scores on the [rewarding/rigged/random] dimension are associated with a more positive change in policy support in response to the [incentivize/redistribution/risk-pooling] argument, respectively, as compared to the other two arguments.

In study 4, we presented participants with statements of three political candidates regarding welfare policies on higher education, disaster recovery, and food purchasing assistance. Each candidate put forward either incentivizing arguments, redistribution arguments, or risk-pooling arguments for all three proposals. We find that higher scores on the [rewarding/redistribution/random] dimension are associated with a more positive change in support for the [incentivizing/redistribution/risk-pooling] candidate, respectively, as compared to the other two candidates, even when controlling for political ideology. Perhaps more importantly, scores on the three dimensions are associated with greater intention to vote for candidates that made belief-compatible arguments.

These findings broaden our understanding of what is driving support for or opposition to redistribution policies. To truly grasp political and policy preferences we need a complete and accurate model of how people think about changes in financial well-being. Our findings confirm that a model based only on perceptions of individual control is insufficient, and that distinguishing between the perceived knowability and randomness of changes in financial well-being allows for more complete understanding and better predictive ability.

Despite the commonly held wisdom that support for welfare policies depends on political attitudes, we show that belief-compatible messages can increase support for redistribution policies and voting intentions for the politicians proposing these policies, across the entire political spectrum. When people disagree about a certain distribution policy, this disagreement may stem from a failure to jointly define what exactly the policy entails–who it helps, on what basis, and with what purpose. Whenever such disagreements arise, a slight reframing of the policy, guided by an understanding of beliefs about the uncertainty in financial well-being, may bring opinions on the matter closer together.

How Probability Information Impacts Outcome Judgments

EXTENDED ABSTRACT

Consumers' decisions about which foods they eat and which health products they utilize influence their welfare and well-being. When consumers believe these products may produce greater benefit, they are more likely to consume them; when they believe these products may cause greater harm, they are less likely to consume them (Slovic 1964). When judging the size of products' benefits and harms, consumers are often aware of these outcomes' probability of occurring. In fact, this information is often highlighted in product advertisements, product packaging, and product websites.

Imagine that a side effect increases a consumer's eosinophil count from 397 to 435 per microliter. Of note, the side effect's prior probability of increasing eosinophils provides no objective insight into the degree to which that consumer's eosinophil count has now increased, and thus this prior probability should not inform the individual's decision about whether to incur a cost (e.g., buy a medical treatment) to remedy that increase. Nevertheless, we theorize that such objectively irrelevant information biases magnitude judgments: Consumers forecast that more probable product outcomes will be larger in magnitude, and also perceive them as larger in magnitude after those outcomes unfold. We propose that this bias emerges because people believe larger prior probabilities emanate from more powerful causal antecedents that produce outcomes with larger magnitudes.

In Study 1, undergraduates were randomly assigned to either a *Smaller Probability* or *Larger Probability* condition, and viewed a Claritin drug advertisement which noted that Claritin causes 6% (vs. 68%) of users to experience a side effect of coughing. When participants learned that someone experienced coughing as a result of taking Claritin, they forecasted that the person experienced a larger number of coughs, $t(108) = 3.35$, $p < .001$. Study 2 replicated this phenomenon when the probability information was communicated via frequencies rather than percentages, $t(198) = 4.23$, $p < .001$.

Studies 3-4 found that probability information also distorts *perceptions* of objective magnitude information. In Study 3, participants in the *Smaller* (vs. *Larger*) *Probability* condition read that when a person eats an orange, the orange has a 14% (vs. 66%) chance of increasing the concentration of trypsin in the body. Next, participants read that someone's trypsin count increased from 397 to 435 per microliter after eating an orange. Participants entered the percentage by which the person's trypsin increased when it increased from 397 to 435 per microliter. Participants were incentivized for accuracy. Participants in the *Larger* (vs. *Smaller*) *Probability* condition perceived that this increase constituted a larger percent increase, $t(198) = 4.14$, $p < .001$.

Study 4 examined an anchoring explanation. Participants in the *Smaller* (vs. *Larger*) *Probability* condition read that consuming a banana has a .03% (vs. 22%) chance of increasing people's eyelash length. Participants then read that a woman's lashes increased in length after she ate a banana, and viewed pictures of her lashes before and after she ate the banana. Participants further read that her lashes were now .75 inches *after* eating the banana; beneath this information and the before-and-after pictures, participants indicated the length of her lashes *before* she ate the banana. Whereas an anchoring alternative predicts that participants who viewed the larger prior probability would report a *larger* initial magnitude, we found that participants who viewed the larger prior probability reported a *smaller* initial magnitude (which indicated that they perceived more

growth depicted in the before-and-after pictures), $t(198) = 2.56$, $p = .011$.

Study 5 found this bias emerges because people believe larger probabilities emanate from more powerful causal antecedents that produce outcomes with larger magnitudes. In addition, it found that the current phenomenon impacts intended behavior. Specifically, participants in Study 5 read that consuming pumpkin seeds has a chance of increasing bone density. Participants viewed a bar graph which depicted that eating one pound of pumpkin seeds has a 6% chance of increasing bone density (and "6%" was printed above the bar). The only difference between conditions was the y-axis, which ranged from 0% to 5% (vs. 100%) in the *Larger* (vs. *Smaller*) *Probability* condition. A pretest revealed that this manipulation caused participants to perceive that the 6% probability was larger in the *Larger* (vs. *Smaller*) *Probability* condition. Participants in the *Larger* (vs. *Smaller*) *Probability* condition judged that pumpkin seeds were more powerful ($t(202) = 5.49$, $p < .001$), that pumpkin seeds would more greatly increase bone density if it did increase a person's bone density ($t(202) = 5.04$, $p < .001$), and were more likely to eat pumpkin seeds ($t(202) = 3.76$, $p < .001$). A serial mediation with bootstrapping indicated that participants in the *Larger* (vs. *Smaller*) *Probability* condition were more likely to eat the seeds because they perceived them to be more powerful and thus would produce a larger boost in bone density. Study 6 leveraged a similar design in the field, and found that the current phenomenon shifts consumers' likelihood of clicking on online ads to purchase a promoted product ($\chi^2 = 5.64$, $p = .018$).

Study 5 found that this bias emerges because people believe larger probabilities emanate from more powerful causal antecedents that produce outcomes with larger magnitudes. As a result, Study 7 found that probability information no longer influences magnitude judgments when people believe that the antecedent that determines an outcome's magnitude is different than the antecedent that determines that outcome's probability. A 2 (Probability: Smaller vs. Larger) × 2 (Antecedent: Connected vs. Disconnected) ANOVA revealed a significant interaction ($F(1, 396) = 7.67$, $p = .006$): Probability information influenced magnitude perceptions when participants believed that the same antecedent determined both an outcome's probability and its magnitude ($F(1, 396) = 18.84$, $p < .001$), but not when they did not ($F(1, 396) = .14$, $p = .708$).

These findings provide novel insight into the inferences consumers draw from probabilities and the architecture of consumers' causal schemas. Importantly, the perceived magnitude of products' benefits is a dominant input into consumers' decisions about whether to purchase those products (Rundmo and Nordfjjaern 2017; Slovic 1964). Thus, our findings have numerous strategic implications.

How Uncertainty Boosts Confidence in Consumption Decisions

EXTENDED ABSTRACT

Could feeling uncertain increase consumers' confidence in their preferential choices? The answer to this question is not obvious. But it is important because decision confidence increases consumers' willingness to pay (Thomas and Menon 2007) and their likelihood to complete a purchase (Huang, Korfiatis, and Chang 2018), and it promotes favorable post-consumption evaluations (Heitmann, Lehmann, and Herrmann 2007).

According to prior research, incidental feelings of uncertainty undermine confidence in understanding (Clore and Parrott 1994), memory (Jacobson, Weary, and Lin 2008), predictions (Tiedens and Linton 2001), and causal judgments (Wichman, Brunner, and Weary 2008). Nevertheless, little is known about the influence of incidental uncertainty on consumers' confidence in their consumption decisions. The present research reveals that the impact of incidental uncertainty on confidence is not limited to the congruency effects demonstrated in other domains, but rather is context dependent. Evidence from three studies shows that the negative effect of incidental uncertainty on confidence vanishes, and even turns positive, when consumers make subjective (i.e., matters of taste) consumption decisions.

Intuitively, decision confidence is a belief in the correctness of a decision. But evidence points to cues from processing—fluency, speed, degree of deliberation and conflict—as the key drivers of decision confidence (Koriat 2012). We propose that the effect of incidental uncertainty on cues from processing differs depending on the context of the decision. Given the self-referential nature of subjective consumption decisions, we posit that increased processing motivation (Tiedens and Linton 2001) and greater semantic clustering (Bass, de Dreu, and Nijstad 2011, 2012) that arise under conditions of uncertainty prompt the generation of thoughts more favorable to the chosen alternative and lead to faster decision making. Rather than feeling more difficult, these cues signal greater confidence.

In Study 1, participants ($N = 405$) read a research abstract that manipulated incidental uncertainty vs. certainty (used in all studies; adapted from Faraji-Rad and Pham 2017). Participants decided between renting a functionally superior or an emotionally appealing apartment (Faraji-Rad and Pham 2017) and reported their confidence in and reasons for their decision. Participants' selection served as proxy for the objectivity of the decision (supported by analysis of reported reasons; significantly greater objectivity for the functionally superior apartment, $p < .001$). The congruency effect evidenced in past research emerges when the functionally superior apartment is chosen ($p = .018$) but vanishes when the emotionally appealing apartment is selected ($F_{1,402} = 0.04$), demonstrating that incidental uncertainty need not always undermine decision confidence.

In Study 2 we directly manipulated context to test our hypothesis that, unlike the judgments studied in the past, confidence in subjective preferential choices is boosted by incidental uncertainty. Participants ($N = 374$) either selected a painting from four alternatives (subjective choice) or responded to a reasoning problem (judgment). A directional congruency effect emerges in the judgment context, whereas uncertainty boosts decision confidence in the subjective choice, ($F_{1,371} = 3.97$, $p < .047$). Uncertainty increases the perceived difficulty of the judgment ($p = .031$), but not of the subjective choice ($t_{195} = 0.08$), suggesting decision difficulty does not explain the positive effects of uncertainty and pointing to a difference in the nature of processing between these two contexts.

Study 3 generalizes the positive effect of uncertainty to another consumption domain and probes the nature of decision processing in matters of subjective taste. Participants ($N = 118$) selected a video to watch from five comedy video screenshots (unknown to participants, all segments from the same video), reported decision confidence, decision difficulty, and thoughts they had about the selected video while making the decision, then watched the video. Uncertainty boosts decision confidence ($p = .012$) but has no detectable effect on difficulty ($t_{116} = 0.25$). Participants were asked if they recommend including the video in a collection of enjoyable videos for future research. Uncertainty increases recommendation ($p = .026$), an effect mediated by decision confidence ($b = .359$, 95% CI:[.045, .733]). Absence of a significant interaction with scores on the causal uncertainty scale ($\alpha = .90$; Weary and Edwards 1994) suggests the boundary condition found in prior research (effects limited to those scoring high; e.g., Jacobson et al. 2008) is not present in this context.

Critically, incidental uncertainty leads to thoughts that are marginally more semantically clustered ($p = .068$; Bhatia 2017, 2019; Hass 2017) and favorable to the chosen alternative ($p = .077$), and to faster decision making ($p = .038$).

This paper sheds new light on how feelings of uncertainty influence consumers' beliefs about the quality of their consumption decisions. In matters of subjective taste, consumers gain confidence from incidental feelings of uncertainty. These findings inject nuance into our understanding of the context dependent dynamics of decision processing, offering initial support for the novel proposal that engaging in more systematic subjective evaluation of choice alternatives may boost the fluency, speed, and favorability of decision processing.

REFERENCES

Ahluwalia, Rohini and Robert E Burnkrant (2004), "Answering Questions about Questions: A Persuasion Knowledge Perspective for Understanding the Effects of Rhetorical Questions," *Journal of Consumer Research*, 31(18), 26-42.

Alesina, Alberto, Edward Glaeser, and Edward Ludwig Glaeser (2004), *Fighting poverty in the US and Europe: A world of difference*. Oxford University Press.

Alvaredo, Facundo, Lucas Chancel, Thomas Piketty, Emmanuel Saez, and Gabriel Zucman (2018), *World Inequality Report 2018*. Belknap Press.

Aronson, Elliot, Judith A Turner, and J Merrill Carlsmith (1963), "Communicator Credibility and Communication Discrepancy Ad Determinants of Opinion Change," *Journal of Abnormal Psychology*, 67(1), 31–36.

Baas, Matthijs, Carsten De Dreu, and Bernard A. Nijstad (2011), "Creative Production by Angry People Peaks Early On, Decreases Over Time, and is Relatively Unstructured," *Journal of Experimental Social Psychology*, 47(6), 1107–1115.

Baas, Matthijs, Carsten De Dreu, and Bernard A. Nijstad (2012), "Emotions That Associate With Uncertainty Lead to Structured Ideation," *Emotion*, 12(5), 1004–1014.

Bassili, John N (1996), "Meta-Judgmental Versus Operative Indexes of Psychological Attributes: The case of measures of attitude strength," *Journal of Personality and Social Psychology*, 71(4), 637–653.

Bettman, James R., Mary Frances Luce, and John W. Payne (1998), "Constructive Consumer Choice Processes," *Journal of Consumer Research*, 25(3), 187–217.

Bhatia, Sudeep (2017), "Associative Judgment and Vector Space Semantics," *Psychological Review*, 124(1), 1–20.

Bhatia, Sudeep (2019), "Semantic Processes in Preferential Decision Making," *Journal of Experimental Psychology: Learning, Memory, and Cognition*, 45(4), 627–640.

Blankenship, Kevin L. and Traci Y. Craig (2007), "Language and Persuasion, Tag Questions as Powerless Speech or as Interpreted in Context," *Journal of Experimental Social Psychology, 43* (1), 112–18.

Blankenship, Kevin L. and Thomas Holtgraves (2005), "The Role of Different Markers of Linguistic Powerlessness in Persuasion," *Journal of Language and Social Psychology*, 24(1), 3–24.

Burnkrant, Robert E. and Daniel J Howard (1984), "Effects of the Use of Introductory Rhetorical Questions Versus Statements on Information Processing," *Journal of Personality and Social Psychology, 47*(6), 1218–30.

Chen, Serena, Kimberly Duckworth, and Shelly Chaiken (1999), "MotivatedHheuristic and Systematic Processing," *Psychological Inquiry*, 10(1), 44–49.

Clore, Gerald L. and W. Gerrod Parrott (1994), "Cognitive Feelings and Metacognitive Judgments," *European Journal of Social Psychology*, 24(1), 101–115.

Cojuharenco, Irina and Natalia Karelaia (2020), "When Leaders Ask Questions, Can Humility Premiums Buffer the Effects of Competence Penalties?" *Organizational Behavior and Human Decision Processes, 156* (January), 113–34.

Coombs, Clyde H. and David Beardslee (1954), "On Decision-Making Under Uncertainty," In R. M. Thrall, C. H. Coombs, and Davis R. L. (Eds.), *Decision processes* (pp. 255–285). Oxford, England: John Wiley and Sons, Inc.

Dhar, Sanjay K., Claudia González-Vallejo, and Dilip Soman (1999), "Modeling the Effects of Advertised Price Claims, Tensile Versus Precise Claims?" *Marketing Science*, 18(2), 154–77.

Ein-Gar, Danit, Baba Shiv, and Zakary L. Tormala (2012), "When Blemishing Leads to Blossoming, The Positive Effect of Negative Information," *Journal of Consumer Research*, 38(5), 846–59.

Etgar, Michael and Stephen A. Goodwin (1982), "One-Sided Versus Two-Sided Comparative Message Appeals for New Brand Introductions," *Journal of Consumer Research, 8*(4), 460.

Faraji-Rad, Ali and Michel Tuan Pham (2017), "Uncertainty Increases the Reliance on Affect in Decisions," *Journal of Consumer Research*, 44(1), 1–21.

Fazio, Russell H. and Mark P. Zanna (1978), "On the Predictive Validity of Attitudes: The Roles of Direct Experience and Confidence," *Journal of Personality*, 46(2), 228–243.

Fong, Christina (2001), "Social Preferences, self-Interest, and the Demand for Redistribution," *Journal of Public Economics*, 82(2), 225–246.

Fox, Craig R., and Gülden Ülkümen (2011), "Distinguishing two dimensions of uncertainty," *Perspectives on Thinking, Judging, and Decision Making*, 21–35.

Golden, Linda L., and Mark I. Alpert (1987), "Comparative Analysis of the Relative Effectiveness of One- and Two-Sided Communication for Contrasting Products." *Journal of Advertising, 16*(1), 18–68.

Goldsmith, Kelly and On Amir (2010), "Can Uncertainty Improve Promotions?" *Journal of Marketing Research 47*(6), 1070–77.

Gonzales, M. H. (1992), "A Thousand Pardons, The Effectiveness of Verbal Remedial Tactics During Account Episodes." *Journal of Language and Social Psychology 11*(3), 133–51.

Hass, Richard W. (2017), "Semantic Search During Divergent Thinking," *Cognition*, 166, 344–357.

Heitmann, Mark, Donald R. Lehmann, and Andreas Herrmann (2007), "Choice Goal Attainment and Decision and Consumption Satisfaction," *Journal of Marketing Research*, 44(2), 234–250.

Howard, Daniel J. (1990), "Rhetorical Question Effects on Message Processing and Persuasion, The Role of Information Availability and the Elicitation of Judgment." *Journal of Experimental Social Psychology*, 26(3), 217–39.

Howe, Lauren C., Bo MacInnis, Jon A. Krosnick, Ezra M. Markowitz, and Robert Socolow (2019), "Acknowledging Uncertainty Impacts Public Acceptance of Climate Scientists' Predictions." *Nature Climate Change*, October, 1-5.

Huang, Guei-Hua, Nikolaos Korfiatis, and Chun-Tuan Chang (2018), "Mobile Shopping Cart Abandonment: The Roles of Conflicts, Ambivalence, and Hesitation," *Journal of Business Research*, 85, 165–174.

Huang, Karen, Michael Yeomans, Alison Wood Brooks, Julia Minson, and Francesca Gino (2017), "It Doesn't Hurt to Ask, Question-Asking Increases Liking." *Journal of Personality and Social Psychology, 113*(3), 430–52.

Jacobson, Jill A., Gifford Weary, and Y. Sharon Lin (2008), "Causal Uncertainty and Metacognitive Inferences About Goal Attainment," *Cognition and Emotion*, 22(7), 1276–1305.

John, Leslie K., Martha Jeong, Francesca Gino, and Laura Huang (2019), "The Self-Presentational Consequences of Upholding One's Stance in Spite of the Evidence." *Organizational Behavior and Human Decision Processes*, 154 (September), 1–14.

Kahneman, Daniel and Amos Tversky (1982), "Variants of Uncertainty," *Cognition*, 11(2), 143–157.

Kamins, Michael A., Meribeth J. Brand, Stuart A. Hoeke, and John C. Moe (1989), "Two-Sided versus One-Sided Celebrity Endorsements, The Impact on Advertising Effectiveness and Credibility." *Journal of Advertising, 18*(2), 4–10.

Karmarkar, Uma R. and Zakary L. Tormala (2010), "Believe Me, I Have No Idea What I'm Talking About, The Effects of Source Certainty on Consumer Involvement and Persuasion." *Journal of Consumer Research, 36*(6), 1033–49.

Konow, James (2000), "Fair Shares: Accountability and Cognitive Dissonance in Allocation Decisions," *American Economic Review*, 90(4), 1072–1091.

Koriat, Asher (2012), "The Self-Consistency Model of Subjective Confidence," *Psychological review*, 119(1), 80.

Litt, Ab and Zakary L. Tormala (2010), "Fragile Enhancement of Attitudes and Intentions Following Difficult Decisions," *Journal of Consumer Research*, 37(4), 584–598.

Mishra, Himanshu, Arul Mishra, and Baba Shiv (2011), "In Praise of Vagueness, Malleability of Vague Information as a Performance Booster." *Psychological Science*, 22(6), 733–38.

Norton, Michael I., Jeana H. Frost, and Dan Ariely (2007), "Less Is More, The Lure of Ambiguity, or Why Familiarity Breeds Contempt." *Journal of Personality and Social Psychology*, 92(1), 97.

Petty, Richard E., John T. Cacioppo, and Martin Heesacker (1981), "Effects of Rhetorical Questions on Persuasion, A Cognitive Response Analysis." *Journal of Personality and Social Psychology* 40(3), 432–40.

Piketty, Thomas, and Emmanuel Saez (2014), "Inequality in the Long Run," *Science*, 344 (6186), 838–843.

Rabin, Matthew and Richard H. Thaler (2001), "Anomalies: Risk Aversion," *Journal of Economic Perspectives*, 15(1), 219-232.

Reich, Taly, Daniella M. Kupor, and Rosanna K. Smith (2017), "Made by Mistake, When Mistakes Increase Product Preference." *Journal of Consumer Research*, August 1085-1103.

Reich, Taly and Sam J. Maglio (2020), "Featuring Mistakes, The Persuasive Impact of Purchase Mistakes in Online Reviews." *Journal of Marketing*, *84*(1), 52–65.

Reich, Taly and Zakary L. Tormala (2013), "When Contradictions Foster Persuasion, An Attributional Perspective." *Journal of Experimental Social Psychology, 49*(3), 426–39.

Rundmo, Torbjørn and Trond Nordfjærn (2017), "Does Risk Perception Really Exist?" *Safety Science*, 93, 230–240.

Saez, Emmanuel, and Gabriel Zucman (2016), "Wealth Inequality in the United States Since 1913: Evidence from Capitalized Income Tax Data," *The Quarterly Journal of Economics*, *131* (2), 519–578.

Settle, Robert B. and Golden, Linda L (1974), "Attribution Theory and Advertiser Credibility." *Journal of Marketing Research, 11*(2), 181-185

Shen, Luxi, Ayelet Fishbach, and Christopher K. Hsee (2015), "The Motivating-Uncertainty Effect, Uncertainty Increases Resource Investment in the Process of Reward Pursuit." *Journal of Consumer Research*, *41*(5), 1301–15.

Shen, Luxi, Christopher K Hsee, and Joachim H Talloen (2019), "The Fun and Function of Uncertainty, Uncertain Incentives Reinforce Repetition Decisions." Edited by Gita V Johar, Amna Kirmani, and Stijn M J van Osselaer. *Journal of Consumer Research* 46 (1), 69–81.

Slovic, Paul (1964), "Assessment of Risk Taking Behavior," *Psychological Bulletin*, 61, 220–233.

Smith, Robert E. and Shelby D. Hunt (1978), "Attributional Processes and Effects in Promotional Situations." *Journal of Consumer Research*, 5(3), 149-158.

Tannenbaum, David, Craig R. Fox, and Gülden Ülkümen (2017), "Judgment Extremity and Accuracy Under Epistemic vs. Aleatory Uncertainty" *Management Science*, 63 (2), 497–518.

Tiedens, Larissa Z. and Susan Linton (2001), "Judgment Under Emotional Certainty and Uncertainty: The Effects of Specific Emotions on Information Processing," *Journal of Personality and Social Psychology y*, *81*(6), 973–988.

Thomas, Manoj and Geeta Menon (2007), "When Internal Reference Prices and Price Expectations Diverge: The role of confidence," *Journal of Marketing Research*, 44(3), 401–409.

Ülkümen, Gülden, Craig R. Fox, and Bertram F. Malle (2016), "Two Dimensions of Subjective Uncertainty: Clues from Natural Language," *Journal of Experimental Psychology: General*, *145* (10), 1280.

Weary, Gifford and John A. Edwards (1994), "Individual Differences in Causal Uncertainty," *Journal of Personality and Social Psychology*, *67*(2), 308.

Wichman, Aaron L., Ryan P. Brunner, and Gifford Weary (2008), "Immediate and Delayed Effects of Causal Uncertainty Inductions on Uncertainty Accessibility," *Journal of Experimental Social Psychology*, 44(4), 1106–1113.

Zillmann, Dolf (1972), "Rhetorical Elicitation of Agreement in Persuasion." *Journal of Personality and Social Psychology*, *21*(2), 159–65.

Zillmann, Dolf and Joanne R. Cantor (1974), "Rhetorical Elicitation of Concession in Persuasion." *Journal of Social Psychology*, *94*, 223–36.

Zucman, Gabriel (2019), "Global Wealth Inequality," *Annual Review of Economics*, *11*.

Novel Effects of Context on Preference Formation

Chair: Ioannis Evangelidis, ESADE Business School, Spain

Paper #1: The Contingent Impact of Context on Choice versus Valuation

Fuad A. Shennib, Stanford Graduate School of Business, USA

Ioannis Evangelidis, ESADE Business School, Universitat Ramon Llull, Spain

Minah Jung, New York University, USA

Paper #2: Invoking Identity Changes How Consumers Resolve Tradeoffs

Franklyn Shaddy, UCLA Anderson School of Management, USA

Ayelet Fishbach, University of Chicago Booth School of Business, USA

Itamar Simonson, Stanford Graduate School of Business, USA

Paper #3: Symmetric Dominance

Ioannis Evangelidis, ESADE Business School, Universitat Ramon Llull, Spain

Jonathan Levav, Stanford Graduate School of Business, Stanford University, USA

Itamar Simonson, Stanford Graduate School of Business, Stanford University, USA

Paper #4: The Attraction Effect in Product Size Judgments

Sophie Alman, University of Chicago Booth School of Business, USA

Oleg Urminsky, University of Chicago Booth School of Business, USA

SESSION OVERVIEW

Decades of work in consumer research and psychology provides evidence that consumers' preferences depend on the context in which they are constructed. Classic work on context effects shows that, contrary to normative theory, preference for a given product can depend on the presence (vs. absence) of other—often irrelevant—options in the choice set. Recent research has challenged the robustness of these effects (Evangelidis et al., 2018; Frederick et al., 2014; Yang and Lynn, 2014), while introducing important boundary conditions of their occurrence. In this session, we collectively build on this work by advancing novel factors that drive the occurrence of context effects, ad demonstrate entirely new context effects.

Shennib, Evangelidis, and Jung investigate the occurrence of context effects in two common elicitation procedures: choice and willingness-to-pay. They demonstrate that attraction and compromise effects replicate in choice, but are eliminated (attraction) or reversed (compromise) in willingness-to-pay because the latter is predominantly driven by price perceptions that are stable across contexts.

Shaddy, Fishbach, and Simonson find that identity expression systematically attenuates variety seeking, the compromise effect, and balancing (vs. highlighting) between goals. The authors identify a mechanism: that, when it comes to identity, consumers want to avoid sending mixed signals. Identify expression, therefore, influences consumers' tradeoffs by reducing the appeal of mixed solutions, which partially satisfies multiple considerations or goals.

Evangelidis, Levav, and Simonson demonstrate a novel context effect, symmetric dominance, whereby preference between a high-quality high-price option and a low-quality low-price alternative can be influenced by the addition of a decoy option that is dominated by both alternatives (i.e., a low-quality high-price option). They show that this effect is observed because consumers will feel better about—and anticipate lower feelings of regret from—choosing the high-quality high-price option in the presence (vs. absence) of the decoy.

Finally, contrary to earlier research (Frederick et al. 2014; Yang and Lynn, 2014), Alman and Urminsky provide evidence for the attraction effect using visual stimuli. They show that the attraction effect can be observed when making size judgments between visually-presented product packages and when choosing between equally-priced products. They also find that package orientation biases size judgments, moderating the attraction effect.

Taken together, this session contributes to the understanding of how consumers construct their preferences as a function of the decision context. Our work expands the understanding of drivers that influence consumers' tendencies to rely on the context during decision-making.

The Contingent Impact of Context on Choice versus Valuation

EXTENDED ABSTRACT

Consumers' preferences are often swayed by the decision context. Context effects, in which the addition of a new option to a binary set affects preferences for a (target) option, have been well established across social-science disciplines (e.g., Huber, Payne, and Puto 1982; Simonson 1989). Using two frequently employed elicitation methods—choice and willingness-to-pay (WTP), we demonstrate that the occurrence of context effects critically depends on the elicitation procedures used.

We conjecture that the elicitation method impacts how preferences are constructed (Tversky, Sattath, and Slovic 1988). In choice, consumers predominantly rely on attribute weights to construct preferences. In WTP tasks, consumers rely on price perceptions rather than attribute weights. In turn, they report higher WTP amounts for options perceived to be more expensive, reversing preferences from the same compromise set in a choice task. Further, we propose that consumers will be less likely to prefer asymmetrically dominating options in WTP than choice, because dominance should not influence price perceptions. In two pre-registered studies, we test our predictions using classic compromise and attraction effect paradigms.

In Study 1, participants (N=400) were randomly assigned to one of four conditions in a 2 (elicitation: Choice vs WTP) x 2 (options: AB vs ABC) between-subjects design. Participants in the AB conditions made a choice between two options or reported the maximum price they would be WTP for both options, separately. Similarly, participants in the ABC conditions made one choice among three options, which included the same AB options in addition to a C option, or expressed their WTP for all options, separately. Prior literature has demonstrated greater choice preferences for the compromise/middle option in the ABC set relative to the same option in the AB set (Simonson, 1989). To create comparable metrics between choice and WTP, we converted WTP into a binary (AB) or trinary (ABC) preference indicator, such that, in each set, preferences were coded as the option that participants were WTP most for. Preferences in the choice conditions were participants' choices of one option in the set.

Participants in each condition responded to two product sets, randomly ordered: BBQ grills and flashlights. Each product included two attributes (e.g., a flashlight's brightness and battery life). One attribute increased in superiority while the other attribute decreased.

Results showed that, in choice, participants selected the compromise options more so in the ABC sets (61.3%) than the AB sets (58.6%). In WTP, however, participants preferred the compromise option strikingly less in the ABC sets (*9.9%*) than the AB sets (*82.0%*) resulting in a highly significant interaction (β = -3.85, SE = .41, Z = -9.35, p < .001). That is, in the ABC WTP conditions, participants were rarely WTP most for the middle options despite their ABC choice counterparts preferring this option more than 60% of the time.

Study 2 (N = 546) was identical to Study 1 except that we also tested (a) the attraction effect and (b) two mechanisms underlying the effects in WTP and choice. In the attraction effect, options A and B are the same as in compromise sets, but C is known as a "decoy" that is asymmetrically dominated by—and thus increases preference for—one of the two options (Huber et al. 1982). Participants responded to four randomized products: two compromise sets that included BBQ grills and headphones and two attraction sets that included water bottles and flashlights.

For the compromise sets, we replicated the interaction from Study 1 (β = 1.76, SE = .31, Z = 5.67, p < .001). Regarding the attraction sets, in choice, participants selected the dominating options more so in the ABC set (80.1%) than the AB set (57.7%). In WTP, however, participants valued the dominating option less in the ABC set (40.5%) than the AB set (57.6%). The interaction was highly significant (β = 1.76, SE = .30, Z = 5.87, p < .001).

We then examined the mechanisms underlying the observed preference reversals. We hypothesize that WTP amounts are driven by perceived prices, explaining higher WTP amounts for extreme options when there is one dominating attribute the set. In choice, however, we hypothesize that individuals select options that rely more so on subjective attribute weights. We tested our predictions by having participants select the option in each set that they believed was the most expensive and to rate how important each attribute was in determining their responses from 1(not important at all) to 7(extremely important).

Across the compromise and attraction sets, separately, we found that, in WTP, preferences were significantly more associated with price perceptions than in choice. Put differently, those who were WTP most for the compromise/attractive or extreme/non-dominating option were also more likely to perceive that option to be the most expensive, whereas in choice, preferences were unrelated to price perceptions (Elicitation X Price Perception in compromise sets: β = 1.37, SE = .58, Z = 2.37, p = .018; in attraction sets: β = 1.67, SE = .38, Z = 4.43, p < .001).

For the attribute weights mechanism, the results were, again, consistent with our predictions: in choice, attribute weight scores predicted preferences for the compromise/attractive options. However, in WTP, preferences were unrelated to attribute weights. Put simply, in choice, individuals factor in the attributes and their levels in the option-sets significantly more so than in WTP (Elicitation X Attribute Weights in compromise sets: β = .97, SE = .25, Z = 3.91, p < .001; in attraction sets: β = -.27, SE = .12, z = -2.30, p = .021).

Our results highlight that the extent to which consumers rely on context is contingent on the elicitation procedure. To researchers and practitioners, this suggests using precaution when selecting a method to elicit consumer preferences, as the generalizability of the results may vary as a function of the elicitation procedure. Behavioral researchers have studied context effects primarily using choice procedures. Given the normative assumption of procedural invariance, one would expect context effects to replicate across other procedures, yet our data pose a challenge to this assumption.

Invoking Identity Changes How Consumers Resolve Tradeoffs

EXTENDED ABSTRACT

"We are what we repeatedly do."
–Aristotle (allegedly)

Marketers frequently invoke identity. For example, the makers of Jim Beam bourbon declare: "Guys never change. Neither do we." The fast food restaurant Wendy's explains: "Paul does the Paul burger, not a generic John Doe burger—don't compromise." Mercedes-Benz claims its SLK roadster is "as extreme as you." Is it simply coincidental that these references to specific identities (e.g., "guys") are often paired with appeals like "never change"? Or might invoking identity actually increase the likelihood that consumers will refuse to "compromise" and instead choose to be "extreme"?

In this research, we answer this question by documenting how identity expression systematically changes the way consumers resolve tradeoffs. Specifically, we find that it reduces the appeal of mixed solutions—outcomes that partially satisfy multiple considerations (e.g., tastes, attributes, goals, etc.). This is because when people view decisions as expressions of identity, they are uncomfortable sending mixed signals—both to themselves and to others (Berger and Heath 2007; Rifkin and Etkin 2019; White and Dahl 2006).

We explore the consequences shifting consumers' tradeoff resolution strategies by examining several seemingly unrelated and well-known choice effects. Variety seeking, the compromise effect, and balancing between goals all represent outcomes that partially satisfy multiple considerations—competing tastes, in the case of variety seeking (Kahn 1995; Simonson 1990); competing attributes, in the case of the compromise effect (Simonson 1989); and competing goals, in the case of balancing (Fishbach and Dhar 2005). Consequently, if invoking identity reduces the appeal of mixed solutions—because people are uncomfortable sending mixed signals—then it should systematically attenuate all three.

Importantly, while previous research has documented the various ways in which identity changes *what* people choose—someone with a "rugged" identity, for example, might opt for a similarly "rugged" Jeep (Aaker 1997; Belk 1988; Escalas and Bettman 2005; LaBeouf, Shafir, and Bayuk 2010; Reed 2004)—we examine the way in which identity changes *how* people choose.

Seven studies (*N*=2,213) tested this account. In S1, a field study, we offered two free snacks to passers-by in a university student union: potato chips (indulgent) and pea crisps (healthy). Participants could choose one of each or two of the same snacks, and we manipulated the contents of the signs advertising the snacks. The identity-invoking sign read: "Who are you? I am a health-conscious snacker" vs. "I am an indulgent fun-loving snacker." The control sign read: "Which snacks will you choose?" Research assistants surreptitiously recorded actual choices, observing less variety seeking (i.e., choice of one of each snack) in the identity condition (26% vs. 43%; *b*=—.94, SE=.33, *z*=—2.82, *p*=.005).

In S2–4 (all preregistered), we modified a single basic scenario (e.g., choosing a car) to test all three choice effects, predicting that prompting participants to express their identity would attenuate variety seeking (S2), the compromise effect (S3), and balancing (S4).

In S2, participants were less likely to rent different cars on each of two different weekends (i.e., seek variety) when prompted to consider their identity (e.g., "Which type of car best reflects your identity?"; 17% vs. 46%; χ²(1)=19.34, *p*<.001). In S3, participants were similarly less likely to choose the middle option when purchas-

ing one of three cars when prompted to consider their identity (e.g., "Which car…best reflects your identity?"; 47% vs. 64%; χ²(1)=5.38, *p*=.020). Finally, in S4, participants imagined having recently saved money. Those who reflected on their identity (e.g., "Does [saving money] make you feel like the kind of person who is financially responsible?") were less likely to subsequently spend extra money upgrading a rental car (i.e., balance between saving and spending goals; *M*=2.32 vs. *M*=3.35; *F*(1, 398)=12.39, *p*<.001).

We next designed S5–7 to test for process. Specifically, we measured participants' tradeoff resolution strategies directly with a scale that we developed. Participants indicated agreement or disagreement (e.g., "To what extent does each statement below describe how you made your choice?") with statements like: "try to get a little bit of everything," "set priorities and go with the top priority," and "find the middle ground." We predicted that the reduced appeal of mixed solutions (as measured by our scale) would mediate the attenuating effect of invoking identity on variety seeking, the compromise effect, and balancing.

In S5, participants were less likely to vacation in different countries each of two different years (i.e., seek variety) when prompted to consider their identity (e.g., "These trips will help define and reinforce your identity"; 58% vs. 78%; χ²(1)=19.31, *p*<.001). In S6, participants were similarly less likely to choose the middle option when renting one of three apartments when prompted to consider their identity (e.g., "If you were trying to communicate [your] identity… which apartment would you choose?"; 42% vs. 55%; χ²(1)=6.40, *p*=.011). Finally, in S7, participants imagined having recently helped clean a park (i.e., making progress toward an environmental goal). Those who viewed environmental consciousness as part of their identity were less likely to subsequently purchase an environmentally *un*friendly, but cheaper and more effective cleaning spray (i.e., balance between hedonic and utilitarian goals; *M*=2.93 vs. *M*=3.44; *t*(397)=2.57, *p*=.011). Moreover, in all three of S5–7, the reduced appeal of mixed solutions mediated the attenuating effect of identity expression on variety seeking, the compromise effect, and balancing.

This work (1) contributes a new insight to the literature explicating the role of identity in consumer decision making, (2) provides a unique theoretical lens with which to reconcile potentially competing predictions for when opposite choice effects will arise (e.g., variety seeking vs. consistency seeking), and (3) illuminates the psychological processes governing tradeoff resolution, more broadly. And with respect to marketing practice, we offer that managers would be wise to use these findings to strategically attenuate or amplify these choice effects in the marketplace—especially given that our results suggest many well-known decision phenomena may not be as universal (or unique) as previously assumed.

Symmetric Dominance

EXTENDED ABSTRACT

Decades of research in marketing and psychology corroborate that—contrary to normative theory—preference for a given option is contingent on the decision context. Perhaps the most prominent empirical finding from this research is the asymmetric dominance effect (Huber, Payne, & Puto, 1982). Asymmetric dominance describes the finding that adding a decoy option that is dominated by only one of two alternatives in a binary set increases the choice share of the dominating (target) option. In this paper, we demonstrate another context effect—symmetric dominance—that has surprisingly eluded earlier research. Symmetric dominance pertains to the case of adding a symmetrically dominated option to a binary set characterized by a tradeoff between price and quality. Intuitively, the introduction of the symmetric decoy should not influence relative preference because the decoy is dominated by both alternatives. For example, consider the following experiment. In the control condition, participants are asked to choose between a 1TB hard drive that costs $40 and a 2TB drive that costs $80. In the experimental condition, participants are presented with the same two options, as well as a symmetrically dominated option: a 1TB drive priced at $80. Here, the decoy is dominated by both of the original alternatives. It has the same capacity as the 1TB drive but is more expensive, while it has the same price but less capacity compared to the 2TB drive. Although the symmetric decoy does not seem to favor one of the dominating alternatives over the other, we posit that it can actually exert a systematic impact on preference. In the absence of the decoy option, individuals may covet the 2TB drive, but may find it difficult to justify paying $40 more (vs. the 1TB drive). Consequently, individuals may defer choice. However, the introduction of the decoy provides a compelling reason for choosing the 2TB drive: compared to the decoy, choice of the 2TB implies getting more capacity without incurring additional costs. Thus, we argue that consumers, who have an innate preference for the 2TB drive may find it easier to justify its purchase—and thus select that option more frequently—when choosing from the trinary compared to the binary set. Symmetric dominance may seem rather unintuitive because, in theory, the presence of the decoy provides a reason for choosing either one of the two dominating options. To allow for symmetric dominance, we posit that consumers will be more likely to rely on the comparison between the high-quality high-price option (e.g., the 2TB drive) and the decoy compared to the comparison between the low-quality low-price option (e.g., the 1TB drive) and the decoy when choosing from the trinary set. In turn, the symmetrically dominated decoy option will provide an asymmetric advantage to the high-quality high-price option over the low-quality low-price competitor. Consumers will feel better about—and anticipate lower regret from—choosing the high-quality high-price option in the presence (vs. absence) of the decoy.

We provide evidence for symmetric dominance in five well-powered preregistered experimental studies (total N = 5,888). Study 1 shows robust evidence for the effects using five different sets of stimuli: backpacks, Bluetooth speakers, external hard drives, hotels, and TVs. Participants were more likely to select the high-quality high-price options when the symmetrically dominated decoys were added to the choice sets compared to the control two-option conditions (p < .001). Further, participants were less likely to defer choice (i.e., search for other options) when the symmetrically dominated options were introduced to the set compared to the two-option conditions (p < .001). Both effects were robust across stimuli.

Study 2 provides further evidence of the effect using actual purchase decisions of laptop bags. Participants were more likely to select a high-quality high-price laptop bag when a symmetrically dominated decoy bag was added to the choice set compared to the control two-option condition (p = .048). Further, participants were less likely to defer choice (i.e., not purchase a bag) when the decoy option was introduced to the set compared to the two-option condition (p = .014).

Study 3 provides evidence for the process underlying the effects. First, we replicate our basic results (p < .006). Further, we show that our effect is mediated by feelings of regret (ab = .053, 91% LLCI = .001, ULCI = .124) rather than changes in the importance that participants afford to the different attributes (ab = -.029, 91% LLCI = -.224, ULCI = .165). In the presence (vs. absence) of the decoy, participants anticipate weaker feelings of regret from the choice of the high-quality high-price option relative to the choice of

the low-quality low-price alternative. In turn, the decrease in anticipated regret leads to a higher incidence of choice of the high-quality high-price option. Our process evidence suggests that consumers desire, but are reluctant to choose the high-quality high-price option in the absence of the decoy. However, in the presence of the decoy, consumers tend to use that option in order to support choice of the desired high-quality high-price alternative, leading to lower feelings of anticipated regret.

Further studies provide evidence for two moderators of the effect. Study 4 shows that the symmetric dominance effect is larger in magnitude when the decoy is located next to the high-quality high-price option (p < .001) compared to when it is located next to the low-price low-quality alternative (p < .001; interaction p = .013). Presumably, it is easier for people to rely on the comparison between the high-quality high-price option and the decoy when the two options are adjacent to each other. Finally, Study 5 shows that symmetric dominance replicates when there is a trade-off between price and quality (p < .001), but is eliminated when the two focal options present a trade-off on two attributes, both of which are associated with product quality (p = .187; interaction p = .055). Thus, symmetric dominance is more likely to manifest in consumer decisions that involve price-quality tradeoffs.

Overall, our work has important implications for decision-making theory because no extant theoretical framework or model can accommodate these effects.

The Attraction Effect in Product Size Judgments

EXTENDED ABSTRACT

Marketers attempt to present products so that they appear more attractive than competing products. Context effects have been widely studied as influencing the relative appeal of consumer products. In particular, the attraction effect occurs when a decoy option that is asymmetrically dominated by a target option increases the choice share of that dominating target option when the decoy is added to a binary choice set (Huber, Payne, and Puto, 1982; Huber and Puto, 1983). While the attraction effect has been observed in a large range of contexts when stimuli are depicted as stylized or numeric (Tversky, 1972; Pan, O'Curry, and Pitts, 1995; Simonson, 1989; Huber et al.,1982), the robustness of the attraction effect with perceptual stimuli has recently been called into question (Frederick et al., 2014; Yang and Lynn, 2014). Across four pre-registered studies, including paper and pencil and online studies, we demonstrate that the attraction effect is observed when making size judgments between visually presented product packages and when choosing between equally priced products. We also identify important factors influencing the robustness of the effect, particularly the importance of vertical vs. horizontal package orientation.

In our first experiment, building on recent research demonstrating context effects with geometric shapes (Trueblood et al., 2013), we tested whether the attraction effect is observed when making size judgments between product packages. Front-facing mock product packages were created for eight different brands; Barilla penne pasta, Ritz crackers, Cheezits crackers, Cheerios cereal, Chips Ahoy cookies, Jell-O mix, Domino sugar, and Tootsie Pops. For each brand, equal-area horizontally and vertically oriented boxes were created, which had the same dimensions with width and height reversed (except for Chips Ahoy).

A range-decoy image was then created for each package. Vertical range decoys were less wide than vertical targets, and horizontal decoys were shorter than horizontal targets. Each image was also produced in an alternative color scheme, not used in the market. For each brand, participants were shown binary trials with identically sized vertical and horizontal packages and ternary trials in which a decoy option was added, asymmetrically dominated by one of the packages. The order of options from left to right, their orientations, and colors were all randomized. The attraction effect would be observed if the probability of selecting the target option in a ternary trial was significantly greater than the probability of selecting the same option in a binary trial.

Results from Experiment 1 ($N = 376$) revealed an overall attraction effect for size judgments among visually presented consumer goods packages ($\chi^2(1, N = 2107) = 20.20$, p < 0.001, $d = 0.11$).

This was generally consistent across brands except for the differently shaped Chips Ahoy packages, where the addition of a decoy decreased the choice share of the associated target option ($\chi^2(1, N = 266) = 6.33$, p = 0.012, $d = -0.19$). Importantly, analyses revealed that the attraction effect, across all brands aside from Chips Ahoy, was only observed when the target and decoy options were vertical ($\chi^2(1, N = 923) = 76.77$, p < 0.001, $d = 0.49$) but not horizontal ($\chi^2(1, N = 918) = 1.29$, p = 0.26, $d = -0.05$). We also found a strong horizontal bias, such that people viewed the horizontal package as larger than the equally-sized vertical package the majority (77%) of the time. Thus, the attraction effect being moderated by target package orientation is consistent with Evangelidis, Levav, and Simonson (2018), which finds stronger attraction effects when the decoy is dominated by the less preferred option.

In experiment 2 ($N = 278$), we replicated the visual package-size attraction effect in an in-person, paper and pencil survey in which participants selected the largest Cheez-Its box from either a binary set or from a ternary set with a decoy, which increased selection of the target option as larger ($t(274.89) = 3.49$, p < 0.001, $d = 0.42$).

In Experiment 3 ($N = 352$), we systematically varied the package dimensions and orientation as potential moderators of the attraction effect. Participants judged the largest in binary or ternary sets of packages, with eight different dimensions, ranging from near square to highly elongated (e.g., as in the Chips Ahoy boxes in Experiment 1). In each binary pair, the two packages (one vertical, one horizontal) had the same surface area. In the ternary sets, a decoy package was added. We again found an overall attraction effect ($\chi^2(1, N = 1994) = 34.47$, p < 0.001, $d = 0.15$), significant when the target was vertical ($\chi^2(1, N = 979) = 49.31$, p < 0.001, $d = 0.28$) but not when the target was horizontal ($\chi^2(1, N = 1015) = 0.65$, p = 0.422, $d = 0.03$), as in Experiment 1. However, the degree of elongation of the packages did not moderate the attraction effect, either as a main effect ($\beta = -0.07$, p = 0.800) or in a non-linear relationship ($\beta = 0.04$, p = 0.290). Results were robust to different types of decoys (e.g., range vs. frequency).

In Experiment 4 ($N = 446$), we extended our findings from size judgments to product choices in which size was the primary basis for decision. We asked participants to choose which hypothetical package of crackers to purchase (from either the binary set or ternary set), with all options priced equally at $3.29. Participants made multiple choices, varying the elongation of the packages across choice sets as in Experiment 3. We observed an overall attraction effect ($\chi^2(1, N = 2166) = 20.49$, p = < 0.001, $d = 0.10$) which was significant for both vertical trials ($\chi^2(1, N = 1082) = 16.50$, p = < 0.001, $d = 0.13$) and horizontal trials ($\chi^2(1, N = 1084) = 5.10$, p = 0.02, $d = 0.07$), albeit with small effect sizes when the target was horizontal.

Overall, these findings demonstrate that the attraction effect occurs for visual stimuli, affecting both prompted size judgments and choices among equally priced options. These findings provide robust

support for the practical application of the attraction effect in consumer settings.

REFERENCES

The Contingent Impact of Context on Choice versus Valuation

Huber, J., Payne, J. W., & Puto, C. (1982). Adding asymmetrically dominated alternatives: Violations of regularity and the similarity hypothesis. *Journal of Consumer Research, 9*(1), 90-98.

Simonson, I. (1989). Choice Based on Reasons: The Case of Attraction and Compromise Effects. *Journal of Consumer Research*, 16(2), 158-174.

Tversky, A., Sattath, S., and Slavic, P. (1988). Contingent weighting in judgment and choice. *Psychological Review*, 95, 371–384.

The Motivating Role of Disassociative Out-groups in Encouraging Sustainable Consumer Behavior

Aaker, Jennifer L. (1999), "The Malleable Self: The Role of Self-Expression in Persuasion," Journal of Marketing Research, 36 (1), 45–57.

Belk, Russell W. (1988), "Possessions and the Extended Self," Journal of Consumer Research, 15 (2), 139–168

Berger, Jonah, and Chip Heath (2007), "Where Consumers Diverge From Others: Identity Signaling and Product Domains," Journal of Consumer Research, 34 (2), 121–134.

Escalas, Jennifer Edson, and James R. Bettman (2005), "Self-Construal, Reference Groups, and Brand Meaning," Journal of Consumer Research, 32 (3), 378–389.

Fishbach, Ayelet, and Ravi Dhar (2005), "Goals as Excuses or Guides: The Liberating Effect of Perceived Goal Progress on Choice," Journal of Consumer Research, 32 (3), 370–377.

Kahn, Barbara E. (1995), "Consumer Variety-Seeking Among Goods and Services: An Integrative Review," Journal of Retailing and Consumer Services, 2 (3), 139–148.

LeBoeuf, Robyn A., Eldar Shafir, and Julia Belyavsky Bayuk (2010), "The Conflicting Choices of Alternating Selves," Organizational Behavior and Human Decision Processes, 111 (1), 48–61.

Reed, Americus (2004), "Activating the Self-Importance of Consumer Selves: Exploring Identity Salience Effects on Judgments," Journal of Consumer Research, 31 (2), 286–295.

Rifkin, Jacqueline R., and Jordan Etkin (2019), "Variety in Self-Expression Undermines Self-Continuity," Journal of Consumer Research, 46 (4), 725–749.

Simonson, Itamar (1989), "Choice Based on Reasons: The Case of Attraction and Compromise Effects," Journal of Consumer Research, 16 (2), 158–174.

Simonson, Itamar (1990), "The Effect of Purchase Quantity and Timing on Variety-Seeking Behavior," Journal of Marketing Research, 27 (2), 150–162.

White, Katherine, and Darren W. Dahl (2006), "To Be or Not Be? The Influence of Dissociative Reference Groups on Consumer Preferences," Journal of Consumer Psychology, 16 (4), 404–414.

Symmetric Dominance

Huber, Joel, John W. Payne, and Christopher Puto (1982), "Adding Asymmetrically Dominated Alternatives: Violations of Regularity and the Similarity Hypothesis," *Journal of Consumer Research,* 9 (June), 90-8.

The Attraction Effect in Product Size Judgments

Evangelidis, I., Levav, J., & Simonson, I. (2018). "The asymmetric impact of context on advantaged versus disadvantaged options." *Journal of Marketing Research, 55* (2), 239-253.

Frederick, S., Lee, L., & Baskin, E. (2014) "The Limits of Attraction," *Journal of Marketing Research*, *51* (4), 487-507.

Huber, J., Payne, J. W., & Puto, C. (1982). "Adding asymmetrically dominated alternatives: Violations of regularity and the similarity hypothesis." *Journal of Consumer Research*, *9*, 90–98.

Huber, J., & Christopher, P. (1983), "Market Boundaries and Product Choice: Illustrating Attraction and Substitution Effects," *Journal of Consumer Research*, *10* (1), 31-44.

Pan, Y., O'Curry, S., & Pitts, R. (1995). "The attraction effect and political choice in two elections." *Journal of Consumer Psychology*, *4*, 85–101.

Simonson, I. (1989). Choice based on reasons: "The case of attraction and compromise effects." *Journal of Consumer Research*, *16*, 158–174.

Trueblood, J. S., Drown, S., Heathcote, A., & Busemeyer, J. R. (2013), "Not just for consumers: Context effects are fundamental to decision-making," *Psychological Science*, *24* (4), 1-8

Tversky, A. (1972), "Elimination by aspects: A theory of choice," Psychological Review*, 79* (July): 281-99.

Yang, S. and Lynn, M. (2014). "More evidence challenging the robustness and usefulness of the attraction effect," *Journal of Marketing Research, 51* (4), 508-513.

From "Me" to "Vous": Language and Culture in Consumer Behavior

Chairs: Ann Kronrod, University of Massachusetts, Lowell, USA
Ruth Pogacar, University of Calgary, Canada

Paper #1: Brand Names and Country Brand Personality DNA
Ella Karat, University of Massachusetts, Lowell, USA
Ann Kronrod, University of Massachusetts, Lowell, USA

Paper #2: Is Nestlé a Lady? Brand Name Gender and Loyalty Attitudes
Ruth Pogacar, University of Calgary, Canada
Justin Angle, University of Montana, USA
L. J. Shrum, HEC Paris, France
Frank Kardes, University of Cincinnati, USA
Tina M. Lowrey, HEC Paris, France

Paper #3: Precisely Unique: Semantic Precision Increases Perceived Uniqueness of Cultural Products
Vincent Xie, University of Massachusetts, Boston, USA
Ann Kronrod, University of Massachusetts, Lowell, USA

SESSION OVERVIEW

This session embraces the rendez-vous conference theme by examining the role of language and culture in consumer behavior. Each paper takes a slightly different focus—on consumer perceptions, evaluations, or decisions—using experimental and field data to provide a rich understanding of the following topics: How does country personality influence brand perceptions via cultural stereotypes? Why do brand names ending in vowels trigger cultural associations with gender and warmth, increasing loyalty attitudes? And why does semantic precision increase perceived uniqueness of cultural products?

Karat and Kronrod introduce Country Personality DNA—the unique combination of human traits that are associated with a country—and explore how it influences perceptions of brands whose names sound typical of a specific country. Their results suggest that countries possess a distinct set of four "core gene" personality traits, and that new brands whose names sound like they originated from a particular country "inherit" these traits. This topic is of particular importance given the growing global marketplace.

Pogacar, Angle, Shrum, Kardes, and Lowrey focus on the cultural effect of gender perceptions activated by brand names. The authors demonstrate that brand name length, stress, and vowel ending influence perceptions of brand name gender. Feminine name gender in turn leads to cultural inferences of warmth, which results in enhanced loyalty. The authors use both experimental and observational data, real and invented brands, and consequential and hypothetical choices. These findings have important implications for naming products that should seem 'warm' (and those that shouldn't).

Lastly, Xie and Kronrod's work reveals the novel link between semantic precision and perceptions of uniqueness of cultural products. The mere presence of more precise language, even about non-central product attributes, influences the perceived cognitive distance of the words, and increases perceived product uniqueness for cultural products like international tourism. This finding is relevant given the demand for unique consumer experiences, and the saturation of competing products vying to meet these demands.

Together the papers in this session highlight the important role of language and culture in consumer behavior. Each work addresses a unique aspect of this topic: foreign language brand names; brand names and gender associations; language precision and cultural products. Given the array of questions addressed, we expect to draw a broad audience and to spark an interesting rendez-vous among attendees interested in language, culture, marketing communication, advertising, and branding.

Brand Names and Country Brand Personality DNA

EXTENDED ABSTRACT

This work introduces "Country Personality DNA" – the unique combination of human characteristics that are associated with a country – and explores the way it influences perceptions of new brands whose names sound typical to a specific country. Drawing from literature on branding, country of origin and country stereotypes, the work tests how spelling a brand name in a foreign language triggers associations with that country, and more specifically, with the specific set of human personality traits that belongs to that country.

In this study, we treat "Country Personality DNA" as a metaphor for a country's hereditary brand personality. Through this lens, we examine the way countries with high brand equity, such as France, Germany or Japan, can pass on their recognizable personality traits to new brands with names that sound as if they originated from these countries. This is done through the process of instant activation of stereotypical personality traits associated with these countries. Based on these logical links we first theorize that countries have unique and identifiable combinations of humanlike personality traits (Country Personality DNA) in people's perceptions. Further, following the DNA metaphor, we suggest that the country acts as a "parent" to the "child" brand, and the child brand inherits this unique set of personality traits, which we call the "core genes".

"Core genes" are the country's *highest ranking four personality* traits. Just like the four genes that make up the human DNA, these genes have the strongest association with the "parent" country, and have the highest potential of being inherited by the "child" brand.

Based on this reasoning, we next predict that a brand name that sounds like it originated from a particular country should "inherit" that country's personality DNA — its unique combination of personality traits—and consequently consumers associate similar traits with that brand. Thus, we predict that new brand names that resemble a particular country-of-origin language—even if they are fictitious—carry the same perceived "genetic make-up" (DNA traits) of their parent country's brand.

Method

In our studies we focused on two of the G7 European countries (France, Germany) and one East Asian country (Japan), mainly because they are well-known countries which are similar to each other in terms of industrial and economic growth (Laš, 2018). In addition, these countries have identifiable different languages. Study 1 identifies the 'core genes' that make up the unique combination of country personality DNA for France, Germany and Japan. We first selected 29 personality traits from a pool identified in studies by Aaker *et al.,* (2001), and Ferrandi *et al.,* (2000) and Bosnjak *et al.,* (2007). These traits were: Sincere, Kind, Spirited, Optimistic, Independent, Reliable, Intelligent, Confident, Glamorous, Charming, Sophisticated, Good-looking, Shy, Sentimental, Affectionate, Tender, Genuine, Stable, Aggressive, Tough, Elegant, Romantic, Peaceful, Naïve, Dependent, Dignified, Funny, Happy, Energetic. Next, 305 MTurk participants ranked these 29 personality traits on the extent to which

each of them described each of the 3 countries (France, Germany and Japan) if they were a person (1 = strongly disagree; 7 = strongly agree). Each participants ranked one country, in a 3-cell between subjects design. Results of Factor Analyses suggest that each of the three countries has a unique set of four 'core genes' in people's minds. We defined this set as the country's Personality DNA. The identified 'core genes' were:

France: glamorous, sophisticated, elegant, and romantic;
Germany they are: independent, intelligent, confident, and tough;
Japan: reliable, intelligent, stable and dignified.

Study 2 demonstrates that these 'core genes' are 'inherited' by brands whose names sound original to the associated country. First, a pretest was conducted in order to identify fictitious brand names that are correctly identified with France, Germany and Japan. 14 brand names were tested against 17 countries (Albania, Bulgaria, China, Egypt, France, Germany, Greece, Italy, Japan, Mexico, Netherlands, Portugal, Romania, Russia, Spain, Turkey and USA). The fictitious names, included filler names from Turkish, Greek and Russian, looked and sounded like they came from a specific country of origin and were: Doğanoğlu, Μίαπαρέα, Bleusàur, L'Noir, Duprêté, Ne-mashi, Miyoshi, Takitomo Bäumtät, Müssler, Schaumbern, Süchtig, Экрейс, Клятва. Based on the pretest, six brand names, that showed strong associations with France, Germany and Japan, were chosen (two for each country): L'Noir (81.2%), Duprêté (42.6%), Scha-umbern (76.2%), Süchtig (63.4%) and Miyoshi (80.2%), Takitomo (82.2%). These names were chosen for the main study.

In the main study, 392 MTurk participants ranked the 29 human personality traits from study 1 on the extent to which they described each of the six brand names. Subsequently, participants guessed the country of origin for each of the six names. 280 participants guessed the country correctly, and analyses were conducted with this sub-sample. Overall the results showed, as predicted, that there is a sig-nificant overlap between the four traits of country personality DNA for each of the three focal countries, and the human traits that partici-pants assigned to each of the brand names. Factor analyses showed similar factor loadings for the brand names, as we found for their "parent" countries. The means were strikingly similar.

To sum, we show that when brand names are recognized as being from a particular country, they evoke perceptions associated with humanlike personality traits associated with that country. This study is the first to identify inheritable country personality traits, and link them to branding. Theoretically, the findings contribute to our understanding of the way brand names with languages which sug-gest country origin, influence perceptions of brand origin, in return influence brand perceptions, via country stereotyping. As a market-ing implication, utilizing the new Country Personality DNA model allows marketers, brand managers and entrepreneurs to create brand names that can instantly signal brand personality – which is espe-cially important for new brands.

Is Nestlé a Lady? Brand Name Gender and Loyalty Attitudes

EXTENDED ABSTRACT

There are many ways a name can convey information about a brand, including semantics (Klink, 2001) and individual sounds (Lowrey & Shrum 2007). Brand names can also suggest gender. Names sound masculine or feminine due to length, sounds, and stress (Barry and Harper 1995). Specifically, feminine names tend to be longer, with stress on the second or later syllable, and often end in a vowel, especially the "a" sound (e.g., Lisa, Visa). Conversely, masculine names tend to have fewer syllables and end in a consonant (e.g., Brad, Ford).

We examine when brand names with feminine versus masculine linguistic characteristics are advantageous. Beyond simply matching brand name gender to product category or user, we posit a process based on the Stereotype Content Model (Fiske et al., 2002) by which feminine brand names convey warmth (tolerance, good-naturedness, friendliness, sincerity). Because attributes like warmth are primary drivers of loyalty attitudes (Chaudhury and Holbrook 2001) we pro-pose a link between brand names with feminine linguistic attributes, perceived warmth, and loyalty attitudes such that feminine brand names will enhance perceived warmth, which will enhance brand loyalty attitudes.

We test these predictions in seven studies, varying types of brands (real, invented, Interbrand top brands), methodology (obser-vational, experimental), stakes (hypothetical, economic, temporal), and participant population (MTurk, college students). In Study 1 we investigate whether brand name femininity is positively related to loyalty-based brand performance by examining the linguistic charac-teristics of a real-world sample of Interbrand top brand names. Study 2 examines whether brand name gender influences actual product choices with consequences for time (Study 2a) and money (Study 2b). Study 3 tests the hypothesis that brand warmth mediates the relationship between brand name gender and self-reported brand loyalty using a sample of real-world brands. Study 4 tests the propo-sition that brand warmth mediates the effect of brand name gender on brand loyalty attitudes for hypothetical brands in a controlled experi-ment. Studies 5 and 6 test theoretically relevant boundary conditions, showing that the feminine brand name advantage is moderated by product category (hedonic vs. utilitarian; Study 5) and typical user gender (men vs. women; Study 6).

Study 1 tested the proposed association between feminine brand name linguistics and brand loyalty attitudes using a sample of Inter-brand's "Global Top Brands," which are designated, in part, based on consumer loyalty. We coded 171 of Interbrand's top brands for a twenty-year period from 2000-2019 using a validated name gender normative scale that quantifies the degree of linguistic masculinity or femininity from -2 (most masculine) to +2 (most feminine; Barry and Harper, 1980). Interbrand top brands have, on average, feminine names ($p < .001$); feminine names gender is positively associated with average rank on the Interbrand list ($p = .01$); and feminine brand names spent more years on the list than did masculine names ($p = .008$). Finally, comparing the Interbrand names with 171 randomly selected companies from Thomson Reuter's Eikon database, and controlling for net income, net revenue, years in business, and num-ber of employees, feminine brand name gender predicted Interbrands top brand status ($p = .02$).

In Studies 2a and 2b we explore whether brand name gender influences product choices with real-world consequences. Study 2a used a common consumer domain—streaming videos (N = 300 mTurkers). Participants were told they would be evaluating a short video produced by one of two channels and then chose whether to spend their time watching a video from a feminine-named channel (Nimilia) or a masculine-named channel (Nimeld). A significant ma-jority chose to watching a video from the feminine-named "Nimilia Channel" (71% versus Nimeld: 29%, $p < .001$). Study 2b replicates these results with economic consequences by offering participants (N = 150 students) either monetary compensation or a choice of product: Nimilia or Nimeld brand hand sanitizer. Participants were significantly more likely to choose the feminine-named product than any other option (49% Nimilia hand sanitizer; 36% monetary com-pensation; 14% Nimeld hand sanitizer; $p < .001$).

Study 3 tested the hypothesized effect of brand name gender on perceived warmth and self-reported loyalty using a sample of real brands. We elicited a sample of relevant brands and coded their name gender using the scale from Study 1. We then asked a separate sample from the same mTurk population (N = 517) to evaluate each brands' warmth and report their loyalty toward each brand. Hayes PROCESS model 4 showed that feminine brand name gender predicts warmth (p = .03), which predicts brand loyalty (p < .001), and the mediating role of warmth is significant (95% CI = [.001, .066]).

Study 4 provides causal evidence by experimentally manipulating brand name gender using a one-factor (name gender: feminine, masculine) between-subjects design and the same stimuli used in Studies 2a and 2b. Participants (N = 250 mTurkers) evaluated the feminine brand name as warmer (p < .001); warmth increased brand loyalty attitudes (p < .001); and warmth mediated the effect of brand name gender on loyalty attitudes (95% CI = [.52, .91]).

In Study 5 we tested the moderating role of product category (hedonic vs. utilitarian) using a 2x2 between-subject experiment (N = 781 mTurkers) and the same names used in Studies 2a, 2b, and 4. We find that feminine brand names benefit hedonic products (chocolate) more than utilitarian products (bathroom scale; p = .02). This suggests that warmth is a more valued attribute for hedonic than utilitarian products.

Study 6 used a 2-factor between-subject design (N = 695 mTurkers) and expanded stimuli set (Woldard; Stelad; Wolda; Steda) to examine the moderating role of typical user gender. Results show an interaction between name gender and typical user gender (p = .03) such that the feminine brand name advantage is neutralized when the typical user is male (e.g., stout beer; p = .43) but intact when the typical user is female (e.g., strawberry daquiri; p < .001).

This research has important implications for brand managers and best-naming practices, as well as our theoretical understanding of brand loyalty, warmth, and linguistics.

Precisely Unique: Semantic Precision Increases Perceived Uniqueness of Cultural Products

EXTENDED ABSTRACT

Consumers often value uniqueness of cultural products such as a folk artifact or a tour (Kasey 2019). We suggest that product uniqueness can be evoked via a "precise-unique" heuristic, whereby more precise language increases perceptions of product uniqueness. Semantic precision is the extent to which the use of language conveys subject matters exactly as they are. We draw on the psycholinguistic literature suggesting that more precise words (e.g., *scarlet* versus *red*) are less prototypical members of their category (e.g., *colors*) (Rosch 1983; Rosch and Mervis 1975), and consumers are less likely to think of more precise words when they process product information within their semantic category (Hamby and Levine 2015). We suggest that as a result, more precise words evoke perceptions that the product is more unique. This effect can be salient even when the words do not directly describe a product attribute. For example, a product review for a tour abroad that uses the word "robin" would elicit higher perceived uniqueness of the tour than if it uses the word "bird."

Four experiments provide empirical support for our predictions. Study 1 shows that semantic precision evokes reduced perceived category typicality. Study 2 tests the precise-unique heuristic in a cultural product context. Study 3 demonstrates that cultural products appear more(less) unique when their description is more(less) precise, and that the effect is mediated by category typicality such that the more(less) precise description resembles the same seman-

tic category to a lesser(greater) extent. Finally, Study 4 introduces a moderator and finds the precise-unique heuristic is moderated when a product is perceived as atypical by default.

In Study 1 participants (n=162) first composed sentences from a list of 10 precise/non-precise words (e.g. bake/make, spotless/clean, cider/beverage). Next, participants indicated the category typicality of each word to its corresponding category ("when you think of the category, how likely are you to think of that particular word?"-1: not likely at all; 7: very likely). We used the mean of the ratings of the ten words (α=.91) as a composite measure of category typicality. Finally, participants indicated how precise were the ten words on four items (definite/exact/precise/specific, α=.91).

Results. The high-precision words were rated as significantly more precise (M=5.33) than the low-precision words (M=4.90, $F(1,160)$=4.06, p=.046). As predicted, the aggregated category typicality was significantly lower for the high-precision (M=5.00) than the low precision words (M=5.32, $F(1,160)$=3.98, p=.048). These results provided evidence that more precise words elicit lower perceived category typicality.

Study 2 (n=284) tested the effect of semantic precision on perceived uniqueness. Participants read one of two ad texts promoting a t-shirt as imported from Europe/or Netherlands and rated the T-shirt uniqueness (distinct/original/special/unique, α=.90) and ad precision (α=.91).

Results. "Netherlands" was rated as significantly more precise (M=4.14, $t(282)$=6.63, p<.001) than "Europe" (M=3.01). As predicted, a T-shirt imported from the Netherlands was perceived as significantly more unique (M=3.09, $t(282)$=2.53, p=.01) than when it was from Europe (M=2.60). Study 2 supported the prediction that semantic precision of product descriptions increases perceived uniqueness of cultural products.

Study 3 (n=200) examined the effect of semantic precision on consumer perception of product uniqueness driven by category typicality. Participants read an excerpt from a more/less precise review of a boat tour (e.g., "The dinner(meal) included soup(appetizer), fish(entrée), and pudding(dessert)"). Participants rated the tour's uniqueness, category typicality of each of the high(low) precision words (e.g., pudding/dessert - dish), and how precise those twelve words were as a whole (α=.91).

Results. The review was rated as significantly more precise in the high-precision condition (M=5.30) than the low-precision condition (M=4.85, $F(1,198)$=6.73, p=.01). As predicted, category typicality was significantly lower in the high-precision condition (M=4.69) than the low precision condition (M=5.33, $F(1,198)$=18.25, p<.001). Perceived uniqueness of the high-precision (M=5.48) and low-precision (M=5.29) conditions did not significantly differ ($F(1,198)$=1.15, p=.29). A mediation analysis (Hayes 2018) suggested that the effect of semantic precision on perceived uniqueness was fully mediated by perceived category typicality. Semantic precision was a significant predictor of category typicality (β=.65, p <.001), and category typicality was a significant predictor of perceived uniqueness (β=.38, p <.001). Importantly, semantic precision was a significant predictor of perceived uniqueness (β=-.43, p=.01). The mediation pathway from semantic precision to perceived uniqueness via category typicality was significant (95% CI:[0.11,0.41]).

Study 3 provided evidence that semantic precision reduces category typicality, which in turn increases perceived product uniqueness. The insignificant direct effect of semantic precision on perceived uniqueness can be attributed to the high inherent uniqueness of the tour experience. Study 4 addressed this issue specifically.

Study 4 (n=125) examined the moderation effect of product inherent uniqueness on the "precise-unique" heuristic. Participants

were randomly assigned to one of four conditions representing a 2 (more/less precise description) x2 (typical/atypical product) between-subjects design. They first rated perceived uniqueness of an ice-cream flavor (typical-Berry/Raspberry; atypical-Spice/Ginger). Next, they rated perceived precision of the flavor word, and the extent to which the flavor was typical on three 7-point scale semantic differential items (atypical/typical, unusual/usual, uncommon/common; α=.98).

Results. We found two main effects: Berry flavors were rated significantly more typical (M=4.32) than Spice flavors (M=2.13, $F(1,123)$=50.21, p<.001). Raspberry/Ginger was significantly more precise (M=5.88) than Berry/Spice in describing the flavors (M=4.02, $F(1,123)$=54.93, p<.001). We also found a significant interaction between precision and typicality on perceived uniqueness ($F(1,121)$=5.32, p=.02). Within typical flavors, Raspberry (M=4.88) was significantly more unique than Berry (M=3.48, $F(1,60)$=13.24, p=.001). By contrast, for atypical flavors, Spice (M=5.40) and Ginger (M=5.63) were not significantly different in perceived uniqueness ($F(1,61)$=.49, p=.49). Study 4 demonstrated further that semantic precision increases perceived product uniqueness, but also that the "precise-unique heuristic" is not salient for inherently atypical products.

To sum, our findings demonstrate the potential benefit of describing cultural products more precisely, as precise descriptions increase perceived uniqueness of the products. In a consumption world valuing unique cultural experiences, the use of semantic precision can be an effective and costless tool to enhance consumer sense of product uniqueness.

REFERENCES

Aaker, J. L., BenetMartínez, V., & Garolera, J. (2001). Consumption symbols as carriers of culture: A study of Japanese and Spanish brand personality constucts. Journal of Personality and Social Psychology, 81(3), 492-508.

Barry, Jr., Herbert, and Aylene S. Harper (1995), "Increased Choice of Female Phonetic Attributes in First Names," Sex Roles, 32 (11/12), 809-819.

Bosnjak, M. B. (2007). Dimensions of Brand Personality Attributions: A Person-Centric Approach in the German Cultural Context. Social Behavior & Personality: An International Journal, 35(3), 303-316.

Ferrandi, J., Valette-Florence, P., & Fine-Falcy, S. (2000). Aaker's Brand Personality Scale in a French Context: A Replication and a Preliminary Test of Its Validity. Developments in Marketing Science, 23, 7-13.

Fiske, Susan T., Amy J. C. Cuddy, Peter Glick, and Jun Xu (2002), "A Model of (Often Mixed) Stereotype Content: Competence and Warmth Respectively Follow from Perceived Status and Competition," Journal of Personality and Social Psychology, 82 (6), 878-902.

Hamby, Tyler and Daniel S. Levine (2015), "Response-Scale Formats and Psychological Distances between Categories," Applied Psychological Measurement, 40(1), 73–75.

Kasey, Mya (2019), "Why Millennial Travelers Are Seeking More Authentic Experiences," Under30 Experiences. (available at https://www.under30experiences.com/blog/why-millenial-travelers-are-seeking-more-authentic-experiences, last accessed 2/27/2020).

Klink, R. R. (2001). Creating meaningful new brand names: A study of semantics and sound symbolism. Journal of Marketing Theory and Practice, 9(2), 27-34.

Laš, L. &. (2018). Japan's Engagement in the Group of Seven. Journal of International Relations, 16(2), 160–182.

Lowrey, Tina M., and L. J. Shrum (2007), "Phonetic Symbolism and Brand Name Preference," Journal of Consumer Research, 34 (3), 406-414.

Naylor, R. W., Lamberton, C. P., & Norton, D. A. (2011). Seeing ourselves in others: Reviewer ambiguity, egocentric anchoring, and persuasion. Journal of Marketing Research, 48(3), 617-631.

Rosch, Eleanor (1983), "Prototype Classification and Logical Classification: The Two Systems", pp. 73–86 in Scholnick, E.K. (ed), New Trends in Conceptual Representation: Challenges to Piaget's Theory?, Lawrence Erlbaum Associates, Hillsdale.

Rosch, Eleanor and Carolyn B. Mervis (1975), "Family Resemblances: Studies in the Internal Structure of Categories", Cognitive Psychology, 7(4), 573–605.

Consumer Decision-Making in Health Care

Chairs: Sydney Scott, Washington University, USA
Jonathan Zev Berman, London Business School, UK

Paper #1: The Costs of Autonomy: Decisional Autonomy Undermines Advisees' Judgments of Experts

Samantha Kassirer, Northwestern University, USA
Emma Levine, University of Chicago, USA
Celia Gaertig, University of Pennsylvania, USA

Paper #2: Communication Preferences in Medical Advice Seeking

Selin Goksel, London Business School, UK
Jonathan Zev Berman, London Business School, UK
Sydney Scott, Washington University, USA

Paper #3: The Effect of Causal Explanations on Judgments of Medical Symptoms

Selin Goksel, London Business School, UK
David Faro, London Business School, UK
Stefano Puntoni, Erasmus University Rotterdam, The Netherlands

Paper #4: The Illegal = Effective Heuristic

Rachel Gershon, University of California San Diego, USA
Alicea Lieberman, University of California San Diego, USA
Sydney Scott, Washington University, USA

SESSION OVERVIEW

Understanding how consumers make health decisions is theoretically and pragmatically important. Why do consumers avoid going to their health practitioners? What causes consumers to have positive interactions with a provider and therefore become a repeat customer? Why do consumers seek illegal treatments? In part because of the important implications of these types of questions, a great deal of research has been devoted to understanding health decision-making in the fields of marketing, medical decision-making, and psychology, among others. This series of papers contributes to these literatures by offering novel insights about the drivers of (sometimes suboptimal) health decision-making.

Currently, the medical decision-making literature emphasizes giving patients autonomy and the ability to choose their own treatments, in a movement for "patient-centered decision making." Kassirer, Levine and Gaertig (paper 1) show the downsides of decisional autonomy. In a series of studies, they compare advisers who give decisional autonomy to patients (by providing information but no explicit recommendations) to advisers who give paternalistic advice (by providing information and explicit recommendations). Advisers who give decisional autonomy are penalized—viewed as less competent, less helpful, and are less likely to be recommended.

The medical decision-making literature also suggests that patients want their doctors to be socially warm during doctor-patient interactions. Goksel, Berman and Scott (paper 2) suggest that this may not always be the case. In particular, when patients have embarrassing symptoms, they prefer doctor-patient interactions that are socially cold or mediated by technology. Patients expect socially warm interactions will cause more discomfort when disclosing embarrassing symptoms.

Together, the first two papers look at how social intuitions and beliefs can drive consumers to dislike an interaction with their healthcare provider. The last two papers look at the heuristics and biases in consumers beliefs about the severity of symptoms and the efficacy of treatments.

Goksel, Faro and Puntoni (paper 3) examine how the cause of symptoms affects perceived severity of symptoms. The same physical symptom (e.g., a rash displayed in a photograph) is judged to be less severe and painful when people think it was caused by psychological (vs. physiological) factors. Additionally, people are less likely to recommend a person seek medical help for a physical symptom when it was caused by a psychological (vs. physical) reason.

Finally, Gershon, Lieberman and Scott (paper 4) examine one reason why consumers might seek an illegal treatment. The authors demonstrate an illegal=effective heuristic, where consumers think the same drug will be more potent, strong and effective if it is illegal (vs. legal). Consumers even infer this when the drug is not legal for reasons unrelated to the safety and efficacy (e.g., a paperwork error).

Collectively, these papers provide new insights into health decision-making. In particular, these papers examine social intuitions and lay beliefs that might lead consumers to avoid going to a doctor, dislike an interaction with their doctor, or even seek illegal treatments. Such insights contribute to theories in marketing, psychology, and medical decision-making, among other fields, and therefore should be of interest to a broad audience of scientists.

The Costs of Autonomy: Decisional Autonomy Undermines Advisees' Judgments of Experts

EXTENDED ABSTRACT

Imagine that you were recently diagnosed with a serious illness and you face a very difficult medical decision. You must choose between two medical treatments: Treatment A and Treatment B. Each treatment could potentially halt the progress of your illness, but they each are associated with different side effects. Even though your doctor has provided you with all of the available information on each of the treatments, you still remain confused about which is the better choice. Thus, you ask your doctor what you should do. Your doctor reviews the potential costs and benefits of both treatments and reminds you that there is no objectively right answer. Ultimately, your doctor says that she cannot tell you what you should do and you will have to make the final decision. How would this make you feel about your doctor? How would this make you feel about the decision?

Over the past several decades, the United States medical system has increasingly prioritized patient autonomy. Physicians routinely encourage patients to come to their own decisions about their medical care rather than providing patients with clearer, yet more paternalistic, advice. Political theorists, bioethicists, and philosophers generally see this as a positive trend. In the current research, we challenge the philosophical and practical assumptions about the benefits of autonomy by exploring decision makers' reactions to autonomy-oriented versus paternalistic advice when making difficult decisions under uncertainty. We define autonomy-oriented advice as any advice that ultimately leaves the final decision to the advisee and is not accompanied by an explicit recommendation. We define paternalistic advice as any advice that contains an explicit recommendation.

In a pilot study with a sample of employed physicians (N=127), we found that physicians were torn about whether autonomy or paternalism would be seen more positively by patients. Specifically, 56%, 49%, 52%, and 48% of physicians believed that patients would find them to be more competent, more helpful, would be more likely to return to them, and more likely to recommend them, respectively,

for providing decisional autonomy instead of paternalistic advice (for all judgments, doctors' expectations regarding which communication tactic would be favored by patients did not significantly differ from the null of an equal 50%/50% distribution, all $ps \geq .214$). However, as we reveal across 6 studies ($N=3,867$), patients are not torn. Patients, and advisees in general, show a strong preference for paternalism. That is, they have more positive impressions of advisers who offer paternalistic rather than autonomy-oriented advice.

In Study 1, participants ($N=196$) read a scenario that was similar to the opening example. Participants were asked to imagine that they were a patient who had a very difficult medical decision to make. They had to decide between two procedures and imagined that they asked their doctor what to do. Participants were randomly assigned to one of two conditions: autonomy or paternalism. Participants in both conditions read that their doctor reminded them that both procedures had different risks and that either could lead to a favorable outcome. Their doctor then either gave them a clear recommendation and said that they should choose procedure A (or B) (paternalism) or did not give them a recommendation and told them that the choice was theirs to make (autonomy). Participants who received paternalistic advice evaluated the doctor as more competent ($F (1,194) = 5.93$, $p = .016$) and more helpful ($F (1,194) = 6.11$, $p = .014$) than participants who received full decisional autonomy. Moreover, participants who received paternalistic advice indicated that they would be more likely to return to and recommend the doctor than those who received full decisional autonomy ($F (1,194) = 5.66$, $p = .018$). That is, participants who imagined themselves as patients showed a preference for paternalistic advice over full decisional autonomy. In Study 2 ($N=451$), we largely replicated these effects for medical, financial, and workplace advice.

In Study 3 ($N=802$), we randomly assigned participants to a separate or joint evaluation condition (Hsee, 1996), and we examined how advice type influenced doctor choice. In both separate evaluation (89.1% vs. 77.9%, $X^2 (1) = 9.06$, $p = .003$) and joint evaluation (67.5% vs. 33.5%), $X^2 (1) = 46.57$, $p < .001$), we found that patients were more likely to choose the doctor who offered paternalistic advice. Consistent with Study 1, we again found that doctors who provided paternalistic advice were viewed as more helpful ($ps < .001$) and competent ($ps \leq .065$).

In Studies 4 ($N=807$) and 5 ($N=806$), we furthermore showed that the results hold regardless of whether an explicit recommendation was solicited or unsolicited and whether or not the advice was accompanied by more expert guidance.

Finally, in Study 6 ($N = 805$), we extended our investigation to an abstracted context in which participants had to choose between two raffles, which entailed different risks and benefits. Participants were paired with a raffle expert, who provided participants with some information about the raffles and then delivered either autonomy-oriented or paternalistic advice. Before participants received the advice, they also evaluated how difficult the choice was for them to make. There was no main effect of advice type for any of our dependent measures (all $ps \geq .416$). Importantly, however, there were significant interactions between advice type and decision difficulty for three of the four measures (competence, use again, and wages assigned; all $ps \leq .049$), and a marginally significant interaction for helpfulness ($p = .096$). Paternalistic advisers were seen more favorably than advisers who offered full decisional autonomy when decision difficulty was high, but this preference was attenuated (and sometimes reversed) when decision difficulty was low. These results suggest that advisees evaluate paternalistic advisers more favorably than advisers who provide decisional autonomy, but only when decision makers experience decision difficulty.

Taken together, our results demonstrate that decision makers evaluate advisers who give paternalistic advice more favorably than those who give autonomy-oriented advice. These results deepen our understanding of preferences for autonomy and paternalism and challenge the benefits of recently adopted practices in medical decision-making that prioritize autonomy.

Communication Preferences in Medical Advice Seeking

EXTENDED ABSTRACT

What types of interactions do people want with healthcare providers when seeking medical advice? There is a growing conventional wisdom that patients benefit from interacting with practitioners who display interpersonal warmth towards their patients (e.g., Di Blasi et al., 2001; Howe, et al., 2019; Kraft-Todd et. al, 2017; Verheul, et al., 2010, etc.), and prefer to receive advice from humans rather than technology (e.g., Longoni et al., 2019; Promberger & Baron, 2006, etc.).

In this paper, we challenge this conventional wisdom that people always prefer to consult with interpersonally warm healthcare providers, and explore consumers' preferences for interpersonal warmth when seeking care. We argue that when patients have embarrassing symptoms, they become averse to interpersonally warm interactions with healthcare providers. We demonstrate an aversion to interpersonal warmth both as a preference for doctors who hold an interpersonally colder demeanor towards patients (Studies 1-4), as well as a preference for technology-mediated mediums of communication (Studies 5-6).

Study 1 (N=446, hospital patients) establishes an aversion to interpersonal warmth in an externally valid, real-world context. We approached patients at a hospital waiting room to complete a survey. Patients wrote down the symptom they had, and chose which doctor they would like to see among two options: an interpersonally warm (facially expressive) doctor, or an interpersonally cold (facially expressionless) doctor. The more patients perceived their symptoms to be embarrassing, the more likely they were to choose the interpersonally cold doctor ($\beta = .25$, $p < .001$).

Study 2 (pre-registered: https://aspredicted.org/blind.php?x=8r5yg8, N=737, MTurk) replicates these results using a different manipulation of interpersonal warmth, and investigates the relationship between interpersonal warmth and anticipated discomfort in communication. Participants imagined either having symptoms that are embarrassing (e.g., diarrhea, hand warts) or non-embarrassing (e.g., sore throat, knee pain), and calling their clinic for an appointment. Participants chose between two doctors: an interpersonally cold (strictly professional) doctor and an interpersonally warm (more casual) doctor. Participants were more likely to choose the interpersonally cold doctor for embarrassing symptoms (51.8%) than for non-embarrassing symptoms (40.4%, p < .001). Moreover, whereas those who felt embarrassed by their symptoms anticipated more discomfort speaking to an interpersonally warm (vs. cold) doctor (p < .001), those do not feel embarrassed by their symptoms felt equally comfortable talking with two types of doctors (p = .29).

Study 3 (pre-registered: https://aspredicted.org/blind.php?x=n5mk4c, N=550, MTurk) demonstrates a boundary condition for aversion to social warmth. It manipulates the perspective of the decision maker and shows that third parties underestimate patient preferences for socially cold communicators. Participants either took the perspective of a patient and chose a doctor for themselves (Self condition), or the perspective of a nurse and assigned a patient to a doctor (Other condition). In both conditions, patients had an embarrassing symptom. As predicted, participants were less likely to assign

a patient to the interpersonally cold doctor (38.1%) than they were to choose the interpersonally cold doctor for themselves (49.4%, p = .007). Moreover, participants in the Self condition anticipated more discomfort with the interpersonally warm doctor, while participants in the Other condition expected patients to feel greater discomfort with the interpersonally cold doctor (p < .001).

In order to disentangle the mechanism behind these preferences, Study 4 (pre-registered: https://aspredicted.org/blind.php?x=j6wz4u, N=141, Behavioral Lab) examines two opposite intuitions about interpersonal warmth in doctor-patient interactions. We manipulated the intuition people considered before choosing a doctor: participants either evaluated how much discomfort they anticipated when talking to a doctor (Discomfort condition), or how reassured they thought a doctor would make them feel regarding their embarrassing symptoms (Reassurance condition). While participants anticipated greater discomfort with the interpersonally warm doctor (p < .001), they also expected this doctor to provide greater reassurance (p < .001). Moreover, participants were more likely to choose the interpersonally warm doctor in the Discomfort condition (65.7%) compared to the Reassurance condition (45.1%, p = .014). Thus, even though people expect the interpersonally warm doctor to provide them with greater reassurance about their condition, the fact that they would feel uncomfortable when revealing their symptoms leads them to avoid interpersonal warmth.

Studies 1-4 demonstrate consumer preferences for interpersonally colder doctor-patient interactions. Studies 5 and 6 explore the role of technology in mediating these interactions and test an implication of the previous findings: Consumers may prefer colder mediums of communicating with doctors when they have embarrassing symptoms. Study 5 (N=385, MTurk) investigates consumer discomfort associated with using a variety of technology-mediated communication mediums when seeking medical information for either embarrassing or non-embarrassing symptoms. Participants rated the extent to which different mediums of communication were perceived to facilitate interpersonally warm interactions (e.g., email, online-chat, video call). They also reported their discomfort in using each medium to get information about either an embarrassing or non-embarrassing symptom. A linear regression predicting discomfort revealed a symptom X warmth interaction (β = .57, *p < .001*): warmer mediums of communication elicited more discomfort, but only when symptoms were embarrassing (embarrassing symptoms: β = .51, *p < .001*; non-embarrassing symptoms: β = -.06, *p = .22*).

Lastly, Study 6 (N=252, Behavioral Lab) demonstrates the effect of embarrassment on the preference for using technology in order to avoid speaking to experts. Participants imagined going to a pharmacy to search for medicine either for an embarrassing or non-embarrassing symptom. They then chose between using a mobile app and speaking to a pharmacist to get more information. As predicted, participants were more likely to choose to use the app for embarrassing symptoms (37.9%) compared to non-embarrassing symptoms (22.6%, *p = .009*).

In sum, this research shows that not only are consumers averse to interpersonal warmth in doctor-patient interactions, this aversion also encourages them to use technology in order to avoid interacting with experts when they have embarrassing symptoms. These findings suggest that, as opposed to the conventional wisdom, setting an interpersonally colder doctor-patient relationships can mitigate the effect of embarrassment on the avoidance of contacting experts.

The Effect of Causal Explanations on Judgments of Medical Symptoms

EXTENDED ABSTRACT

Many medical conditions are complex in nature which makes it difficult for lay people to understand their causes and consequences. For instance, chronic conditions such as fibromyalgia, psoriasis, or irritable bowel syndrome diseases still lack awareness and understanding in society although millions of people have their everyday lives severely affected by their symptoms (e.g., Brody, 2017; Hayes et al., 2010; Horn et al., 2007; Stern et al., 2004; Wardle, 2017, etc.). One common factor to these illnesses is that they are believed to involve both the psychological and the physical states of individuals (e.g., Kellner, 1994; Perrott et al., 2000; Stojanovich & Marisavljevich, 2008, etc.).

An extensive line of research on mind-body dualism has shown that people tend to think of the mind and the body as two separate entities (Forstman & Burgmer, 2015, 2017). While in reality the mind and the body are often closely linked in the demonstration of illnesses (Ray, 2004), it is unclear whether lay people appreciate this connection or whether they fall prey to dualistic reasoning instead when making judgments regarding different medical symptoms.

In the present research, we argue that beliefs about the underlying causes of medical symptoms influence lay people's perceptions of the severity of medical symptoms, and their intentions to take medical action regarding these conditions. While previous research looked at judgments regarding medical symptoms in the absence versus presence of medical evidence (Asbring & Narvanen, 2002; Looper & Kirmayer, 2004; Ruddere et. al, 2012; 2013), we instead contrast lay people's perceptions of medical symptoms when these are driven by different types of causes. In particular, we investigate whether people perceive *the same observable* medical symptom differently when they believe that it is caused by a psychological as opposed to a physical reason. Across three studies, we demonstrate that having a psychological (versus physical) cause to a medical symptom decreases (1) its perceived severity, (2) people's tendency to recommend medical care for it, and (3) their likelihood to examine its cause.

Study 1 (N = 488, pre-registered) investigates people's perceptions of a skin rash when it is caused by psychological reasons or physical reasons. Participants saw a picture of a skin rash and were told that it developed either as a reaction to temporary stress (psychological cause), or food (physical cause). They made a choice about whether they would recommend a patient to go to a doctor, or wait for a few days which was our dependent measure. Participants then completed a six-item measure of severity (e.g., how red the rash looks, how itchy it feels, etc.). Participants were less likely to recommend the patient to see a doctor when the rash had a psychological cause as opposed to a physical cause (β = -.38, *p* = .05). Additionally, they thought that the rash with a psychological cause was less severe (*p* < .001). Severity ratings mediated the effect of the cause type on their tendency to recommend medical care (*IE* = -.39, *95% CI* = [-.64, -.18]).

Study 2 (N = 487, pre-registered) shows the robustness of the previous findings for another observable symptom. Participants listened to an audio of a patient coughing and were told that the cough developed as a reaction to either anxiety (psychological cause) or being exposed to chemicals in the air (physical cause). They then made the same choice of recommendation, and completed a measure of severity (e.g., how loud the cough sounds, how scratchy it feels, etc.). Participants were less likely to recommend the patient to see a doctor (β = -.57, *p* = .003) and perceived the cough to be less severe

(*p* = .005) when it had a psychological cause. As before, severity ratings mediated the tendency to recommend medical care (*IE* = -.27, *95% CI* = [-.47, -.08]).

Study 3 (N = 898) looked at the influence of temporal primacy in judgements of medical conditions. Specifically, it explored cases when an individual suffers from multiple medical symptoms, and investigated how causal belief influence the extent to which individuals prioritize seeking care for the causally central medical condition among two symptoms. We predicted that individuals have an overall tendency to treat the causally central symptom, but that this tendency would decrease when a psychological symptom leads to a physical symptom. Participants imagined a person developing two different medical symptoms. We had two focal conditions, where we described an individual developing a skin rash and anxiety. In one condition, anxiety was described as the central cause leading to a skin rash, and in the second condition a skin rash was described as the central cause leading to anxiety. In addition, we had two control conditions. In one of the conditions, a person was described of having two psychological symptoms (i.e. anxiety and sleeplessness), while in the other condition a person was described of having two physical symptoms (i.e. sore throat and skin rash). In all experimental conditions, participants were highly likely to treat the symptom that appeared first (86%-97%) except for the condition in which a psychological symptom caused a physical symptom (67%). In particular, participants were less likely to treat the causally central symptom when it was a psychological symptom, leading to a physical symptom, compared to all other conditions (*ps* < .001).

In sum, these studies show that casual beliefs about the underlying cause of medical symptoms influences both perceptions of severity and the intentions of providing medical care. Symptoms caused by psychological illness are perceived to be less severe and less likely to warrant medical care.

The Illegal = Effective Heuristic

EXTENDED ABSTRACT

When deciding whether to try a drug or treatment, whether for recreational, medical, or other purposes, two of the most important factors for consumers to consider are safety (i.e., how likely is the drug to cause side-effects?) and efficacy (i.e., how potent and effective is the drug?). This work looks at consumer perceptions of illegal (vs. legal) products. When discouraging the use of illegal substances, public health campaigns often highlight safety concerns. Our research finds that people already tend to believe that illegal substances are less safe than legal substances, but surprisingly, they also perceive illegal substances as more effective. Three studies establish the existence of this illegal = effective heuristic; across a range of substances, illegal products are viewed as stronger, more potent, and more effective than legal products. This effect holds even when the product is illegal for reasons explicitly unrelated to efficacy or safety (i.e., a paperwork error).

Consumers often lack complete information about their product choices, either because attributes cannot be observed or because procuring attribute information is prohibitively costly. In all these situations, consumers make inferences about product attributes based on their *lay beliefs*. For example, a consumer might infer that a product is high quality because it has a warranty, or infer that a healthy food will be less tasty (Srivasta & Mitra, 1998; Raghunathan, Naylor, & Hoyer, 2006). Oftentimes, these lay beliefs involve looking at an easily observable attribute (e.g., whether there is a warranty) to make an inference about a difficult to observe attribute (e.g., quality). Here

we look at an important new lay belief surrounding legality. We posit that illegal drugs are viewed as more effective.

As an initial test of the illegal = effective heuristic (Study 1, N=404), participants evaluated a fictional product that was either described as legal or illegal. To test for robustness, we also manipulated whether the drug was a utilitarian (sleep aid) or hedonic (intoxicant) product, in a 2x2 between-subjects design. Participants were asked to imagine the following: "Stava is a beverage made from Piper Methysticum, a plant native to the western Pacific Islands." Those in the utilitarian condition further read, "Stava is typically used as a **medicinal sleep aid,**" while those in the hedonic condition read, "Stava is typically used as a social drink and makes its users intoxicated." Finally, participants read, "Stava is legal [not legal]". Participants then responded to the following items: effectiveness (3-item scale: strength, potency, effectiveness; alpha = .86) and safety (2-item scale: safety and concern about side-effects [reverse-scored]; alpha =.76). We found a non-significant interaction of condition (utilitarian/hedonic) and treatment (legal/illegal) on effectiveness. For both conditions, participants believed the illegal drug was indeed less safe (Ps<.01), but more importantly, also more effective (Ps<.01).

Study 2 (pre-registered, N=754) was designed as an additional demonstration and robustness check of the illegal = effective heuristic. As in study 1, our key manipulation was whether a product was described as illegal or legal, and we tested for robustness across different products (a stimulant, an exercise supplement, or a weight-loss drug). Therefore, this study followed a 2x3 between-subjects design. Participants responded to the same effectiveness and safety items used in Study 1. There was a significant effect of the legality treatment (p<.001), but no effect of the product type condition. That is, across all three products, participants who were told that the product is illegal rated it as not only less safe, but also significantly more effective.

Study 3 (N=401) was designed to test whether the illegal = effective heuristic persists when the drug (in this case, a sleep aid) is illegal for reasons explicitly unrelated to efficacy or safety. This study had 5 between-subjects conditions: 1) Legal, 2) Illegal (no reason provided), 3) Illegal due to paperwork error, 4) Illegal due to side-effects, and 5) illegal even though it is as safe as the leading sleep-aids. All illegal conditions were perceived as more effective than the legal treatment (p<.001). For an additional effectiveness measure, we asked how many people (out of 100) would likely find relief using the treatment. For all treatments, participants believed that more people would find relief from illegal (vs. legal) treatments. Beliefs about safety remained higher for the legal condition compared to the illegal conditions. Study 3 shows that individuals continue to believe that an illegal treatment will be more effective, even when the drug is illegal for reasons unrelated to strength, potency, or even safety.

We find that illegal products are indeed viewed as less safe than legal products, but surprisingly we also find that they are perceived to be more effective. As with other heuristics, the illegal = effective heuristic may at times be an accurate inference. For example, the healthy = expensive intuition finds that while healthier foods are certainly more expensive at times, consumers overgeneralize this belief to contexts where it is not the case (Haws, Reczek, & Sample, 2017). There are many possible reasons for a drug to be illegal, ranging from safety concerns to issues related to politics, sourcing, and history. We demonstrate that the illegal = effective heuristic holds even when the product in question is illegal for reasons unrelated to efficacy or safety. This finding has implications for public health and marketing. For example, the legalization of products such as CBD (a cannabis derived product) may lead consumers to infer reduced potency compared to when the product was not available legally.

Additionally, individuals with lower concern about legal repercussions and high concern about potency (e.g., people suffering from addiction or other mental illness) may assume that illegal products are more effective at treating their suffering than legal alternatives offered by their doctor. While many public health campaigns educate individuals about the safety concerns of illegal drugs, we hope to further explore this effect by studying whether we can reduce interest in illegal substances by reducing perceived effectiveness instead.

REFERENCES

Åsbring, P., & Närvänen, A. L. (2002). Women's experiences of stigma in relation to chronic fatigue syndrome and fibromyalgia. *Qualitative Health Research*, 12(2), 148-160.

Brody, J. (2017, November 27). New Recognition for Chronic Fatigue. https://www.nytimes.com/2017/11/27/well/new-recognition-for-chronic-fatigue.html

De Ruddere, L., Goubert, L., Vervoort, T., Prkachin, K. M., & Crombez, G. (2012). We discount the pain of others when pain has no medical explanation. *The Journal of Pain*, 13(12), 1198-1205.

De Ruddere, L., Goubert, L., Stevens, M., Williams, A. C. D. C., & Crombez, G. (2013). Discounting pain in the absence of medical evidence is explained by negative evaluation of the patient. *PAIN*, 154(5), 669-676.

Di Blasi, Z., Harkness, E., Ernst, E., Georgiou, A., & Kleijnen, J. (2001). Influence of context effects on health outcomes: a systematic review. *The Lancet,* 357(9258), 757-762.

Forstmann, M., & Burgmer, P. (2015). Adults are intuitive mind-body dualists. Journal of Experimental Psychology: General, 144(1), 222.

Forstmann, M., & Burgmer, P. (2017). Antecedents, manifestations, and consequences of belief in mind–body dualism. In *The Science of Lay Theories* (pp. 181-205). Springer, Cham.

Haws, K. L., Reczek, R. W. & Sample, K. L. (2017). Healthy diets make empty wallets: The healthy=expensive intuition. *Journal of Consumer Research,* 43 (6), 992-1007.

Hayes, S. M., Myhal, G. C., Thornton, J. F., Camerlain, M., Jamison, C., Cytryn, K. N., & Murray, S. (2010). Fibromyalgia and the therapeutic relationship: where uncertainty meets attitude. *Pain Research and Management*, 15.

Horn, E. J., Fox, K. M., Patel, V., Chiou, C. F., Dann, F., & Lebwohl, M. (2007). Are patients with psoriasis undertreated? Results of National Psoriasis Foundation survey. *Journal of the American Academy of Dermatology,* 57(6), 957-962.

Howe, L. C., Leibowitz, K. A., & Crum, A. J. (2019). When Your Doctor "Gets It" and "Gets You": The Critical Role of Competence and Warmth in the Patient-Provider Interaction. *Frontiers in Psychiatry*, 10, 475.

Hsee, C.K. (1996). Evaluability hypothesis: An explanation for preference reversals between joint and separate evaluations of alternatives. *Organizational Behavior and Human Decision Processes* 67: 247-257

Kellner, R. (1994). Psychosomatic syndromes, somatization and somatoform disorders. *Psychotherapy and Psychosomatics*, 61(1-2), 4-24.

Kraft-Todd, G. T., Reinero, D. A., Kelley, J. M., Heberlein, A. S., Baer, L., & Riess, H. (2017). Empathic nonverbal behavior increases ratings of both warmth and competence in a medical context. *PloS One*, 12(5), e0177758.

Longoni, C., Bonezzi, A., & Morewedge, C. K. (2019). Resistance to medical artificial intelligence. *Journal of Consumer Research*, 46(4), 629-650.

Looper, K. J., & Kirmayer, L. J. (2004). Perceived stigma in functional somatic syndromes and comparable medical conditions. *Journal of Psychosomatic Research*, 57(4), 373-378.

Perrott, S. B., Murray, A. H., Lowe, J., & Mathieson, C. M. (2000). The psychosocial impact of psoriasis: physical severity, quality of life, and stigmatization. *Physiology & Behavior*, 70(5), 567-571.

Promberger, M., & Baron, J. (2006). Do patients trust computers?. *Journal of Behavioral Decision Making*, 19(5), 455-468.

Raghunathan, R., Naylor, R. W., & Hoyer, W. D. (2006). The unhealthy = tasty intuition and its effects on taste inferences, enjoyment, and choice of food products. *Journal of Marketing*, 70 (4), 170–84.

Ray, O. (2004). How the mind hurts and heals the body. *American Psychologist*, 59(1), 29.

Srivastava, J. & Mitra, A. (1998). "Warranty as a signal of quality: The moderating effect of consumer knowledge on quality evaluations," *Marketing Letters, 9* (4), 327–36.

Stern, R. S., Nijsten, T., Feldman, S. R., Margolis, D. J., & Rolstad, T. (2004, March). Psoriasis is common, carries a substantial burden even when not extensive, and is associated with widespread treatment dissatisfaction. In *Journal of Investigative Dermatology Symposium Proceedings* (Vol. 9, No. 2, pp. 136-139). Elsevier.

Stojanovich, L., & Marisavljevich, D. (2008). Stress as a trigger of autoimmune disease. *Autoimmunity Reviews*, 7(3), 209-213.

Verheul, W., Sanders, A., & Bensing, J. (2010). The effects of physicians' affect-oriented communication style and raising expectations on analogue patients' anxiety, affect and expectancies. *Patient Education and Counseling*, 80(3), 300-306.

Wardle, A. (2017, January 20). IBS is underdiagnosed and undertreated in the US. https://www.univadis.co.uk/viewarticle/ibs-is-underdiagnosed-and-undertreated-in-the-us-482379

Digging Deeper into the Self: Understanding How Identity Activation and Structure Influences Behavior

Chair: Hyoseok Kim, University of Alberta, Canada

Paper #1: Look for the Signature: Personal Signatures on Marketing Stimuli Affect Consumption by Making Identities Salient

Keri L. Kettle, University of Manitoba, Canada
Antonia Mantonakis, Brock University, Canada

Paper #2: The Logged-In Shopper: How Consumer Authentication Influences Purchase Behavior

Hyoseok Kim, University of Alberta, Canada
Gerald Häubl, University of Alberta, Canada

Paper #3: Choosing Between "Me's": Why Greater Self-Variety Makes It More Difficult to Choose Between Identity Goods

Sara Loughran Dommer, Georgia Tech, USA
Karen Page Winterich, Pennsylvania State University, USA

Paper #4: Autonomous Properties of Identity

Carter Morgan, University of South Florida, USA
Keri L.Kettle, University of Manitoba, Canada
Americus Reed, University of Pennsylvania, USA

SESSION OVERVIEW

We all have a sense of who we are in the context of our social roles, ethnic or national affiliations, and character traits (Reed et al. 2012). Self-identity—defined as one's overall sense of self—guides our thoughts and feelings and influences our behavior (Kleine et al. 1993). Early self-identity research has primarily focused on how priming specific identities or constructs influences identity-relevant attitudes through self-esteem or self-consistency (Kettle and Häubl 2011; Reed et al. 2012). However, much remains unknown about the mechanisms responsible for the effects of self-identity on consumption decisions and behaviors. The papers in this session aim to address this gap by examining two important questions: 1) how does self-identity activated by contextual cues affect product evaluations and consumption decisions? and 2) how does a multifaceted view of self-identity influence identity-relevant choices?

The first two papers in this session examine the influence of self-identity prompted by contextual cues. Kettle and Mantonakis show that adding a personal signature to marketing stimuli affects consumption behavior. They find that a personal signature could be an identity prime and enhance product evaluations when the consumer's relevant identity is associative to the signer's identity but lowers evaluations when the identity is dissociative. In the second paper, Kim and Häubl argue that the timing of identity salience is critical when self-identity is involved in the activation of an implemental mindset. They find that an identification request that taps into self-identity at the beginning of a shopping process induces an implemental mindset (e.g., planning which product to buy), which renders consumers more likely to make a purchase.

The next two papers focus on how a multifaceted view of self-identity influences identity-relevant actions. Dommer and Winterich show that consumers' perceptions of the similarity between two identity options depend on self-variety—the extent to which the self is composed of many different and diverse identities. They find that individuals with low (vs. high) self-variety perceive two identity goods as more similar (vs. dissimilar) to one another, which makes it easier (vs. harder) for them to choose between the options. The final paper examines how consumers' decision confidence varies as a function

of a salient identity's agentic properties. Morgan, Kettle, and Reed show that an identity's agentic properties derive from the tendency for individuals to let others choose for them in situations where that identity is relevant and diagnostic. They examine that making an autonomous (vs. heteronomous) identity salient induces self-product connections and thus reduces the likelihood of post-choice switching.

Together, these four papers examine mechanisms by which consumers' self-identity influences how they evaluate products, make choices, and act upon those choices. The research presented in this session has implications for researchers interested in consumer identity, self-variety, agency, and judgment and decision-making.

Look for the Signature: Personal Signatures on Marketing Stimuli Affect Consumption by Making Identities Salient

EXTENDED ABSTRACT

Management at Niagara's Riverview Cellars once added a facsimile of the winemaker's personal signature to the back label of a wine sold exclusively at their retail store. Adding the signature was associated with an (statistically significant) 80% sales increase – remarkable given that the signature was printed on the bottle's back label. What could explain this?

Marketers intuit that signatures signal quality (Smith 2012). Yet, people sign their name to represent their identity in writing (Hawkins 2011), and a personal signature is thus a meaningful symbol of a person's identity (Koo and Fishbach 2016). As an identity symbol for the signer, we hypothesize that a personal signature serves as an identity prime and thus makes salient identities within a consumer's self-concept that are relevant to the signer's identity. This implies that a personal signature on marketing stimuli (e.g., label, advertisement) should enhance (attenuate) product evaluations and preference among consumers with an associative (dissociative) identity relevant to the signer's identity.

For clarity, identity self-importance describes the chronic role of an identity within the individual's self-concept, identity salience describes the current activity of an identity in one's thoughts, and identity prime is an intervention that generates identity salience (Kettle 2019); Reed 2012). An associative identity is one possessed by the signer that the consumer also sees in themselves (e.g., consumer and signer are both American), whereas dissociative identity is an identity possessed by the signer that conflicts with the consumer's identity (e.g., consumer is American, signer is Canadian).

Studies 1-2 were retail field experiments. In study 1, we manipulated whether the winemaker's personal signature was printed on a display sign located next to one type of wine in the store. We had a control condition with no display sign, a second control condition with a display sign featuring no personal signature, and a third condition with a display sign featuring a facsimile of the personal signature. The personal signature was associated with significantly greater sales as compared to the control conditions.

We conducted study 2 during a wine tasting: we manipulated whether the winemaker's personal signature was printed on the bottle's back label. Participants rated the taste and quality of the wine. We operationalized relevant self-important identity as whether the

consumer self-identified as Ontario. The personal signature generated more favourable product evaluations and greater product sales among consumers with an associative identity, but less favourable evaluations (with no effect on sales) among consumers with a dissociative identity.

Studies 3-5 were online experiments. In study 3, we crafted fictitious signatures for the founders of two unfamiliar brands (Bluebird Farms, Farm Boy) and we independently manipulated whether a personal signature was present on (versus absent from) the product label and whether the signer's identity was associative (versus dissociative) relative to the participant's home state. Replicating study 2, the personal signature on the product label led to more (less) favorable evaluations of products in the associative (dissociative) identity condition, but only among consumers with high identity self-importance.

Study 4 tested the mental mechanism (identity salience) by manipulating the diagnosticity of a subsequent hypothetical donation scenario (ostensibly) unrelated to either the personal signature or the marketing stimuli. Using an associative identity (home state) in all conditions, we independently manipulated the presence (versus absence) of a fictitious personal signature on the label of an unfamiliar brand (Organic Valley), and whether a subsequent donation scenario was identity-diagnostic (versus non-diagnostic). In the identity-diagnostic condition, we described donation recipients as originating from the participant's home state: in the non-diagnostic condition we provided no information about recipients' origins. As hypothesized, the self-importance of the consumer's associative identity only predicted donation amount in one condition: the personal signature present and identity-diagnostic condition. In all other conditions, identity self-importance did not predict donations.

Study 5 examined generalizability by manipulating whether the personal signature of baseball legend Derek Jeter appeared on Modavo watch advertisements. We asked 300 American men to rate the watches, indicate purchase interest, and rate the self-importance of their baseball identity. Replicating studies 2-4, the signature enhanced (lowered) product evaluations among passionate baseball fans (men who dislike baseball), and identity self-importance moderated the mediating role of product evaluations in the effect of personal signatures on purchase interest.

Our research contributes to our understanding of consumer identity by showing that an identity within a consumer's self-concept can be made salient by a cue that is not specific to that particular identity – the personal signature of another person who possesses a relevant identity.

The Logged-In Shopper: How Consumer Authentication Influences Purchase Behavior

EXTENDED ABSTRACT

With the rise of digital retail platforms, authentication (e.g., login) has become an important topic for both firms and researchers (Schaupp and Belanger 2005; Lee et al. 2012). Authentication is defined as the process or action of verifying the identity of a user (Basu and Muylle 2003) and it generally requires the user to enter identifying credentials (e.g., email address, fingerprint, etc.). Intuitively, authentication is irritating to consumers. Prior research shows that breaking the continuity of online shopping can reduce consumers' purchase motivation (McDowell et al. 2016). Therefore, it is in a firm's best interest to minimize consumers' effort associated with authentication until time for checkout (e.g., Expedia's login recommendation at checkout). In contrast to this view, we propose that encountering a request to authenticate when entering a store increases consumers' likelihood of making a purchase. This is because "on-entry" authentication requests activate an implemental mindset (i.e., focusing on the implementation of a goal-directed behavior), which in turn increases consumers' likelihood of purchasing a product. On the other hand, when entering a store without such authentication, consumers are more likely to be in a deliberative mindset (i.e., considering the pros and cons of pursuing a specific goal), and therefore, they tend to be less certain about whether they should make a purchase. In this case, encountering a request to authenticate just before completing a purchase does not activate an implemental mindset, which in turn reduces their likelihood of purchasing a product. Moreover, we propose that salience of self-identity during the authentication process is critical to activate an implemental mindset. Prior literature implies that an implemental mindset is induced when the sense of self is made salient during goal pursuit (Bayer and Gollwitzer 2005). Consistent with this, we examine how making an identity salient (vs. CAPTCHA) during the authentication process activates an implemental mindset, rendering consumers more likely to purchase. Three experiments support our theorizing.

In Experiment 1 (N=318), MTurk participants were randomly assigned to one of two conditions (authentication request: at the beginning vs. near the end). Participants were instructed that they were considering purchasing a new backpack in an online store and that there would be a draw at the end of the study in which one participant would be chosen as the winner. Before beginning the shopping task, participants were asked to provide their email address so that they could be contacted if they are the winner. In the authentication-request-at-the-beginning condition, participants were required to log in by confirming their (previously typed) email address to enter the store, whereas participants in the authentication-request-near-the-end condition entered the store without the login request. If participants chose not to enter the store, they proceeded to an unrelated study. Once participants entered the store, they had the opportunity to purchase one of eight different backpacks, but were free to exit the store without making a purchase. In the authentication-request-at-the-beginning condition, participants completed their purchase without additional authentication at checkout, whereas in the authentication-request-near-the-end condition, participants were required to log in by confirming their email address in order to complete their purchase. The dependent variable was whether a participant completed the purchase of a backpack. We showed that when consumers encountered an authentication request at the beginning (vs. near the end) of a shopping process, they were more (vs. less) likely to make a purchase (=20% vs. =10%; (1)=4.89, p=.03).

In Experiment 2 (N=150), we replicated our previous findings and tested whether an implemental mindset mediates the early authentication effect by introducing a procedure that offsets a deliberative-implemental mindset. MTurk participants were randomly assigned to a 2 (authentication request: at the beginning vs. near the end) x 2 (cross mindset manipulation: present vs. absent) between-participants design. In the cross-mindset-manipulation-present condition, there was an additional procedure after the manipulation of authentication which was the same as in Experiment 1. In the authentication-request-at-the-beginning condition, after participants logged in and entered the store, a deliberative mindset was activated by listing five potentially positive and five potentially negative consequences of switching banks. By contrast, in the authentication-request-near-the-end condition, after participants entered the store, an implemental mindset was activated by planning the implementation of switching banks and listing five steps to execute the plan. In the cross-mindset-manipulation-absent condition, there was no additional procedure after the manipulation of authentication. The depen-

dent variable was whether a participant completed the purchase of a backpack. We showed that the early authentication effect was attenuated in the cross-mindset-manipulation-present condition (=10% vs. =15%; (1)=7.48, *p*=.39), but not in the cross-mindset-manipulation-absent condition (=31% vs. =6%; (1)=4.70, *p*=.03).

In Experiment 3 (N=398), we tested an important boundary condition: identity salience. MTurk participants were randomly assigned to a 2 (authentication request: at the beginning vs. near the end) x 2 (identity salience: authentication vs. CAPTCHA) between-participants design. In the authentication condition, the manipulation of authentication at the beginning versus authentication near the end was the same as in Experiment 1. In the CAPTCHA condition, on the other hand, participants proved that they were not a robot at the beginning (vs. near the end). The dependent variable was whether a participant completed the purchase of a water bottle. We showed that the early authentication effect held in the authentication condition (=25% vs. =13%; (1)=4.56, *p*=.03), but not in the CAPTCHA condition (=21% vs. =19%; (1)=.25, *p*=.61). This experiment rules out an alternative explanation based on the sunk cost fallacy. If the increase of the purchase rate in the authentication-at-the-beginning condition is driven by the mere effort that consumers invest in the purchase process, then the purchase rate in the CAPTCHA-at-the-beginning condition should also have increased. However, as demonstrated, this was not the case.

This research examines how the timing of consumer authentication influences shopping behavior. It contributes to prior literature on how contextual cues that consumers encounter while shopping activate deliberative versus implemental mindsets and thereby influence their purchase behaviors. Our findings have an important managerial implication: firms can benefit from providing authentication requests first in a shopping environment.

Choosing Between "Me's": Why Greater Self-Variety Makes It More Difficult to Choose Between Identity Goods

EXTENDED ABSTRACT

Consumers are motivated to behave in identity-congruent ways (Oyserman 2009). As such, prior research has established consumers' preference for identity products, especially when the identity is salient (Reed et al. 2012). But these paradigms have traditionally pitted goods that express or are linked to one's identity ("identity goods") with neutral (no identity) goods, prompting the question – what happens when an individual must choose between two identity goods?

In the typical choice model, choosing creates conflict because the chosen option is never perfect, and the forgone option has some desirable aspects that are lost (Festinger 1964; Shultz, Léveillé, and Lepper 1999). The more features shared by choice options, however, the less time needed to make the decision (Chernev 1997; Houston, Sherman, and Baker 1991; Nagpal et al. 2011). In the extreme case, choosing between two identical goods should be very easy. On the other hand, choosing between two very distinct goods is more difficult, as consumers experience conflict when choice involves trade-offs among different attributes (Shugan 1980). Thus, the difficulty experienced when choosing between two identity goods should depend on the similarity between the two identity options. We believe that consumers' perceptions of the similarity between two identity options will depend on how much similarity (or distinctiveness) they have within their self—a measure we are calling "self-variety."

The self links various aspects of self-knowledge, including roles, identities, and traits based on associative relations (Campbell,

Assanand, and Di Paula 2000; Gramzow et al. 2000; Greenwald et al. 2000; Reed and Forehand 2016; Reed et al. 2012). The amount of variety within the self essentially assesses how distinctive each identity is from others within the global self, based on the degree of shared associations between each identity (Campbell et al. 2000). At one end of the spectrum, low self-variety, the self can contain a few identities with many associations, creating an amorphous whole with little differentiation. At the other end of the spectrum, high self-variety, the self can contain a greater number of identities with few associations, indicating that the self is multifaceted and unique across identities, contexts, and situations.

Identities share more in common for individuals with low self-variety than individuals with high self-variety. Such identity integration can help reduce conflict across identities (Benet-Martínez et al. 2002; Zou, Morris, and Benet-Martínez 2008). Thus, we believe that individuals with low self-variety will perceive two identity goods as more similar to one another, which should make it easier for them to choose between the options (Chernev 1997; Houston et al. 1991; Nagpal et al. 2011). On the other hand, because their identities are distinct from one another, individuals with high self-variety should view identity goods as being more dissimilar to one another. Without a dominant option, it should be difficult for them to choose between two identity goods (Dhar 1997; Shugan 1980; Tversky and Shafir 1992).

Six studies support our theorizing. In study 1a, a panel of parents made a hypotehtical choice between two pairs of socks and completed our measure of self-variety. Participants with high self-variety took longer to make a choice when their choice set contained two identity-related socks compared to individuals with low self-variety, and relative to when their choice set contained only one pair of identity socks. Study 1b replicated the results of study 1a in a lab experiment where students made a real choice between canvas bags.

In study 2, we manipulated self-variety through a writing task. Participants then made a hypothetical choice between two t-shirts. In addition to capturing the time they took to make the decision, we also included an explicit measure of choice difficulty. Individuals in the high self-variety condition took longer to decide and reported greater decision difficulty when two identity options were present in a choice set compared to those in the low self-variety condition, and relative to when their choice set contained only one identity option.

In study 3, in addition to the two identity goods, we also included a non-identity (i.e., neutral) good the choice set. In support of our theorizing that deciding between two identity goods is especially difficult for individuals with high self-variety, these individuals were more likely to "opt-out" of the decision and choose the neutral option compared to individuals with low self-variety.

Study 4 included a condition where instead of choosing between goods, participants simply rated them. We find our effect of self-variety and the number of identity goods on the length of time it took participants to choose between products, but not on the length of time it took participants to evaluate products, suggesting that decision time is not measuring information processing or involvement.

In Study 5 participants made a real choice between two different stress balls. We measured both the time they took to make their decision as well as perceptions of similarity between the two stress balls. We once again replicated our effect and demonstrate that perceptions of similarity mediates the effect.

Finally, in study 6, we primed either a maximizing or satisficing mindset (Ma and Roese 2014). A satisficing mind-set reduced decision difficulty among individuals with high self-variety, suggesting that these individuals have a tendency to engage in greater comparison of options. Priming a maximizing mind-set, however, encour-

ages such comparison and thus increased decision difficulty among those with low self-variety.

In examining the effect of self-variety on a choice set consisting of more than one identity good, we make two important contributions. First, we contribute to work on identity-based motivation (Oyserman 2009) by examining a context in which consumers must choose between two actions, each of which is congruent with one of their identities. Second, while only few papers in marketing have examined multiple identities (Saint Clair and Forehand 2019; Winterich and Barone 2011; Winterich, Mittal, and Ross 2009), even fewer have looked at the structure among an individual's multiple identities (Savary and Dhar 2020). By demonstrating the effect of high self-variety on choosing between two identity goods, we offer a more comprehensive understanding of how one's self influences consumer behavior.

Autonomous Properties of Identity

EXTENDED ABSTRACT

We all possess different identities that comprise our overall sense of who we are (Reed et al. 2012). It is well-established that different identities, ranging from gender to athlete, musician to soldier, predictably influence consumer decisions in identity-diagnostic contexts (Reed and Forehand 2016). But how might identities influence decisional autonomy in contexts that are not identity-diagnostic? And what downstream consequences might these effects have?

Though autonomy is central to an individual's sense of self (Deci and Ryan 2002), not all identities are equally centered on autonomy. We examine how the *autonomous properties* of an identity – the centrality of autonomous decision-making in shaping that identity – vary across identities, and predictably affect consumer choice and post-choice behavior. First, we establish that autonomy is more central to certain identities, and we pinpoint the key determinant of an identity's autonomous property as the extent to which one lets others make choices for them when that identity is relevant. Then, we demonstrate that triggering an autonomous (versus heteronomous) identity in a choice context strengthens self-product connection, and leads consumers to stick with their choice in the face of disconfirming information.

We began our investigation by developing a 4-item autonomous properties (AP) scale inspired by the autonomy literature (Hong and Faedda 1996; Moller et al. 2007). This scale examines identity-specific associations with autonomous versus constrained behavior (e.g., "When in a context where my [target identity] is relevant, my freedom of choice is restricted."). Each item was on a 7-point scale (1 = strongly disagree, 7 = strongly disagree). Scale reliability was high across all four studies ($\alpha \geq .78$).

We conducted studies 1-2 to examine how autonomous properties vary across different identities within the same individual's self-concept. In study 1 we examined peoples' perceptions for autonomous properties of common identities: family identity (son, daughter), gender identity (man, woman), university student, and Greek member (fraternity, sorority). We were particularly interested in contrasting pairs of identities that would both reside within a single consumer's self-concept: man vs. son, woman vs. daughter, and university student vs. Greek member. Within these pairs, participants perceived greater autonomy for (1) the man identity versus the son identity, (2) the female identity versus the daughter identity, and (3) the university student identity versus the Greek (fraternity, sorority) identities.

In study 2, using a within-subject design, we examined the autonomous properties for two of each participant's own identities:

their gender identity (man, woman) and their family identity (son, daughter). Consistent with study 1, both male and female participants considered their gender identity to be more autonomous than their family (son, daughter) identity. Together, studies 1 and 2 provide convincing evidence that identities have distinct autonomous properties.

Having established that autonomous properties differ across identities, in studies 3 and 4 we investigated the extent to which autonomous (vs. heteronomous) identities might influence product choice and self-product connection. In study 3, we asked participants to describe an identity they possessed. We manipulated (between-subject) whether that identity was autonomous ("an identity with which you feel you have very few restrictions on your actions and behavior") or heteronomous ("… very many restrictions …"). We then asked participants to think of a physical item that they associate with that identity. Participants in the autonomous identity condition indicated a stronger self-product connection to their self-generated item than participants in the heteronomous identity condition. The relationship between the autonomous (versus heteronomous) identity and the self-product connection was fully mediated by the autonomous properties of the identity.

Study 4 used a similar task as study 3: we asked participants to describe an identity they possess (autonomous versus heteronomous) and a physical item that they associate with that identity. Replicating study 3, self-product connection was stronger in the autonomous (versus heteronomous) identity condition. We then asked participants to imagine a scenario in which a better alternative was available to replaced their existing product. Participants were less likely to switch in the autonomous (versus heteronomous) identity condition, and this effect was fully mediated by self-product connection.

In study 5, we turned our attention to pinpointing the key characteristic underlying the difference between autonomous versus heteronomous identities. We examined six potential characteristics, such as how much one considers others when that identity is relevant, and how often they are faced with difficult decisions. We examined four identities (family, gender, student, Greek member). Replicating studies 1-2, the gender and student identities had stronger autonomous properties than the family and Greek member identities. Importantly, only one characteristic explained the difference in autonomous properties across all identities: for autonomous (vs. heteronomous) identities, participants were less likely to have other people make decisions on their behalf: this fully mediated the relationship.

Our work provides an important contribution to the identity and decision-making literatures. Where prior findings identify interpersonal differences in autonomous behavior, we demonstrate an intrapersonal factor – the autonomous properties of distinct identities within one's self-concept – that predictably impacts self-product connection and willingness to forego a previously chosen option. While prior work on consumer autonomy highlights differences in agentic behavior across individuals, we demonstrate intra-individual differences in autonomy that directly impact consumer decision-making.

REFERENCES

Basu, Amit, and Steve Muylle (2003), "Authentication in E-Commerce," *Communications of the ACM*, 46 (12), 159-166.

Benet-Martínez, Verónica, Janxin Leu, Fiona Lee, and Michael W. Morris (2002), "Negotiating Biculturalism: Cultural Frame Switching in Biculturals with Oppositional Versus Compatible Cultural Identities," *Journal of Cross-Cultural Psychology*, 33 (5), 492-516.

Campbell, Jennifer D., Sunaina Assanand, and Adam Di Paula (2000), "Structural Features of the Self-Concept Amd Adjustment," in *Psychological Perspectives on Self and Identity*, Abraham Tesser and Richard B. Felson and Jerry M. Suls, eds. Washington, DC: American Psychological Association, 67-87.

Chernev, Alex (1997), "The Effect of Common Features on Brand Choice: Moderating Role of Attribute Importance," *Journal of Consumer Research*, 23 (4), 304-11.

Dawar, Niraj, and Philip Parker (1994). "Marketing Universals: Consumers' Use of Brand Name, Price, Physical Appearance, and Retailer Reputation as Signals of Product Quality," *Journal of Marketing*, 58 (2), 81-95.

Deci, Edward L., and Richard M. Ryan (2002), "Overview of Self-Determination Theory: An Organismic Dialectical Perspective," *Handbook of Self-Determination Research*, 3-33.

Dhar, Ravi (1997), "Consumer Preference for a No-Choice Option," *Journal of Consumer Research*, 24 (2), 215-31.

Festinger, Leon (1964), *Conflict, Decision and Dissonance*. Stanford: Stanford University Press.

Forehand, M. R., & Deshpandé, R. (2001), "What We See Makes Us Who We Are: Priming Ethnic Self-Awareness and Advertising Response," *Journal of Marketing Research*, *38* (3), 336-348.

Gramzow, Richard H., Constantine Sedikides, A. T. Panter, and Chester A. Insko (2000), "Aspects of Self-Regulation and Self-Structure as Predictors of Perceived Emotional Distress," *Personality and Social Psychology Bulletin*, 26 (2), 188-205.

Greenwald, Anthony G., Mahzarin R. Banaji, Laurie A. Rudman, Shelly D. Farnham, Brian A. Nosek, and Marshall Rosier (2000), "Prologue to a Unified Theory of Attitudes, Stereotypes, and Self-Concept," in *Feeling and Thinking: The Role of Addect in Social Cognition and Behavior*, Joseph P. Forgas, ed. New York: Cambridge University Press, 308-30.

Hawkins, Chris (2011). *A History of Signatures: From Cave Paintings to Robo-Signings*. CreateSpace.

Hong, Sung-Mook, and Salvatore Faedda (1996), "Refinement of the Hong Psychological Reactance Scale," *Educational and Psychological Measurement*, 56 (1), 173-82.

Houston, David A., Steven J. Sherman, and Sara M. Baker (1991), "Feature Matching, Unique Features, and the Dynamics of the Choice Process: Predecision Conflict and Postdecision Satisfaction," *Journal of Experimental Social Psychology*, 27 (5), 411-30.

Kettle, Keri L (2019). "Identity Salience: Understanding When Identity Affects Consumption," *Handbook of Research on Identity Theory in Marketing*, Edward Elgar Publishing.

Kettle, Keri L., and Gerald Häubl (2011), "The Signature Effect: Signing Influences Consumption-Related Behavior by Priming Self-Identity," *Journal of Consumer Research*, *38* (3), 474-489.

Kleine, Robert E., Susan S. Kleine, and Jerome B. Kernan (1993), "Mundane Consumption and the Self: A Social-Identity Perspective," *Journal of Consumer Psychology*, 2 (3), 209-35.

Koo, Minjung, and Ayelet Fishbach (2016). "Giving the Self: Increasing Commitment and Generosity Through Giving Something That Represents One's Essence," *Social Psychological and Personality Science*, 7 (4), 339-348.

Lee, Jong-Eun Roselyn, Shailendra Rao, Clifford Nass, Karin Forssell, and Jae Min John (2012), "When Do Online Shoppers Appreciate Security Enhancement Efforts? Effects of Financial Risk and Security Level on Evaluations of Customer Authentication," *International Journal of Human-Computer Studies*, *70* (5), 364-376.

Ma, Jingjing and Neal J Roese (2014), "The Maximizing Mind-Set," *Journal of Consumer Research*, 41 (1), 71-92.

McDowell, William C., Rachel C. Wilson, and Charles Owen Kile Jr (2016), "An Examination of Retail Website Design and Conversion Rate," *Journal of Business Research*, *69* (11), 4837-4842.

Moller, Arlen C., Richard M. Ryan, and Edward L. Deci (2007), "Self-Determination Theory and Public Policy: Improving the Quality of Consumer Decisions Without Using Coercion," *Journal of Public Policy and Marketing*, 25 (1), 104-16.

Nagpal, Anish, Adwait Khare, Tilottama Chowdhury, Lauren Labrecque, and Ameet Pandit (2011), "The Impact of the Amount of Available Information on Decision Delay: The Role of Common Features," *Marketing Letters*, 22 (4), 405-21.

Oyserman, Daphna (2009), "Identity-Based Motivation: Implications for Action-Readiness, Procedural-Readiness, and Consumer Behavior," *Journal of Consumer Psychology*, 19 (3), 250-60.

Reed, Americus, II and Mark R. Forehand (2016), "The Ebb and Flow of Consumer Identities: The Role of Memory, Emotions and Threats," *Current Opinion in Psychology*, 10, 94-100.

Reed, Americus, II, Mark R. Forehand, Stefano Puntoni, and Luk Warlop (2012), "Identity-Based Consumer Behavior," *International Journal of Research in Marketing*, 29 (4), 310-21.

Saint Clair, Julian K and Mark R Forehand (2019), "The Many-Faced Consumer: Consumption Consequences of Balancing Multiple Identities," *Journal of Consumer Research*, 46 (6), 1011-1030.

Savary, Jennifer and Ravi Dhar (2020), "The Uncertain Self: How Self-Concept Structure Affects Subscription Choice," *Journal of Consumer Research*, 46 (5), 887-903.

Schaupp, L. Christian, and France Bélanger (2005), "A Conjoint Analysis of Online Consumer Satisfaction," *Journal of Electronic Commerce Research*, *6* (2), 95.

Shugan, Steven M (1980), "The Cost of Thinking," *Journal of consumer Research*, 7 (2), 99-111.

Shultz, Thomas R., Elène Léveillé, and Mark R. Lepper (1999), "Free Choice and Cognitive Dissonance Revisited: Choosing "Lesser Evils" Versus "Greater Goods"," *Personality and Social Psychology Bulletin*, 25 (1), 40-48.

Tversky, Amos and Eldar Shafir (1992), "Choice under Conflict: The Dynamics of Deferred Decision," *Psychological Science*, 3 (6), 358-61.

Winterich, Karen Page and Michael J. Barone (2011), "Warm Glow or Cold, Hard Cash? Social Identify Effects on Consumer Choice for Donation Versus Discount Promotions," *Journal of Marketing Research*, 48 (5), 855-68.

Winterich, Karen Page, Vikas Mittal, and William T. Ross, Jr. (2009), "Donation Behavior toward in-Groups and out-Groups: The Role of Gender and Moral Identity," *Journal of Consumer Research*, 36 (2), 199-214.

Zou, Xi, Michael W. Morris, and Verónica Benet-Martínez (2008), "Identity Motives and Cultural Priming: Cultural (Dis) Identification in Assimilative and Contrastive Responses," *Journal of Experimental Social Psychology*, 44 (4), 1151-59.

Consumer Misunderstandings

Chairs: Amit Kumar, University of Texas at Austin, USA
Dafna Goor, Harvard Business School, USA

Paper #1: A Little Good Goes an Unexpectedly Long Way: Underestimating the Positive Impact of Kindness on Recipients
    Amit Kumar, University of Texas at Austin, USA
    Nicholas Epley, University of Chicago, USA

Paper #2: The I Told You So Effect
    Ovul Sezer, University of North Carolina at Chapel Hill, USA
    Sal Affinito, University of North Carolina at Chapel Hill, USA
    Brad Staats, University of North Carolina at Chapel Hill, USA

Paper #3: Keep Talking: (Mis)Understanding the Hedonic Trajectory of Conversation
    Ed O'Brien, University of Chicago, USA
    Michael Kardas, University of Chicago, USA
    Juliana Schroeder, University of California at Berkeley, USA

Paper #4: The Road Not Taken: Consumption of Unfamiliar Products Increases Feelings of Self-Discovery and Product Engagement
    Dafna Goor, Harvard Business School, USA
    Grant E. Donnelly, The Ohio State University, USA
    Michael I. Norton, Harvard Business School, USA

SESSION OVERVIEW

Nobel Prize-winning economic theory suggests that consumer's choices are guided by an implicit or explicit calculation of expected value (Becker, 1993). However, consumers may sometimes have mistaken expectations. Such misunderstandings based on erroneous beliefs or miscalibrated perceptions can result in consumers theoretically acting rationally—that is, consistent with their expectations—but nevertheless behaving suboptimally.

This session integrates four papers examining these sorts of consumer misunderstandings in daily life. These advanced projects (involving highly-powered field, laboratory, and online experiments) span topics of broad interest to consumer behavior researchers—from prosocial behavior to advice to conversation to engagement during consumption. And yet, they are highly connected: Each talk reveals a tendency for consumers to miscalculate the complexities of their everyday interactions, from the surprising depth of one's own and others' emotional reactions to the surprising pleasures of stepping outside one's comfort zone. Together, they elucidate the need for better understanding how to enhance consumer welfare.

Kumar and Epley investigate the beliefs about and reality following prosocial acts. Participants in their experiments predict how recipients will respond to their prosociality and recipients report their actual experience. They find that, due to an egocentric bias, those performing an act of kindness consistently underestimate how positive their recipients will feel. Consumers not recognizing the impact of their prosociality on others can stand in the way of themselves and others being better off.

Sezer et al. explore what they call the "I Told You So Effect" in the domain of advice. Hearing someone say "I told you so" after a misstep has been made can hurt relationships, decrease the likelihood of following subsequent advice, and thereby serve as a barrier to effective learning. Nonetheless, people often mistakenly choose to use this common phrase when giving advice.

Kardas, Schroeder, and O'Brien study mispredictions about the hedonic trajectory of conversation. Participants in these studies report believing that conversations with another person will become less enjoyable over time, but actually experience more positive outcomes as discussions continue. As a result, people may under-exploit very effective opportunities to enrich themselves through interactions with others.

Goor, Donnelley, and Norton examine how unfamiliarity can lead to feelings of self-discovery. Specifically, they demonstrate that although consumers tend to like familiar products and experiences, unfamiliar products and experiences can foster greater consumer engagement. Engagement with the unfamiliar promotes a clearer understanding of who one really is. Importantly, they document evidence for a particular zone of proximal discovery: Moderately unfamiliar consumption experiences are most likely to facilitate self-discovery.

Notably, this work showcases several topics consistent with the theme of this year's conference, including gift-giving, identity, and interpersonal communication. In the City of Light, we hope to shine a light on some mistaken beliefs that appear to exist in consumers' minds. Our field is uniquely suited to understanding causes and consequences that can suggest steps consumers might take in order to make themselves better off. A better understanding of these misperceptions, we believe, can suggest ways for consumers to improve the quality of their day-to-day lives.

A Little Good Goes an Unexpectedly Long Way: Underestimating the Positive Impact of Kindness on Recipients

EXTENDED ABSTRACT

Positive interpersonal contact promotes well-being (Kahneman & Deaton, 2010). For example, consumers who spend money on others are happier those who spend on themselves (Dunn, Aknin, & Norton, 2008). Prosociality, then, can improve consumer welfare. Consumers have many opportunities to act prosocially but may not engage in prosocial behavior as often in everyday life as might be optimal. It is sometimes said that "a little good goes a long way." We find that it goes an *unexpectedly* long way: Performers of acts of kindness systematically underestimate the positive impact they have on recipients. These miscalibrated expectations matter because they create a barrier to prosocial engagement (Kumar & Epley, 2018). Decisions are guided partly by the expected value of action; the expected impact of a prosocial act on others may therefore guide one's behavior.

We first tested, on a broad range of participants, whether recipients of a prosocial act feel more positive than performers of the act anticipate. In **Experiment 1a**, MBA students (N = 106) in a field experiment performed a variety of self-chosen acts of kindness and predicted how their recipients would react. Participants engaged in many different acts, including purchasing coffee, buying flowers, and delivering baked goods to others. We compared performer expectations to recipients' actual experience. Performers reported that their act was not as "big" as recipients perceived it to be, and reported expending less time, money, and energy than recipients believed performers had expended (ps < .001). Performers also expected recipients to feel positive, but recipients reported feeling even more positive than performers anticipated (p < .001). Consistent with prior research, performing a prosocial act was a significantly positive experience for performers as well, in this and all experiments (ps <

.001). Performers additionally indicated that they perform prosocial acts less often than they'd like (*p* < .001).

Experiment 1b replicated these findings holding the act itself relatively constant. The standardized prosocial behavior was sending a card to someone "just because." One hundred undergraduates did this and predicted how recipients would feel. We followed-up with recipients and measured how they actually felt. Performers again reported that their act was not as "big" as recipients perceived it to be, and also reported expending less time and energy than recipients believed performers had expended (*p*s < .001). They also significantly underestimated how positive recipients would feel (*p* < .05).

Experiments 2a and 2b provided tests of our hypotheses in designs enabling perfect response rates from recipients, something we could not obtain in the field settings of Experiments 1a-1b. We achieved this by having participants perform a prosocial act for a stranger nearby. Experiment 2a involved members of the public (N = 84) who were visiting an attraction in a large urban field setting. Participants at a park gave hot chocolate to another person near an ice-skating rink. Givers again reported that their act was not as "big" as recipients perceived it to be, and significantly underestimated how positive it made recipients feel (*p*s < .001). Experiment 2b (N = 102) replicated these effects in a controlled laboratory setting, with participants giving away gifts from a "lab store" as the act of kindness (*p*s again < .001).

We hypothesized that people undervalue the impact of prosociality due to a perspective-based asymmetry in attention paid to competence versus warmth in evaluating interpersonal behavior (Wojciszke, 1994). People focus more on competence when evaluating their own behavior but more on warmth when evaluating others' behavior. This could cause givers to focus inordinately on the details of the act itself: what one is giving and its objective value. Recipients of an act of kindness, however, care about what is given but also the positive intention and warmth that the act signifies. **Experiment 3** tested this explanation by comparing an act of kindness condition to a control condition in which participants received the same objective item but without it resulting from a prosocial act. Forty-nine participants gave a cupcake to 49 strangers in a park and predicted their reactions, while another 50 participants predicted the actual responses of 50 participants who received a cupcake from an experimenter (not as an act of kindness). Recipients reported a more positive and valuable experience in the kindness condition than in the control condition (p_{big} < .001; p_{mood} = .06), but those predicting their responses anticipated similar experiences for recipients in these two conditions (*p*s > .1). A recipient's reaction to a prosocial act comes from the objective value of the act itself, plus the warmth conveyed by it. Here, performers may have attended to how much someone would like a cupcake, but not to the fact the cupcake was also a gift given in kindness.

Experiment 4 (N = 200) examined whether underestimating a recipient's emotional reaction also leads to underestimating their behavioral reaction. Kindness can spread through indirect reciprocity (Gray, Ward, & Norton, 2014). Those who receive kindness are more likely to behave kindly to others in the future. If people undervalue the positive impact of prosociality on others, they should also underestimate the magnitude of indirect reciprocity it produces in others. Participants completed a laboratory version of Experiment 3 (using gifts from Experiment 2b), and recipients were later assigned the role of "decider" in a dictator game (Camerer, 2003). Performers of the act predicted their recipient's behavior. They again underestimated the positive impact their prosocial act had on the recipient, both on the recipient's emotional experience and on their increased kindness towards a third party (*p*s < .05).

Whereas those who perform an act of kindness might construe their act as relatively "little," as if they are not doing much at all, recipients construe it to be significantly "bigger" and of greater value than performers expect. Misunderstanding how recipients will respond may leave people choosing to engage in prosociality less often than they want to, thereby representing a barrier to prosocial interactions. Undervaluing the positive impact of a prosocial action can therefore keep people from being prosocial *enough* for both their own and others' well-being.

The I Told You So Effect

EXTENDED ABSTRACT

From solving complex problems to making purchases, people often rely on advice from others. In fact, consumers rarely make critical decisions in isolation. Prior research has identified multiple factors that influence individuals' use of advice. For instance, decision-makers weigh advice more heavily when the advice is costly to get (Patt, Bowles, & Cash, 2006), or when the task is difficult (Gino & Moore, 2007). When people feel confident or experience anger (Bonaccio & Dalal, 2006; Gino & Schweitzer, 2008), they are less likely to rely on advice. Similarly, advisor characteristics also impact whether people follow their advice. When the advisors are more experienced (Feng & MacGeorge, 2006; Goldsmith & Fitch, 1997; Harvey & Fischer, 1997; Sniezek, Schrah, & Dalal, 2004; Soll & Larrick, 2009; Yaniv, 2004; Yaniv & Milyavsky, 2007) and have greater confidence (Phillips, 1999; Sniezek & Buckley, 1995; Sniezek & Van Swol, 2001; Soll & Larrick, 2009; Van Swol & Sniezek, 2005; Yaniv & Foster, 1997), the advice is weighted more heavily.

At the same time, however, the consequences of expressions that advisors use depend on the psychological and emotional reaction of the targets, and critically on their appraisal of the advisor statements as helpful or not, because interpersonal aspects in advice exchange are as important as the quality of the advice (Blunden, Logg, Brooks, John, & Gino, 2019). While previous research has focused on expressions that prompt advisor credibility and confidence (Soll & Larrick, 2009), little is known about the effects of statements that backfire. In the current research, we investigate a common and a universal statement that is of critical importance in advice-giving contexts: "I told you so."

Building on past research on advice-giving and learning, we conceptualize "I told you so" as a statement that stems from the satisfaction of being right. We propose that individuals who hear this statement view the advice giver as more condescending, less empathic, and less trustworthy. We suggest that although it is a very common statement that exists in all languages across the world, and is a universal phenomenon, saying I told you so backfires as it harms trust in advice exchange and hurts learning.

In **Study 1** (*N* = 302), participants estimated an individual's weight from a photograph for three rounds. Out of 302 participants, 133 of them ignored their advisor's estimate in Round 1, and 169 of them took the advice. In Round 2, those who didn't follow the advice in Round 1, got another piece of advice, but half of them heard the new advice with "I told you so" while the other half only heard just the advice. Among the ones who ignored their partner's advice in the first round, those who received Round 2 advice with "I told you so" perceived the advice to be lower quality than those who received the same advice without the I told you so statement, *t* (131) = 2.64, *p* = .009, *M* = 4.11 vs *M* = 4.75. Similarly, the group that received "I told you so" perceived their advisor to be more condescending, *t* (131) = 7.69, *p* = < .001, *M* = 4.89 vs *M* = 2.53, and less empathic *t* (131) = 3.43, *p* = .0008, *M* = 3.54 vs *M* = 4.24.

In **Study 2** (*N*=500), we employed the same design as Study 1, and randomly assigned participants to one of two between-participants conditions: *"I told you so" vs "You were wrong.".* When participants didn't follow their partners' advice, in Round 2, they either received "I told you so" or "You were wrong" as a message in addition to advice for the new round. Out of 500 participants, 276 of them ignored the advice from their partner in Round 1. Among the group who ignored their partner's advice, those who received "I told you so" perceived their partners to be more condescending *t* (274) = 8.07, *p* = < 001, *M* = 5.01 vs *M* = 3.71, and less empathic *t* (274) = 4.32, *p* = .002, *M* = 1.81 vs *M* = 2.37, than those who received "You were wrong" from their partners.

In **Study 3** (*N*=102), participants in the lab completed the same weight estimation task, and those who received "I told you so" in Round 2, along with the advice, perceived their partner to be more condescending, *t* (100) = 9.67, *p* < 001, *M* = 5.03 vs *M* = 2.87, less empathic *t* (100) = 7.23, *p* < 001, *M* = 1.81 vs *M* = 3.56, and less trustworthy *t* (100) = 3.89, *p* = .004, *M* = 3.56 vs *M* = 4.35 than the participants who didn't hear I told you so but received the same advice. More importantly, those who received "I told you so" were less likely to choose the same partner for the subsequent round, *p* = .03.

In **Study 4** (*N*=200), participants engaged in 10 rounds of the same task, but as an advisor this time. After each round, they found out they were right, and their partner was wrong, and they could either send "Bummer!" or "Bummer, I told you so!" as a message. 142 out of 200 participants (71%) chose to send the "I told you so" message at least once across 10 rounds, and on average, participants chose to send this message 3.235 times of the possible 10. About 23% of participants chose to say I told you so after only Round 1. In other words, despite not liking this statement (as found in Studies 1, 2, and 3), when given a chance, participants use the opportunity to say "I told you so."

We contribute to the advice literature by focusing on interpersonal effects, as opposed to decision accuracy and quality, which has been the primary focus of previous research (Bonaccio & Dalal, 2006). We introduce and examine the psychology underlying a common advice statement "I told you so" and shed light on the importance of empathy and trust in learning and building an advisor-advisee relationship.

Keep Talking: (Mis)Understanding the Hedonic Trajectory of Conversation

EXTENDED ABSTRACT

People engage in conversation every day, from small-talking with colleagues to checking in with close others. We explore one common but consequential conversation opportunity: talking with new acquaintances. People encounter far more opportunities to interact with new acquaintances than they take (Hill & Dunbar, 2003), yet doing so forms the basis of richer relationships. Typically, the more people talk, the more they learn, the closer they feel, and the more they like each other (Aron et al., 1997; Quoidbach et al., 2019; Reis, 2012). Only by continuing the conversation do two strangers have a chance of becoming two friends.

Why might people forego such opportunities? On the one hand, people cannot always tell whether others are willing to engage at all. Thus, people often fail to initially approach others to start any conversation (Boothby et al., 2018; Dunn et al., 2007; Epley & Schroeder, 2014). We build on this idea by examining another barrier that may rise *after* people have officially met and enjoyed some initial conversation. Specifically, even after enjoying the start of a conversation, people may believe the experience will quickly grow dull as they and their partner must *maintain* a conversation—despite the aforementioned research suggesting the opposite.

Two other literatures support this possibility. First, predictions about future experiences reflect one's mental simulations of those experiences, but mental simulations are "mere cardboard cutouts of reality" (Gilbert & Wilson, 2007, p. 1354). As a result, after people initially experience an enjoyable stimulus, they tend to underappreciate the extent to which repeat exposures can reveal exciting new information (O'Brien, 2019). People notoriously misunderstand how experiences build and grow over time. Second, people are especially prone to misunderstand the depth and complexity of *other people,* given the inaccessibility of others' elaborate mental lives from an observer perspective (Waytz et al., 2013). For example, people tend to underestimate others' capacities to generate nuanced opinions and experience intense emotions (Pronin, 2008).

Put succinctly, these literatures suggest people may underappreciate the extent to which they and a new acquaintance will continue to find new things to discuss beyond their initial interaction, leading people to underappreciate their enjoyment as they continue conversing—*even if* they enjoyed chatting initially.

In **Experiment 1**, pairs of strangers (*N* = 100 pairs) conversed for one round (3 minutes). Some pairs then predicted their trajectory of enjoyment over four additional rounds. Others actually continued conversing and reported their enjoyment round-by-round. We observed the hypothesized Role × Round interaction (*p* < .001): Whereas *Predictors* expected enjoyment to decline over time (*p* < .001), *Experiencers* reported that enjoyment actually increased (*p* = .010).

Experiment 2 utilized a within-participant design, with the same participants first making predictions and then reporting their experiences. We also tested mechanism: Whether people misunderstand the hedonic trajectory of conversation because they underestimate how much their pair will have to discuss. Pairs of strangers (*N* = 50 pairs) completed a similar experiment to Experiment 1. We also measured conversation material ("How much will you [did you] have to discuss during this round?"). For enjoyment, we again observed the hypothesized Phase × Round interaction (*p* = .017): Participants predicted that enjoyment would decline (*p* < .001), yet those same participants then experienced similarly high enjoyment (*p* = .920). This interaction also emerged for conversation material (*p* < .001): Participants predicted that conversation material would diminish (*p* < .001), yet then maintained ample material (*p* = .797). The effect of Phase on changes in enjoyment, via changes in conversation material, was significant (*b* = -0.38, 95% CI = [-0.80, -0.15]).

If people underestimate enjoyment because they underestimate their pair's ability to sustain material, they might underestimate enjoyment more when having one long conversation with the same person (deepening one relationship) versus having multiple shorter conversations with different people (broadening their network). **Experiment 3** tested this possibility (*N* = 395 individuals). Procedures were identical to Experiment 2, except participants were randomly assigned to either have five rounds of conversation with the same partner, or five rounds of conversation each with new partners. Again, there were significant Phase × Round interactions for enjoyment and conversation material (*p*s < .001), with participants generally underestimating both. Most interesting, we observed split evidence for Partner effects. There was *no* 3-way interaction for enjoyment (*p* = .584): All participants (regardless of partner) predicted declining enjoyment (*p*s < .001) yet then experienced increasing enjoyment (*p*s < .019). However, there *was* a 3-way interaction for conversation material: Same-partner participants were *especially* likely to underestimate conversation material as compared to different-partner

participants ($p < .001$). Conversation material again served as the mediator ($b = -0.44$, 95% CI = [-0.61, -0.28]).

These experiments reveal that people misunderstand the hedonic trajectory of conversation. Even after enjoying some initial conversation, people imagined that further conversation would quickly grow dull—yet experienced similar or greater enjoyment in reality.

Our findings advance research on social forecasting errors. Conversation provides feedback about others and thus should calibrate expectations. However, our paradigm compares predictions to experiences *after* one round of conversation and finds that people still underestimate enjoyment under these conservative conditions. Social forecasting errors may arise not only from lack of knowledge about one's initial approach but also from misunderstanding how the experience will change as they *keep* talking.

Additionally, our participants underestimated enjoyment because they underestimated their pair's ability to sustain material, but also underestimated enjoyment before speaking with multiple partners, when material should be ample. Perhaps people are also (mistakenly) worried about how fatiguing social interaction is (Zelenski et al., 2013). Future research should further unpack whether people are concerned that they themselves (versus their partner) will struggle to generate material. Finally, future research should examine downstream effects. People may exit conversations earlier than they should for their own happiness, just as our participants underappreciated how much further conversation would measure up to initial conversation. Accordingly, people may keep to themselves or pursue impoverished interactions through social media (Kross et al., 2013), while returning to those we already know may prove more rewarding.

The Road Not Taken: Consumption of Unfamiliar Products Increases Feelings of Self-Discovery and Product Engagement

EXTENDED ABSTRACT

As consumers, our identity and roles in life are intertwined with our possessions and consumption behaviors (Belk, 1988). The types of products we purchase are influenced by our personality and values (Donnelly, Iyer, & Howell, 2012; Matz, Gladstone, & Stillwell, 2016) and consumers often turn to durable goods like clothing and accessories to construct and convey an actual, nostalgic, or aspirational self to others (Chernev, Hamilton, & Gal, 2011; Goor, Ordabayeva, Keinan, & Crener, 2019). This research examines a different perspective of consumption experience and argues that products not only facilitate self-expression, but can also help consumers discover who they are. Specifically, we demonstrate that unfamiliar (vs. familiar) consumption experiences may increase the sense of self-discovery, and thus lead to greater engagement with the unfamiliar product.

Prior research demonstrates that consumers seek extraordinary experiences to signal status (Keinan & Kivetz, 2010) or to feel intensely alive (Arnould & Price, 1993). Furthermore, major life events, like starting a new job or starting a new relationship, can encourage consumers to question previous values and ideas and bring about new roles in life (Schouten, 1991). Conversely, repeated consumption can increase satiation and adaptation, and reduce consumer enjoyment and product evaluation (Bhattacharjee & Mogilner, 2014; Frederick & Loewenstein, 1999; Gershon & Smith, 2019). Contributing to this literature, we find that basic albeit unfamiliar consumption experiences, such as listening to an unfamiliar song, eating unfamiliar food, or using an unfamiliar product, provide consumers opportunities to discover more about themselves (as opposed to merely discovering more about an unfamiliar product), which in turn, increases engagement.

Three studies demonstrate our effect and suggest a zone of proximal discovery – moderate rather than extreme levels of unfamiliarity facilitate the process of self-discovery. Consistent with theories in developmental psychology (Vygotsky, 1978), which suggest that children have a successful and positive experience when learning skills that can be directly applied to previously developed knowledge, we demonstrate that some level of familiarity is needed to increase consumers' self-discovery and further interest in the product.

In **Study 1** (*N*=176, MTurk), participants described a recent purchase of a product that was unfamiliar to them (vs. a new product that replaced an existing one) and indicated the extent to which the product made them discover and learn about themselves using a 3-item index ("Using this product I discovered new parts within myself," "Purchasing this product felt like a discovery," "This product helped me to learn about myself"; α=.82). In both conditions, participants wrote about similar purchase categories (clothing, cleaning supplies, yard tools, and electronics). Importantly, as expected, unfamiliar products increased self-discovery ($M_{unfamiliar}$=4.23, SD=1.47) compared to new products (M_{new}=3.76, SD=1.61; $F(1,174)$=3.94, p=.049).

In **Study 2** (*N*=274), undergraduates were randomly assigned to drink a small sample of Watermelon (unfamiliar flavor) vs. Orange (familiar flavor) juice. A pre-test (*N*=100) confirmed that Watermelon is a less familiar juice flavor than orange (p<.001). After tasting the juice, participants indicated how interested and engaged they were by the juice using a 6-item scale (e.g., "I feel engaged in the experience of drinking," "I stopped several times to examine the juice and how it's served," "I'd be curious to try it again in the future"; α=.79). They also indicated how much they like the juice in general (one-item), and the extent to which drinking the juice made them discover and learn about themselves using a 6-item scale (e.g., the juice "elicited some self-reflection," "opened me to new experiences and a new aspect within me," "made me reevaluate my preferences," and "felt like a part of a journey of self-discovery"; α=.85). The results revealed that the unfamiliar juice increased interest and engagement ($M_{unfamiliar}$=3.62, SD=1.28) compared to the familiar flavor ($M_{familiar}$=3.05, SD=1.21; $F(1,272)$=14.70, p<.001) and this effect was mediated by feelings of self-discovery ($a \times b$=.3287, SE=.0953, 95% CI=[.1452,.5202]. Interestingly, the unfamiliar experience decreased liking ($M_{unfamiliar}$=3.75, SD=1.82) compared to the familiar juice ($M_{familiar}$=4.49, SD=1.59; $F(1,272)$=12.66, p<.001).

Study 3 tested an important boundary condition: the potential zone of proximal discovery. Participants (*N*=303, MTurk) ranked their familiarity with five music genres: country, rock, rap, jazz, and classical. They were then randomly assigned to one of three conditions: listening to a song from a familiar genre (ranked 1/5), slightly unfamiliar genre (ranked 3/5), or a very unfamiliar genre (ranked 5/5). After listening to a brief 60-second music clip, participants indicated the extent to which listening to the music helped them discover and learn about themselves using a 5-item scale (e.g., "felt like a part of a journey of self-discovery," "made me reevaluate my music preferences," and "advanced my self-knowledge"; α=.86). They also evaluated how much listening to the song helped them learn about music using 3-item scale (listening to that song "is like taking a music lesson," "made me feel like I know more about music," "made me realize that music has subtle nuances"; α=.87). The results indicated that the slightly unfamiliar genre increased feelings of self-discovery ($M_{3/5}$=3.13, SD=1.49) compared to the familiar genre ($M_{1/5}$=2.71, SD=1.34; p=.047). The effect of listening to a very unfamiliar genre was non-significant compared to the other conditions

($M_{5/5}$=2.93, SD=1.63, p's>.300). Importantly, the effect of genre familiarity on music-discovery was not significant across conditions (p's>.488).

Our work contributes to the literature on consumer psychology, suggesting that consumers might be more engaged using unfamiliar (vs. familiar) products in order to learn about themselves through interacting with the products. Preliminary results further suggest that older consumers are more susceptible to self-discovery using unfamiliar products. Our research has also important practical implications. Today, marketers often use big-data analyses to provide consumers recommendations that are based on product familiarity and similarity (Linden, Smith, & York, 2003), even though consumers regularly express preferences for a greater variety of products (Ratner and Kahn 2002; Simonson 1990) and unique experiences (Keinan & Kivetz, 2010). Our research demonstrates that marketers could increase engagement and interest in their products by giving consumers the opportunity to experience new products (e.g., new collections, samples, extensions) that encourage greater self-discovery.

REFERENCES

Arnould, E. J., and Price, L. L. (1993). River magic: Extraordinary experience and the extended service encounter. *Journal of Consumer Research, 20*(1), 24-45.

Aron, A., Melinat, E., Aron, E. N., Vallone, R. D., & Bator, R. J. (1997). The experimental generation of interpersonal closeness: A procedure and some preliminary findings. *Personality and Social Psychology Bulletin, 23*, 363-377.

Becker, G. S. (1993). Nobel lecture: The economic way of looking at behavior. *Journal of Political Economy, 101*, 385-409.

Belk, R. W. (1988). Possessions and the extended self. *Journal of Consumer Research, 15*(2), 139-168.

Bhattacharjee, A., and Mogilner, C. (2013). Happiness from ordinary and extraordinary experiences. *Journal of Consumer Research, 41*(1), 1-17.

Blunden H., Logg J. M., Brooks A. W., John L. K., Gino F. (2019). Seeker beware: the interpersonal costs of ignoring advice. *Organizational Behavior and Human Decision Processes.* 150, 83–100.

Bonaccio, S., & Dalal, R. S. (2006). Advice taking and advice giving in decision making: An integrative review of the literature. *Organizational Behavior and Human Decision Processes,* 101, 127–151.

Boothby, E. J., Cooney, G., Sandstrom, G. M., & Clark, M. S. (2018). The liking gap in conversations: Do people like us more than we think? *Psychological Science*, *29*, 1742-1756.

Camerer, C. (2003). *Behavioral game theory: Experiments in strategic interaction.* Princeton: Princeton University Press.

Chernev A., Hamilton R., and Gal D. (2011). Competing for consumer identity: Limits to self-expression and the perils of lifestyle branding. *Journal of Marketing*, 75 (3), 66-82.

Donnelly, G. E., Iyer, R., and Howell, R. T. (2012). The big five personality traits, material values, and financial well-being of self-described money managers. *Journal of Economic Psychology, 33*(6), 1129-1142.

Dunn, E. W., Aknin, L. B., & Norton, M. I. (2008). Spending money on others promotes happiness. *Science, 319,* 1687-1688.

Dunn, E. W., Biesanz, J. C., Human, L. J., & Finn, S. (2007). Misunderstanding the affective consequences of everyday social interactions: The hidden benefits of putting one's best face forward. *Journal of Personality and Social Psychology*, *92*, 990-1005.

Epley, N., & Schroeder, J. (2014). Mistakenly seeking solitude. *Journal of Experimental Psychology: General*, *143*, 1980-1999.

Feng, B., & MacGeorge, E. L. (2006). Predicting receptiveness to advice: Characteristics of the problem, the advice-giver, and the recipient. *Southern Journal of Communication*, 71(1), 67–85.

Frederick, S., and Loewenstein, G. (1999). Hedonic Adaptation in Well-being: Foundations of Hedonic Psychology, 302-329.

Gershon, R., and Smith, R. K. (2019). Twice-told tales: Self-repetition decreases observer assessments of performer authenticity. *Journal of Personality and Social Psychology.* Forthcoming.

Gilbert, D. T., & Wilson, T. D. (2007). Prospection: Experiencing the future. *Science*, *317*, 1351-1354.

Gino, F., & Moore, D. A. (2007). Effects of task difficulty on use of advice. *Journal of Behavioral Decision Making,* 20(1), 21–35.

Gino, F., & Schweitzer, M. (2008). Blinded by anger or feeling the love: How emotions influence advice taking. *Journal of Applied Psychology,* 93(5), 1165–1173.

Goldsmith, D. J., & Fitch, K. (1997). The normative context of advice as social support. *Human Communication Research*, 23, 454–476.

Goor, D., Ordabayeva, N., Keinan, A., and Crener, S. (2019). The impostor syndrome from luxury consumption. *Journal of Consumer Research*. Forthcoming.

Gray, K., Ward, A.F., & Norton, M.I. (2014). Paying it forward: Generalized reciprocity and the limits of generosity. *Journal of Experimental Psychology: General, 143, 247-254.*

Harvey, N., & Fischer, I. (1997). Taking advice: Accepting help, improving judgment, and sharing responsibility. *Organizational Behavior and Human Decision Processes*, 70, 117–133.

Hill, R. A., & Dunbar, R. I. M. (2003). Social network size in humans. *Human Nature*, *14*, 53-72.

Kahneman, D., & Deaton, A. (2010). High income improves evaluation of life but not emotional well-being. *Proceedings of the National Academy of Sciences, 107,* 16489-16493.

Keinan, A., and Kivetz, R. (2010). Productivity orientation and the consumption of collectable experiences. *Journal of Consumer Research, 37*(6), 935-950.

Kross, E., Verduyn, P., Demiralp, E., Park, J., Lee, D. S., Lin, N., ... & Ybarra, O. (2013). Facebook use predicts declines in subjective well-being in young adults. *PloS One*, *8*, e69841.

Kumar. A., & Epley, N. (2018). Undervaluing gratitude: Expressers misunderstand the consequences of showing appreciation. *Psychological Science, 29*, 1423-1435.

Linden, G., Smith, B., and York, J. (2003). Amazon. com recommendations: Item-to-item collaborative filtering. *IEEE Internet computing*, (1), 76-80.

Matz, S. C., Gladstone, J. J., and Stillwell, D. (2016). Money buys happiness when spending fitsour personality. *Psychological Science, 27*(5), 715-725.

O'Brien, E. (2019). Enjoy it again: Repeat experiences are less repetitive than people think. *Journal of Personality and Social Psychology*, *116*, 519-540.

Patt, A., Bowles, H. R., & Cash, D. (2006). Mechanisms for enhancing the credibility of an adviser: Prepayment and aligned incentives. *Journal of Behavioral Decision Making,* 19,347–359.

Phillips, J. M. (1999). Antecedents of leader utilization of staff input in decision- making teams. *Organizational Behavior and Human Decision Processes*, 77, 215–242.

Pronin, E. (2008). How we see ourselves and how we see others. *Science*, *320*, 1177-1180.

Quoidbach, J., Taquet, M., Desseilles, M., de Montjoye, Y-A., & Gross, J. (2019). Happiness and social behavior. *Psychological Science*, *30*, 1111-1122.

Ratner, R. K. and Kahn, B. E. (2002). The impact of private versus public consumption on variety-seeking behavior. *Journal of Consumer Research*, 29(2), 246-257.

Reis, H. T. (2012). Perceived partner responsiveness as an organizing theme for the study of relationships and well-being. In L. Campbell & T. J. Loving (Eds.), *Interdisciplinary research on close relationships: The case for integration* (pp. 27-52). Washington, DC: American Psychological Association.

Schouten, J. W. (1991). Personal rites of passage and the reconstruction of self. *ACR North American Advances*.

Simonson, I. (1990). The effect of purchase quantity and timing on variety-seeking behavior. *Journal of Marketing Research*, 27(2), 150-162.

Sniezek, J. A., & Buckley, T. (1995). Cueing and cognitive conflict in judge-advisor decision making. *Organizational Behavior and Human Decision Processes*, 62, 159–174.

Sniezek, J. A., Schrah, G. E., & Dalal, R. S. (2004). Improving judgment with prepaid expert advice. *Journal of Behavioral Decision Making*, 17, 173–190.

Sniezek, J. A., & Van Swol, L. M. (2001). Trust, confidence, and expertise in a judge- advisor system. *Organizational Behavior and Human Decision Processes*, 84, 288–307.

Soll, J. B., & Larrick, R. P. (2009). Strategies for revising judgment: How (and how well) people use others' opinions. *Journal of Experimental Psychology: Learning, Memory, and Cognition*, 35, 780–805.

Van Swol, L. M., & Sniezek, J. A. (2005). Factors affecting the acceptance of expert advice. *British Journal of Social Psychology,* 44, 443–461.

Vygotsky, L. (1978). Interaction between learning and development. *Readings on the Development of Children, 23*(3), 34-41.

Waytz, A., Schroeder, J., & Epley, N. (2014). The Lesser Minds Problem. In P. Bain, J. Vaes, & J. P. Leyens (Eds.), *Humanness and dehumanization* (pp. 4967). London, England: Psychology Press.

Wojciszke, B. (1994). Multiple meanings of behavior: Construing actions in terms of competence or morality. *Journal of Personality and Social Psychology, 67*, 222-232.

Yaniv, I. (2004). Receiving other people's advice: Influence and benefit. *Organizational Behavior and Human Decision Processes,* 93(1), 1–13.

Yaniv, I., & Milyavsky, M. (2007). Using advice from multiple sources to revise and improve judgment. *Organizational Behavior and Human Decision Processes*, 103, 104–120. Yaniv, I., & Foster, D. P. (1997). Precision and accuracy of judgmental estimation. *Journal of Behavioral Decision Making*, 10, 21–32.

Zelenski, J. M., Whelan, D. C., Nealis, L. J., Besner, C. M., Santoro, M. S., & Wynn, J. E. (2013). Personality and affective forecasting: Trait introverts underpredict the hedonic benefits of acting extraverted. *Journal of Personality and Social Psychology*, *104*, 1092-1108.

Brand Misbehavior: Integrating Multiple Perspectives

Chairs: Mansur Khamitov, Nanyang Technological University, Singapore
Andrea Giuffredi-Kähr, University of Zurich, Switzerland

Paper #1: Wilt Thou Forgive That Sin? – The Influence of Brand Heritage on Consumer Reactions to Brand Transgressions

Amogh Kumbargeri, Indian Institute of Management Ahmedabad, India

Sudipta Mandal, Indian Institute of Management Indore, India

Mansur Khamitov, Nanyang Technological University, Singapore

Paper #2: The Dirty Thirty of Brand Personality: Narcissistic, Machiavellian, and Psychopathic Brands

Lucia Malär, University of Bern, Switzerland

Mansur Khamitov, Nanyang Technological University, Singapore

Andrea Giuffredi-Kähr, University of Zurich, Switzerland

Paper #3: Does it Hurt or Protect? The Effect of Affective Commitment on Unethical Behavior toward Transgressing Brands

Nitika Garg, University of New South Wales, Australia

Rahul Govind, University of New South Wales, Australia

Jatinder J. Singh, EADA Business School Barcelona, Spain

Wayne D. Hoyer, University of Texas, Austin, USA

Paper #4: Consumers' Responses to Brand Transgressions: Role of Brand Type and Materialism

Sylvia S. Chang, University of Washington, USA

Shailendra Pratap Jain, University of Washington, USA

SESSION OVERVIEW

The instances when brands violate consumers' expectations and commit misbehavior attract ever-increasing attention and possess omnipresent damage potential which is amplified by social channels proliferation, consumer activism, and viral dissemination of content. This session centers around the following questions: 1) how do consumers react to misbehaving brands, 2) how do these reactions vary as a function of different factors related to the consumer, brand, and consumer-brand connection, and 3) what is the downstream impact of brand misbehavior on consumers' brand perceptions and brand-related behaviors? Collectively, the four papers shed light on consumers' differential responses to explicit or perceived brand transgressions in terms of their attitudes, forgiveness, purchase intentions, and behaviors toward those brands. The session contributes to the emerging literature on consumer reactions to brand misbehavior by highlighting novel multiplex research drawing on concepts and theories from interpersonal relationships psychology, construal level theory, the dark triad of personality, brand relationship, commitment, and materialism theories.

In the first paper, Kumbargeri et al. demonstrate the impact of brand heritage on consumer responses to brand transgressions. The authors find that consumers are more likely to forgive heritage (vs. non-heritage) brands and exhibit less negative attitudes, word-of-mouth and unethical punishment behaviors toward such brands, which is mediated by differentially induced construal level. In the second paper, Malär et al. find that misbehaving brands possess distinct negative brand personality traits. Transferring the dark triad of narcissism, machiavellianism, and psychopathy to the branding context, the paper measures dark brand personality with a novel thirty-item scale and assesses its downstream consequences on consumers attitudes and behavioral intentions. In the third paper, Garg

et al. reconcile prior literature on misbehaving brands by documenting that depending on the transgression agency responsible, type of transgression, brand remedial measures, and brand apology, affective commitment can predictably 'buffer' versus 'amplify' consumer backlash against the misbehaving brand. The effect is mediated by shame. In the final paper, Chang and Jain zoom in on self-brand connection to examine whether consumer materialism and brand type can mitigate the negative impact of brand transgressions. In particular, materialism influences the extent to which consumers forgive material versus experiential brands following quality-related brand transgressions.

This year's conference theme is "Rendez-Vous in the City of Light" with different approaches, paradigm perspectives, and multiple interests called to come together to focus on consumer research questions. This session embodies the spirit of integrating multiple perspectives on the topic of brand misbehavior. Specifically, the four papers elucidate how consumer responses to brand misbehavior are impacted by a series of consumer-related factors (materialism), brand-related factors (brand heritage, brand personality, brand type, brand transgression type and responsibility, brand remedial measures), and consumer-brand connection factors (affective commitment, self-brand connection). To this end, the proposed special session brings together researchers from nine universities in six countries across all stages of an academic researcher: doctoral student, assistant, associate, full, and chaired professor. We expect this session to appeal to a broad audience, including researchers interested in brand transgressions, product/service failures, consumer-brand relationships, loyalty, marketplace ethics and morality.

Wilt Thou Forgive That Sin? – The Influence of Brand Heritage on Consumer Reactions to Brand Transgressions

EXTENDED ABSTRACT

Introduction

On April 20, 2010, a methane gas release triggered an explosion on the British Petroleum (BP)-run Macondo Prospect site killing 11 workers and causing incalculable damage to surrounding wildlife. BP, a British company with an origin dating back to 1909, was found guilty of this environmental catastrophe. This incident constitutes an act of transgression, defined as any violation of rules guiding consumer-brand relationships (Aaker et al. 2004). In this research, we ask the question: When a brand commits a transgression, are consumers more willing to forgive heritage brands than non-heritage ones? Brand transgressions often induce negative reactions from consumers, which if not managed appropriately, can severely tarnish brand reputation putting the very existence of a brand at risk (Bechwati and Morrin 2003; Khamitov, Grégoire, and Suri 2020; Rotman, Khamitov, and Connors 2018).

Theoretical Framework

Urde, Greyser, and Balmer (2007, pp. 4-5) define brand heritage as "a dimension of a brand's identity found in its track record, longevity, core values, use of symbols and particularly in an organizational belief that its history is important." Brand heritage draws on consumer's distinct cognitive ability to think temporally in terms of a

brand's track record, longevity, and history as important components of its identity (Urde et al. 2007). Here, we advance this view by focusing on construal level associated with heritage brands.

Construal level theory suggests that temporal distance (vs. proximity) is linked to a more abstract (vs. concrete) representation of information (Kyung et al. 2010; Liberman et al. 2002; Trope and Liberman 2003, 2010). Applied to our context, heritage (vs. non-heritage) brands, owing to their emphasis on temporal distance, should, by extension, induce a psychologically distal (vs. proximal) perspective and, therefore, an abstract (vs. concrete) construal. We pose that this is likely to help them reduce negative outcomes resulting from brand transgressions. Some preliminary support for this proposition originates from McGraw and Warren (2010) and McGraw et al. (2012), who found that psychologically distant tragedies induce humor as they are perceived less threatening and benign violations. Furthermore, Gong and Medin (2012) demonstrated that abstract (vs. concrete) construal level leads to more positive judgments of moral transgressions. Taken together, we expect consumers to perceive the transgressions by heritage (vs. non-heritage) brands less negatively due to the abstract (vs. concrete) construal that such brands induce. Consequently, we expect consumers to be more forgiving of heritage (vs. non-heritage) brands and exhibit less negative attitudes, reduced negative word-of-mouth and unethical punishment behaviors towards heritage (vs. non-heritage) brands in the event of a transgression. And this effect of brand heritage should be mediated by the abstract construal induced by the heritage brand.

Methodology

Six experiments across five different product categories and real as well as hypothetical brands investigate the impact of brand heritage on consumer responses to brand transgressions. Experiment 1A was designed as a single factor (brand type: heritage vs. non-heritage) between-subjects study with post-transgression attitudes toward a transgressing university brand and negative word-of-mouth as the dependent variables. Experiment 1B sought to extend findings of Experiment 1A in a different setting (health drink) and with an additional dependent variable (consumer forgiveness) to establish the robustness of the hypothesized effects. Experiment 2 investigated the mechanism underlying the hypothesized effect by establishing construal level mediation. This study measured the construal level using the BIF scale (Vallacher and Wegner 1989) and included consumer forgiveness and post-transgression attitudes toward the brand as the dependent variables and brand heritage as the independent variable. Experiment 3 sought to further substantiate the mechanism by testing for moderation by construal level. If the focal effect is indeed mediated by construal level, then the effect should be manifest (attenuated) when the abstract (concrete) construal is independently manipulated. This study was conceived as a 2 (brand type: heritage vs. non-heritage) x 2 (construal: abstract vs. concrete) between-subjects design study. In Experiment 4, using the unethical punishment matrix task adapted from Mazar, Amir, and Ariely (2008), we aimed to provide behavioral evidence for our hypothesized effect in the context of two real brands – one heritage and the other non-heritage. Finally, experiment 5 tests the robustness of the hypothesized effect using a single brand positioned along the heritage vs. non-heritage lines. In this experiment, as an additional behavioral measure, respondents were asked to provide their email IDs if they wished to express their concern about the transgression.

Results

Experiments 1A and 1B demonstrated that consumers are more likely to forgive heritage (vs. non-heritage) brands and exhibit less

negative attitudes and negative word-of-mouth toward them in the event of a brand transgression, thus providing evidence in support of the core effects. Experiment 2 replicated the main effect and further demonstrated that the impact of brand heritage on consumer forgiveness and post-transgression attitudes is mediated by construal level (b = .134, SE = .079, 95% CI [.004, .319]). Experiment 3 provided additional evidence for the proposed mechanism by showing moderation by construal levels. Experiment 4 showed that consumers are less likely to unethically punish the transgressing heritage brand as compared to a non-heritage brand and additionally replicated the results of experiments 1A and 1B. Experiment 5 showed respondents are less likely to express concern in case of a transgression by a heritage brand as compared to a non-heritage brand along with replicating findings of the previous experiments.

Contributions and Implications

We contribute to the academic literature on the psychology of brand transgressions and brand heritage by highlighting brand heritage as one of the strategies to diminish the negative impact of brand transgressions on consumer responses (Khamitov et al. 2020). We also contribute back to construal level theory (Trope and Liberman 2010) by showing that the influence of construal level extends to the evaluation of brands in the wake of a brand transgression. The current set of studies has substantial managerial implications as it sheds light on brand heritage as an effective strategy to buffer the negative consumer attitudinal and behavioral reactions in the increasingly prevalent event of a brand transgression.

The Dirty Thirty of Brand Personality: Narcissistic, Machiavellian, and Psychopathic Brands

EXTENDED ABSTRACT

"Boeing is a silver-haired, middle aged white man in a $3000 suit. He is well-connected and respected in important social and political circles that help him grow his business. Due to his obsession with quarterly profits, he fails to spend time with his own family. His wife is unsatisfied and takes opiods to cope with her lost sense of self, his teenage daughter hates him, and his son is spiraling out of control via drug abuse."

This description of the Boeing brand from a consumer interview provides preliminary evidence that certain brands are not associated with positive personality attributes (e.g., "exciting", "down-to-earth", "cool"; Aaker 1997), but rather with a dark personality in a similar way that humans have dark personalities.

In our hyperconnected world, firms disseminate branded information increasingly quickly and broadly (Swaminathan et al. 2020). This has led to more transparency where bombarded and frustrated consumers increasingly use their power to attack brands (e.g., consumer brand sabotage; Kähr et al. 2016). These developments have elevated the likelihood that consumers witness brands' undesirable behaviors (e.g., manipulation of consumers, exploitation of employees, pushy or arrogant messages) and, consequently, attribute negative personality characteristics to such brands.

Despite the sheer prevalence of dark brand personalities in the marketplace, prior research has primarily focused on positive and favorable brand personalities (e.g., Aaker 1997; Warren and Campbell 2014). Nevertheless, there are some initial studies that hint at existence and magnitude of negative brand personality dimensions. For example, Geuens, Weijters and De Wulf (2009) include aggressiveness, Grohmann (2009) examines some negatively-valenced traits pertaining to gender dimensions of brand personality (e.g., aggres-

sive and dominant), and Rojas-Méndez and Papadopoulos (2012) add brand neuroticism to their brand personality measure. Relatedly, Awad and Youn (2018) show that narcissistic consumers love narcissistic, anthropomorphized brands. However, to date, a systematic understanding of the dark traits of brand personality is missing as virtually all prior studies have only peripherally focused on the dark side of brand personality and/or treated those as rather an afterthought.

Against this backdrop, the current research conducted six studies to systematically examine the dark side of brand personality primarily drawing on the important concept of dark triad from personality psychology that consists of narcissism (i.e., admiration seeking, feelings of superiority; Morf and Rhodewalt 2001), machiavellianism (i.e., immoral beliefs, pursuit of self-beneficial goals and manipulation tactics; Rauthmann and Will 2011), and psychopathy (i.e., cold affect and antisocial behaviors; Neumann, Hare, and Newman 2007).

As a first step in the dark triad (DT) of brand personality item generation (Study 1a), we developed an extensive battery of 567 items primarily based on limited negative brand personality items in the literature, personality psychology scales, and a series of qualitative consumer interviews. We eliminated items that were overlapping or not applicable to brands. In the second stage (Study 1b), we had six branding and personality psychology experts rate the items in terms of their conceptual map on their respective trait and applicability to the branding context.

Next, we initially administered and validated our remaining set of items. In Study 2a, 900 MTurk US participants were randomly assigned to one brand from a sample of 13 pretested brands and indicated their level of agreement with the initial DT items (1 strongly disagree-7 strongly agree). In an exploratory factor analysis, a three-factor solution emerged. We tested the three-dimensional structure in a confirmatory factor analysis using AMOS. Items were removed one at a time based on modification indices and squared multiple correlations (below .6). These processes resulted in a final set of 30 items. Examination of different alternative measurement models (e.g., two factors) indicated that the three-factor correlated model fits the data best ($\chi2(402)=1460$, $\chi2/df=3.63$, NNFI=.96, CFI=.96, GFI=.88, SRMR=.03, RMSEA=.06, SRMR=.03). Study 2b validated our shortlisted set of items with a new sample and a self-selected brand approach. The final items reflect three dark-sided brand personality dimensions: narcissism (e.g., BRAND pretends to be more important than it actually is; demonstrates arrogant behavior), machiavellianism (e.g., BRAND does not care about others unless it benefits its bottom line; manipulates others to get ahead), and psychopathy (e.g., BRAND tends to be unconcerned with the morality of its actions; appears not to care about the well-being of others).

To establish discriminant validity, Study 3 tested brand attitudes, Aaker's five brand personality dimensions, and brand reputation against a second-order factor model of DT. Discriminant validity was supported according to the Fornell-Larcker criterion for all comparisons.

Study 4 provides a preliminarily investigation of the DT dimensions' impact on downstream brand attitudes and behavioral intentions. More specifically, we posit that a highly dark brand personality has leads to a) greater hostile and unethical intentions as well as dishonesty towards the brand and b) decreased brand attitudes and purchase intentions. We manipulated DT using fictitious brand descriptions with two conditions: a brand high vs. low on dark traits. Our 30 items served as a manipulation check.

Results confirm the expected effects: a) the higher the DT, the greater consumers' hostile intentions towards this brand are ($M_{high}=2.5$, SD=1.30; $M_{low}=1.22$, SD=.51; t(282)=-10.92, *p*=.001)

as are unethical punishment intentions ($M_{high}=1.52$, SD=1.00; $M_{low}=1.11$, SD=.41; t(282)=-4.52, *p*=.001). Also, the higher the DT, the more likely a consumer behaves dishonestly ($M_{high}=1.32$, SD=.47; $M_{low}=1.19$, SD=.39; t(282)=-2.47, *p*=.001). Lastly, the brand was evaluated less favorably in the high DT condition than in the low DT condition: brand attitudes ($M_{high}=1.60$, SD=.90; $M_{low}=5.35$, SD=1.26; t(282)= 28.82, p=.001) and purchase intentions ($M_{high}=1.70$, SD=.93; $M_{low}=5.27$ SD=1.33; t(282)=26.26, p=.001).

In sum, this research contributes to the brand personality literature (Aaker 1997; Geuens et al. 2009) by providing a first systematic empirical examination of the dark traits of brand personality along with an effective, reliable measure to capture dark brand personality. Specifically, we draw on the important concept of the dark triad from personality psychology (i.e., narcissism, machiavellianism, and psychopathy) and bring it to the context of brands, showing that DT impacts a series of downstream consequences. So doing, we also contribute back to the dark triad literature in personality psychology (Morf and Rhodewalt 2001; Neumann et al. 2007; Rauthmann and Will 2011) by demonstrating that the influence of dark triad dimensions meaningfully extend to the branding context. These contributions are managerially relevant: a more detailed understanding and effective measurement of the dark side of a brand's personality may support managers in assessing whether their brand suffers from such a personality and provide an opportunity to intervene and counteract.

Does it Hurt or Protect? The Effect of Affective Commitment on Unethical Behavior toward Transgressing Brands

EXTENDED ABSTRACT

Brand transgressions seem to have become more prevalent and receive greater media coverage, in recent times (Dick 2019). When brands transgress, consumers can become punitive by engaging in negative behaviors including spreading negative word-of-mouth (Grégoire and Fisher 2008; Wangenheim 2005), withdrawing from interactions with the brand (Grégoire and Fisher 2008; Huber et al. 2010), brand boycotting (Klein, Smith, and John 2004), switching to rival brands (Bechwati and Morrin 2003), and even engaging in brand sabotage (Kähr et al. 2016; Nyffenegger et al. 2018).

One potential protective mechanism against the possible negative responses in the face of such incidents might be *affective commitment* towards the brand. Affective commitment is defined as the customer's emotional attachment to a particular brand based on consumers' identification with that brand (Allen and Meyer 1990) and reflects their desire to maintain an on-going relationship with the brand (Jones et al. 2010). Recent research has suggested that one of the key antecedents of affective commitment is self-brand connection (Turri et al. 2013) while as a consequence, it is a strong driver of re-purchase intentions toward the preferred brand (Fullerton, 2005; Jones et al. 2010) and brand loyalty (Evanschitzky et al. 2006; Kim et al. 2008).

While prior literature has extensively documented the positive outcomes of affective commitment, it is less definitive on how it might impact consumer response when a brand transgresses. Research suggests that affective commitment could grant the transgressing brand a certain level of immunity or 'buffering' as strong brand relationship supports the brand during a service failure (De-Witt and Brady 2003; Hess, Ganesan, and Klein 2003). In contrast, literature also presents evidence of an 'amplifying' effect where high commitment leads to significantly lower brand evaluations after a service failure (Gregoire et al. 2009) because committed consumers consider brand transgression as a normative violation, leading to

an increased desire for retaliation (Grégoire and Fisher 2006, 2008; Grégoire et al. 2009). In a series of four studies, the current research seeks to address this paradox in the novel context of unethical consumer behavior toward the transgressing brand and importantly, establishes ecologically valid moderators such as transgression agency, transgression type, and brand responses, of this effect along with the mediating role of shame which arises due to high affective commitment toward the transgressing brand. The studies use real brands (Coca-Cola/ Nike), their transgressions, and measure 'actual cheating behavior' (Winterich, Mittal, and Morales 2014) (except Study 2).

Studies 1 and 2 test the moderating effect of transgression-related factors; agency responsible for the transgression (direct – brand vs. indirect – franchisee) and the type of transgression (performance-based (PBT) vs. value-based (VBT)), respectively. **Study 1** employed a continuous (affective commitment) x 2 (transgression agency: direct, indirect) between-subjects design (n=158). Analysis reveals a significant interactive effect on the amount of cheating () such that the amount of cheating varies across affective commitment but only in the direct transgression condition ($M_{high\text{-}direct}$ = 5.94 vs. $M_{low\text{-}direct}$ = .66, $p < .001$) and not in the indirect condition ($M_{low\text{-}indirect}$ = 3.38 vs. $M_{high\text{-}indirect}$ = 2.33, ns). **Study 2** (n=147) uses purchase intentions as the dependent variable and finds a significant interaction between transgression type (VBT vs. PBT) and affective commitment . Importantly, it shows that affective commitment *amplifies* punitive action for VBT (lowered purchase intentions)[1]), but has a *buffering* effect for PBT). Further, higher levels of shame emerge for high (vs. low) affective commitment), and for VBT (vs. PBT)). As predicted, there is no evidence of mediation through shame for PBT (but it is significant for VBT (.

Studies 3 and 4 examine the role of brand response as moderators of the impact of affective commitment on unethical behavior; brand remedial measures (vague vs. specific (concrete)) in Study 3 (n=230) and brand apology (present vs. absent) in Study 4 (n=233). In **Study 3**, the interaction between remedial measures and affective commitment is significant. Specifically, we find that high affective commitment leads to *more unethical* behavior when the remedial measures were vague (vs. specific) () Contrary to the conventional wisdom, even with specific remedial measures, high (vs. low) affective commitment leads to more punitive behavior (). Thus, while specific response is more effective, the backlash effect of high affective commitment is robust and persists. Finally, **Study 4** finds that there is a significant interaction between brand apology and affective commitment While high affective commitment is associated with more unethical behavior in the no-apology condition), this effect is non-significant in the apology condition). As predicted, there is evidence of mediation through shame in the no-apology condition (but not in the apology condition (.

Overall, our findings make four important contributions. First, we extend our understanding about the effect of brand transgressions in the context of unethical consumer behavior. Unethical consumer behavior has significant short- and long-term costs for firms and thus, this is an important question. Further, existing research has focused on performance-based (vs. value-based) transgressions. We contribute by examining VBT but additionally, contrast its effects with those of PBT. Second, we resolve the affective commitment paradox in the literature for transgressing brands by identifying some of the key moderating factors which might explain when commitment might have a buffering versus an amplifying effect. Third, we examine sev-

eral theoretically and managerially relevant moderators; both transgression- and brand-related factors. This is an important contribution because not only do these provide a more nuanced understanding of affective commitment's effect but also suggest actionable response strategies to a brand. Finally, we establish a unique mediator of the relationship between affective commitment and unethical behavior toward the transgressing brand – shame, while ruling out alternative explanations such as anger and betrayal for consumer retaliation.

Consumers' Responses to Brand Transgressions: Role of Brand Type and Materialism

EXTENDED ABSTRACT

Marketing literature on consumer-brand relationships has found that a strong brand relationship is beneficial for the brand, such that consumers strongly connected to a brand are less likely to lower their judgments of the brand when faced with negative brand information (Ahluwalia et al. 2000; Swaminathan, Page, and Gürhan-Canli 2007). Research has found that when a brand negatively violates consumers' expectations, consumers process and respond to such transgressions differently, depending on the extent to which the brand is tied to their identity. In particular, the degree to which consumers view the brand as part of themselves (i.e., self-brand connection) mitigate the impact of negative brand information (Cheng, White, and Chaplin 2012). When consumers view a brand as part of who they are, they construe negative information about the brand as a self-threat, which in turn elicits efforts to defend their self-views, including minimizing the brand transgression event.

Building on these findings, the current research examines situations when the buffering effect of self-brand connection is likely to occur. We identify two variables that help address this research question, one relating to the transgressing brand and one relating to the consumer. Specific to the brand-related variable, research has shown different implications such as consumer happiness and satisfaction (Gilovich, Kumar, and Jampol 2015), depending on the type of purchase—whether it is material or experiential. Applying this distinction to brands, we posit that brands can be perceived as more experiential or material as well, depending on which aspect of the brand is salient. The consumer-related variable we include in our framework is materialism, or the level of importance a person places on their possessions (Richins and Dawson 1992; Richins, Mick, and Monroe 2004). We propose that materialism influences the extent of consumer forgiveness of different type of brands (material vs. experiential) subsequent to a transgression. Consistent with prior work, we propose that the underlying mechanism for such effects is the difference in self-brand connection consumers form with material and experiential brands.

We tested our hypotheses across six studies using different brands and varying product categories. In study 1, we examined our proposed interaction effect of brand type and materialism on brand evaluations by manipulating materialism and asking participants to recall a past brand transgression episode of a material versus experiential brand. We find that there was a significant interaction effect of brand type and materialism on brand evaluation, $F(1, 182) = 4.64$, $p = .03$. Specifically, within the high materialism condition, material brands ($M_{material} = 6.01$, SD = .83) were evaluated higher than experiential brands ($M_{experiential} = 5.30$, SD = 1.51). Within the low materialism condition, there was no difference in brand evaluations between material brands ($M_{material} = 5.67$, SD = .91) and experiential brands ($M_{experiential} = 5.66$, SD = 1.11). In study 2, we replicate study 1 findings by employing a different brand type manipulation; we present a single brand and frame

---

1   Note: All t-tests are conducted on groups with ±1sd of affective commitment means.

the brand to be more material or experiential by highlighting different aspects of the brand.

In studies 3 and 4, we demonstrated that the interaction effect of brand type and materialism replicates with our proposed mediator of self-brand connection, the extent to which consumers incorporate brands into their self-concept. Study 3 manipulated participants' materialistic mindset and then presented a single brand Nike to be seen as experiential or material. Results revealed a significant interaction between the two factors, $F(1, 173) = 3.87$, $p = .051$. When Nike was viewed as a material brand, participants in the high materialism condition indicated higher self-brand connection with Nike ($M = 47.00$, $SD = 23.83$) versus those in the low materialism condition ($M = 35.99$, $SD = 23.44$; $F(1, 175) = 4.46$, $p = .036$). On the other hand, there was no difference between high and low materialism conditions when Nike was viewed as an experiential brand ($F(1, 175) = 1.94$, $p = .165$. Study 4 conceptually replicates study 3 findings but using a different brand.

Study 5 and 6 tested our full theoretical model by investigating whether the interaction effect of brand type and materialism on brand evaluation is mediated by self-brand connection. Specifically, study 6 replicated study 5 by using a fictitious brand to control for any prior beliefs about and attitudes toward the featured brand. Results revealed a significant moderated mediation (index = 26.65, SE = 19.23, 95% CI [.13, 76.78] such that the indirect effect of self-brand connection was significant at one SD above the mean level of materialism (a x b = 21.43, 95% CI [1.09, 54.81]) but not one SD below the mean (a x b = -8.22, 95% CI [-37.01, 14.42]). That is, self-brand connection was a significant mediator only among high (and not low) materialistic individuals.

Overall, our findings make several theoretical contributions. We extend the brand transgression literature in showing that subsequent to a brand committing a violation, consumer materialism influences evaluations of material versus experiential brands by increasing the self-brand connection consumers form with brands. In doing so, we add to the body of work that studies how consumer identity influences judgments after a transgression by identifying two novel antecedents of material/experiential brands and materialism. Moreover, we contribute to the purchase type literature in demonstrating that the material versus experiential dichotomy can be applied to perception of brands. This enables us to bring together the purchase type and the brand transgression literatures and proposes a novel dimension that brands that can be differentiated on, which is important in understanding how consumers respond to negative brand information. Finally, we contribute to the materialism literature by identifying a novel consequence of materialistic mindset. While past work suggests that a materialistic mindset generally has negative consequences (Bauer et al. 2012; Dittmar et al. 2014), our work demonstrates that high materialism buffers against negative information for material (vs. experiential) brand. This finding suggests that materialism does not always result in negative outcomes, particularly in the context of brand transgressions.

REFERENCES

Aaker, David A. (2004), "Leveraging the Corporate Brand," *California Management Review*, 46 (3), 6–18.

Aaker, Jennifer L. (1997), "Dimensions of Brand Personality," *Journal of Marketing Research*, 34 (3), 347–356.

Aaker, Jennifer L., Susan Fournier, and S. Adam Brasel (2004), "When Good Brands Do Bad," *Journal of Consumer Research*, 31 (1), 1–16

Ahluwalia, Rohini, Robert E. Burnkrant, and H. Rao Unnava (2000), "Consumer Response to Negative Publicity: The Moderating Role of Commitment," *Journal of Marketing Research*, 37 (2), 203–214.

Allen, Natalie J. and John P. Meyer (1990), "The Measurement and Antecedents of Affective, Continuance and Normative Commitment to Organization," *Journal of Occupational Psychology*, 63 (1), 1–18.

Awad, Norah and Nara Youn (2018), "You Reflect Me: Narcissistic Consumers Prefer Anthropomorphized Arrogant Brands," *Journal of the Association for Consumer Research*, 3 (4), 540–554.

Bauer, Monika A., James E. B. Wilkie, Jung K. Kim, and Galen V. Bodenhausen (2012), "Cuing Consumerism: Situational Materialism Undermines Personal and Social Well-Being," *Psychological Science*, 23 (5), 517–523.

Bechwati, Nada N. and Maureen Morrin (2003), "Outraged Consumers: Getting Even at the Expense of Getting a Good Deal," *Journal of Consumer Psychology*, 13 (4), 440–453.

Cheng, Shirley Y.Y., Tiffany B. White, and Lan N. Chaplin (2012). "The Effects of Self-Brand Connections on Responses to Brand Failure: A New Look At the Consumer–BrandRelationship," *Journal of Consumer Psychology,* 22 (2), 280–288.

DeWitt, Tom and Michael K. Brady (2003), "Rethinking Service Recovery Strategies: The Effect of Rapport on Consumer Responses to Service Failure", *Journal of Service Research*, 6 (2), 193–207.

Dick, Samantha (2019), "Most Unethical Fashion Brands Exposed," Retrieved on August 15, 2019 from https://thenewdaily.com.au/news/national/2019/04/10/ethical-fashion-brands/.

Dittmar, Helga, Rod Bond, Megan Hurst, and Tim Kasser (2014), "The Relationship between Materialism and Personal Well-Being: A Meta-Analysis," *Journal of Personality and Social Psychology*, 107 (5), 879–924.

Evanschitzky, Heiner, Gopalkrishnan R. Iyer, Hilke Plassmann, Joerg Niessing, and Heribert Meffert (2006), "The Relative Strength of Affective Commitment in Securing Loyalty in Service Relationships," *Journal of Business Research,* 59 (12), 1207–1213.

Fullerton, Gordon (2005), "How Commitment Both Enables and Undermines Marketing Relationships," *European Journal of Marketing*, 39 (11/12), 1372–1388.

George, Martin (2004), "Heritage Branding Helps in Global Markets," *Marketing News*, 4 (13), 1.

Geuens, Maggie, Bert Weijters, and Kristof De Wulf (2009), "A New Measure of Brand Personality," *International Journal of Research in Marketing*, 26 (2), 97–107.

Gilovich, Thomas, Amit Kumar, and Lily Jampol (2015), "A Wonderful Life: Experiential Consumption and the Pursuit of Happiness," *Journal of Consumer Psychology*, 25 (1), 152–165.

Grégoire, Yany and Robert J. Fisher (2006), "The Effects of Relationship Quality on Customer Retaliation," *Marketing Lett*ers, 17 (1), 31–46.

Grégoire, Yany and Robert J. Fisher (2008), "Customer Betrayal and Retaliation: When Your Best Customers Become Your Worst Enemies," *Journal of the Academy of Marketing Science*, 36 (2), 247–261.

Grégoire, Yany, Thomas M. Tripp, and Renaud Legoux (2009), "When Customer Love Turns into Lasting Hate: The Effects of Relationship Strength and Time on Customer Revenge and Avoidance," *Journal of Marketing*, 73 (6), 18–32.

Gong, Han, and Douglas L. Medin (2012), "Construal Levels and Moral Judgment: Some Complications," *Judgment and Decision Making*, 7 (5), 628–638.

Grohmann, Bianca (2009), "Gender Dimensions of Brand Personality," *Journal of Marketing Research*, 46 (1), 105–119.

Hess Jr., Ronald L., Shankar Ganesan, and Noreen M. Klein (2003), "Service Failure and Recovery: The Impact of Relationship Factors on Customer Satisfaction," *Journal of the Academy of Marketing Science*, 31 (2), 127–145.

Huber Frank, Kai Vollhardt, Isabel Matthes, and Johannes Vogel (2010), "Brand Misconduct: Consequences on Consumer–Brand Relationships," *Journal of Business Research*, 63 (11), 1113–1120.

Jones, Tim, Gavin L. Fox, Shirley F. Taylor, and Leandre R. Fabrigar (2010), "Service Customer Commitment and Response," *Journal of Services Marketing*, 24 (1), 16–28.

Kähr, Andrea, Bettina Nyffenegger, Harley Krohmer, and Wayne D. Hoyer (2016), "When Hostile Consumers Wreak Havoc on Your Brand: The Phenomenon of Consumer Brand Sabotage," *Journal of Marketing*, 80 (3), 25–41.

Khamitov, Mansur, Yany Grégoire, and Anshu Suri (2020), "A Systematic Review of Brand Transgression, Service Failure Recovery and Product-Harm Crisis: Integration and Guiding Insights," *Journal of the Academy of Marketing Science*, 48 (3), 519–542.

Kim, Jae Wook, Jiho Choi, William Qualls, and Kyesook Han (2008), "It Takes a Marketplace Community to Raise Brand Commitment: The Role of Online Communities," *Journal of Marketing Management*, 24 (3-4), 409–431.

Klein, Jill Gabrielle, N. Craig Smith, and Andrew John (2004), "Why We Boycott: Consumer Motivations for Boycott Participation," *Journal of Marketing*, 68 (3), 92–109.

Kyung, Ellie J., Geeta Menon, and Yaacov Trope (2010), "Reconstruction of Things Past: Why Do Some Memories Feel so Close and Others So Far Away?" *Journal of Experimental Social Psychology*, 46 (1), 217–220.

Liberman, Nira, Michael D. Sagristano, and Yaacov Trope (2002), "The Effect of Temporal Distance on Level of Mental Construal," *Journal of Experimental Social Psychology*, 38 (6), 523–534.

MacInnis, Deborah J. and Valerie S. Folkes (2017), "Humanizing Brands: When Brands Seem to Be Like Me, Part of Me, and in a Relationship with Me," *Journal of Consumer Psychology*, 27 (3), 355–374.

Mazar, Nina, On Amir, and Dan Ariely (2008), "The Dishonesty of Honest People: A Theory of Self-Concept Maintenance," *Journal of Marketing Research*, 45 (6), 633–644.

McGraw, A. Peter and Caleb Warren (2010), "Benign Violations: Making Immoral Behavior Funny," *Psychological Science*, 21 (8), 1141–1149.

McGraw, A. Peter, Caleb Warren, Lawrence E. Williams, and Bridget Leonard (2012), "Too Close for Comfort, or Too Far to Care? Finding Humor in Distant Tragedies and Close Mishaps," *Psychological Science*, 23 (10), 1215–1223.

Morf, Carolyn C. and Frederick Rhodewalt (2001), "Unraveling the Paradoxes of Narcissism: A Dynamic Self-Regulatory Processing Model," *Psychological Inquiry*, 12 (4), 177–196.

Neumann, Craig S., Robert D. Hare, and Joseph P. Newman (2007), "The Super-Ordinate Nature of the Psychopathy Checklist-Revised," *Journal of Personality Disorders*, 21 (2), 102–117.

Nyffenegger, Bettina, Andrea Kähr, Harley Krohmer, and Wayne D. Hoyer (2018), "How Should Retailers Deal with Consumer Sabotage of a Manufacturer Brand?" *Journal of Association of Consumer Research*, 3 (3), 379–395.

Paulhus, Delroy L. and Kevin M. Williams (2002), "The Dark Triad of Personality: Narcissism, Machiavellianism, and Psychopathy," *Journal of Research in Personality*, 36 (6), 556–563.

Rauthmann, John F. and Theresa Will (2011), "Proposing a Multidimensional Machiavellianism Conceptualization," *Social Behavior and Personality: An International Journal*, 39 (3), 391–403.

Richins, Marsha L. and Scott Dawson (1992), "A Consumer Values Orientation for Materialism and Its Measurement: Scale Development and Validation," *Journal of Consumer Research*, 19 (3), 303–316.

Richins, Marsha L., David G. Mick, and Kent B. Monroe (2004), "The Material Values Scale: Measurement Properties and Development of a Short Form," *Journal of Consumer Research*, 31 (1), 209–219.

Rojas-Méndez, Jose I. and Nicolas Papadopoulos (2012), "Argentine Consumers' Perceptions of the US Brand Personality," *Latin American Business Review*, 13 (4), 329–345.

Rotman, Jeff D., Mansur Khamitov, and Scott Connors (2018), "Lie, Cheat, and Steal: How Harmful Brands Motivate Consumers to Act Unethically," *Journal of Consumer Psychology*, 28 (2), 353–361.

Swaminathan, Vanitha, Karen L. Page, and Zeynep Gürhan-Canli (2007), "'My' Brand or 'Our' Brand: The Effects of Brand Relationship Dimensions and Self-Construal on Brand Evaluations," *Journal of Consumer Research*, 34 (2), 248–259.

Swaminathan, Vanitha, Alina Sorescu, Jan-Benedict Steenkamp, Thomas Clayton Gibson O'Guinn, and Bernd Schmitt (2020), "Branding in a Hyperconnected World: Refocusing Theories and Rethinking Boundaries," *Journal of Marketing*, 84 (2) 24–46.

Trope, Yaacov and Nira Liberman (2003), "Temporal Construal," *Psychological Review*, 110 (3), 403–421.

Trope, Yaacov and Nira Liberman (2010), "Construal-Level Theory of Psychological Distance," *Psychological Review*, 117 (2), 440–463.

Turri, Anna M., Karen H. Smith, and Elyria Kemp (2013), "Developing Affective Brand Commitment through Social Media," *Journal of Electronic Commerce Research*, 14 (3), 201–214.

Urde, Mats, Stephen A. Greyser, and John M. T. Balmer (2007), "Corporate Brands with a Heritage," *Journal of Brand Management*, 15 (1), 4–19.

Vallacher, Robin R. and Daniel M. Wegner (1989), "Levels of Personal Agency: Individual Variation in Action Identification," *Journal of Personality and Social Psychology*, 57 (4), 660–671.

Van Boven, Leaf and Thomas Gilovich (2003), "To Do or to Have? That is the Question," *Journal of Personality and Social Psychology*, 85 (6), 1193–1202.

Wangenheim, Florian V. (2005), "Postswitching Negative Word of Mouth," *Journal of Service Research*, 8 (1), 67–78.

Warren, Caleb and Margaret C. Campbell (2014), "What Makes Things Cool? How Autonomy Influences Perceived Coolness," *Journal of Consumer Research*, 41 (2), 543–563.

Winterich, Karen P., Vikas Mittal, and Andrea C. Morales (2014), "Protect Thyself: How Affective Self-Protection Increases Self-Interested, Unethical Behavior," *Organizational Behavior and Human Decision Processes*, 125 (2), 151–161.

New Approaches in Text Analytics

Chairs: Matthew D. Rocklage, College of Management, University of Massachusetts, USA
Jonah Berger, The Wharton School, University of Pennsylvania, USA

Paper #1: Dynamically Solving the Self-Presenter's Paradox: *When* Customer Care Should be Warm vs. Competent

Yang Li, Cheung Kong Graduate School of Business, China
Grant Packard, Schulich School of Business, York University, Canada
Jonah Berger, The Wharton School, University of Pennsylvania, USA

Paper #2: The Numbness of Expertise: Emotional Trajectories in the Development of Expertise

Matthew D. Rocklage, College of Management, University of Massachusetts, USA
Derek D. Rucker, Kellogg School of Management, Northwestern University, USA
Loran F. Nordgren, Kellogg School of Management, Northwestern University, USA

Paper #3: *Wordify:* A Tool for Discovering Consumer Vocabularies

Dirk Hovy, Bocconi University, Italy
Shiri Melumad, The Wharton School, University of Pennsylvania, USA
J. Jeffrey Inman, University of Pittsburgh, USA

Paper #4: Influencer-Generated Reference Groups

Enric Junqué de Fortuny, NYU Shanghai, China
Jeffrey Lee, Kogod School of Business, American University, USA

SESSION OVERVIEW

Text analytics is becoming increasingly popular. From consumer reviews to social media posts, marketers are realizing the value of language and beginning to collect and analyze massive amounts of text.

Despite this, many researchers use only the most basic approaches, pairing simple word counts with t-tests or regression. What unique approaches are researchers developing? And how might we combine existing text analytics with novel methods to cultivate fresh insights?

This session draws on researchers from marketing to computer science to answer important questions using new approaches. How do we model the flow of conversation and its consequences? How might we trace consumer trajectories over time as they gain expertise? What words best reveal distinct groups of consumers and their vocabularies? Can we use text analytics to capture networks of online influencers and competing brands?

Li, Packard, and Berger show the power of functional data analysis and machine learning for parsing and understanding conversational dynamics. Across 200 real-world customer service calls, they find there are pivotal moments within a conversation where employees must emphasize warmth or competence. Increasing emotion at both the beginning and ending of a conversation predicts positive customer perceptions, whereas cognitive language should be emphasized in the middle.

Rocklage, Rucker, and Nordgren demonstrate how growth curve modeling can be used to trace emotional trajectories as consumers gain expertise. Across 70,000 individuals, for each additional wine or beer they taste, consumers' language becomes more emotionally numb. These results replicate comparing professional movie critics and lay consumers across 3 million Rotten Tomatoes reviews. Experiments show this numbness can be explained by cognitive frameworks experts develop and then apply to the domain.

Hovy, Melumad, and Inman introduce a text analytics tool called *Wordify*, which uses machine learning to identify words that best discriminate between groups of interest. As one way of demonstrating its unique value, the authors analyze 60,000 TripAdvisor reviews that were written either on a PC or smartphone. Using their bottom-up approach, they find that reviewers on smartphones not only use more emotional language than those using PCs, but emotional language that is also more intense.

Junqué de Fortuny and Lee use a combination of machine learning, network analysis, and text analytics to identify and track networks of influencers. Their bottom-up approach allows them to understand how brand reference groups are dynamically created and how the new age of online celebrities imbue brands with cultural meaning. For example, they identify a "moms" social influencer network that appears to be driven primarily by brand sponsorship, thereby highlighting firms' ability to successfully influence brand meanings and reference groups.

With a special focus on text analytics, these papers answer the call to introduce novel methodologies and perspectives. This session should have wide appeal to researchers interested in text analysis, language, and real-world big data as well as those studying emotion, brands, word-of-mouth, and consumer networks. We invite others to join us in peering beneath the calm surface of text analytics in order to spark ideas for collaboration and gain unique consumer insights.

Dynamically Solving the Self-Presenter's Paradox: *When* Customer Care Should be Warm vs. Competent

EXTENDED ABSTRACT

Consumer conversations are dynamic. People chat with each other online (discussion boards, texting, social media) and debate word of mouth opinions in the "real world." Salespeople try to persuade potential buyers who sometimes push back, while call centre workers talk with customers to help resolve their issues. These important consumer interactions are not monologues, but dynamic dialogues between people.

While conversations are a central feature of consumer life, they can be remarkably difficult to analyze. They entail a messy series of conversational turns with dramatic variation in content and importance. These challenges may be why most prior language research examines texts or speech acts as singular, static events (e.g., Kronrod et al. 2011; Packard, Moore, and McFerran 2018).

But a more granular view may be important. Clearly some parts of conversations may matter more than others, but which parts might those be, and how can researchers identify them? We introduce a novel method allowing researchers to not only examine whether language matters, but *when* it matters. Specifically, when different linguistics features in different parts of conversations play a larger role.

To demonstrate this approach, we explore a test case around what are said to be the two most important dimensions of person perception—warmth and competence (Abele and Wojciszke 2007; Fiske, Cuddy and Glick 2007). It's difficult to seem both warm and competent. Trying to be more emotionally-concerned impedes perceptions of competence, while acting in a more rational, cognitively-

oriented manner makes people seem less warm (the warmth / competence trade off or "self-presenter's paradox"; Godfrey, Jones and Lord 1986; Holoien and Fiske 2013; Wang et al. 2019). As a result, prior work suggests people should prioritize just one of these two modes in a given social interaction.

However, speaking only warmly or competently may not be ideal. For example, service agents are supposed to show they care, but also that they are thinking through and trying to solve the customer's problems (e.g., de Ruyter and Wetzels 2000; Parasuraman et al. 1985; Spiro and Weitz 1990).

We suggest that *when* agents speak warmly vs. competently is important. Specifically, more affective language at the beginning of an interaction may be important to build rapport over the customer's issue. That said, it is also important to turn to a more analytic, cognitive style when trying to competently solve that issue. Finally, given the work on recency or end effects (Greene 1986), closing with affective language may be key to leaving the customer feeling positive about the interaction. Our approach uses dynamic quantitative modeling to test this possibility.

Data. We obtained 200 audio recordings of customer service calls from a large American retailer. As a dependent measure, the firm provided end-of-call perceptions of employee helpfulness (1 = not at all helpful, 4 = very helpful). A transcription company converted the recordings to text. Each conversational turn was treated as a separate record (e.g., turn 1 (agent): "How can I help you?", turn 2 (customer): "I can't find (…)"), resulting in 12,410 turns for analysis. The time-series of turns is standardized over all calls (time = 0-1).

For our independent measures, we captured affective versus cognitive language using validated linguistic dictionaries (affective processes, cognitive processes; LIWC; Pennebaker et al. 2015) for both the employee and customer. Controls included customer attributes (e.g., gender, lifetime expenditures), employee attributes (e.g., tenure, quality ratings), customer language, and conversation features (e.g., issue, severity, linguistic synchronicity).

Method. We use methods from functional data analysis (FDA; Ramsay and Silverman 2007) and machine learning (Yang and Zou 2015; Kong et al. 2016) to address the challenges of analyzing conversational language. This integrated approach enables data-driven identification of time-based functions (curves) of conversational features (e.g., language) significantly linked to the outcome of interest (e.g., perception of the other speaker). For any set of conversation feature(s), this method produces sensitivity curves that can deviate over time either positively or negatively from non-significance (zero line) in relation to the outcome of interest.

Results. Results support our theorizing. Areas shaded in blue reveal the importance of more cognitive language in the middle 50% of the call. That said, as shown by the negative effect of cognitive language at the beginning of the call, employees who try to jump straight into using cognitive language at the call's opening-- perhaps attempting to quickly and competently solve the customer's problem-- generate significantly negative social perceptions (blue shaded area below the zero line). Instead, affective language has the most positive effect at the beginning and end of the call.

The average employee's use of both affective and cognitive language does not follow the optimal functional forms. Instead, the agent's use of affective language is at its lowest point at the start of the call, when it is particularly important, while cognitive language is near its lowest point between 12.5% and 40% into the conversation, which our method reveals is when it offers its most positive impact on social perceptions.

Discussion. This research begins to shed light on a richer theory of conversational dynamics. While a great deal of work has looked at word of mouth in general, *when* different linguistic approaches are most useful in conversation has received little attention.

Our results show that customer service employees should try to be warm and competent, but at different times in the conversation. Further, this is just one example of how this approach can be used to understand conversational dynamics. The same approach could be used to understand other linguistic features thought to be beneficial such as concreteness, asking questions, or using long sentences (Castleberry et al. 1999; de Ruyter and Wetzels 2000; Schellekens et al. 2010) in customer service, or studying word of mouth, negotiation, message recall, or other important marketing subjects.

The Numbness of Expertise: Emotional Trajectories in the Development of Expertise

EXTENDED ABSTRACT

Expertise provides numerous benefits. Experts process information more efficiently (Johnson and Mervis 1997), remember information better (LaTour and LaTour 2010), and often make better decisions (Mitchell and Dacin 1996).

Yet, expertise may also carry a cost. Specifically, we propose that as consumers accrue expertise in a hedonic domain, they become increasingly emotionally numb to their experiences.

Building expertise leads to cognitive structure – i.e., knowledge – for how to understand a domain (Alba and Hutchinson 1987). Though this knowledge is often beneficial, it may also lead consumers to engage in an analytical dissection of their experience and thereby detract from it. Take, for example, the movie critic who uses their knowledge to analyze and decompose a comedy, thereby undermining the experience. Given that people engage in consumption for the very feelings it evokes (Holbrook and Hirschman 1982), expertise may have the ironic effect of decreasing feelings for those consumers most interested in a domain.

Study 1 provided initial evidence in a naturalistic setting. We obtained all reviews from the movie website RottenTomatoes.com, which includes reviews from both professional critics ($n_{critics}$ = 5,780) and lay consumers ($n_{consumers}$ = 642,681) across 8,627 movies ($n_{reviews}$ = 3,009,095□). We quantified the positivity and emotionality of reviewers' language using the Evaluative Lexicon (EL; Rocklage, Rucker, and Nordgren 2018; Rocklage and Fazio 2020). Using mixed modeling and controlling for how positive or negative a review was (its extremity), critics expressed less feeling than consumers. This result held controlling for review length, movie genre, and the normative emotion evoked by the movie. For this and all studies, results held across positive and negative emotion.

Studies 2 and 3 used advances in statistical modeling to trace the accumulation of expertise across time via growth curve modeling (see Bolger and Laurenceau 2013). Using CellarTracker.com and BeerAdvocate.com reviews (McAuley and Leskovec 2013), we followed 71,610 consumers as they developed expertise in wine and beer, respectively ($n_{reviews}$ = 3,175,143). Controlling for review extremity, consumers showed consistent decreases in feeling toward each additional wine or beer they reviewed. These results held controlling for review length, the total reviews that user wrote, gender, age, and the normative emotion evoked by each item. They also held for reviewers' *most* emotional reaction in each review, indicating that experts did not reach the same emotional heights as when they first began.

Study 4 examined this phenomenon in the lab and generalized it to professional photography. We showed participants (n = 102) 10

randomly-selected photographs (5 positive and 5 negative; Kurdi, Lozano, and Banaji 2017). After each photograph, participants indicated the emotionality and extremity of their reaction using an EL adjective checklist (Rocklage and Fazio 2015, 2016)the adjectives – individuals use can be harnessed to understand the different aspects of their attitudes. The present research introduces a novel approach to measuring attitudes that allows researchers to quantify these aspects. In Study 1, we created a list of 94 evaluative adjectives and asked participant judges to rate the implied valence, extremity, and emotionality of each adjective. This approach allowed us to quantify each adjective along these dimensions and thereby create the Evaluative Lexicon (EL. They then reported their expertise in photography (Carlson et al. 2009). This study and all the following use mixed modeling and control for extremity. The more expertise consumers had, the less feeling they had in reaction to each photograph.

Study 5 tested the proposed mechanism: experts develop a cognitive framework that, when applied, leads to decreases in feeling. It also generalized the effect using a different emotion measure. We used the same design as Study 4, but participants (n = 452) were randomly assigned to one of three conditions. Those in the Expertise condition went through a learning module on the characteristics that experts use to understand the quality of a photograph (e.g., the message it is attempting to convey, lighting, etc; Sethna 1992) and asked to apply that learning. As a control condition, those in the Expertise-Without-Learning condition were asked to engage with the photographs as if they were an expert photographer, but not provided any learning. Another control condition was not provided the framework nor any specific instructions. After each photograph, individuals indicated the intensity of their emotions using the Self-Assessment Manikin (Bradley and Lang 1994)arousal, and dominance associated with a person's affective reaction to a wide variety of stimuli. In this experiment, we compare reports of affective experience obtained using SAM, which requires only three simple judgments, to the Semantic Differential scale devised by Mehrabian and Russell (An approach to environmental psychology, 1974. Those in the Expertise condition experienced less feeling after each photograph versus control. Expertise-Without-Learning participants showed no difference from the Control or Expertise conditions, indicating that the cognitive framework was key for emotional numbness.

Study 6 was preregistered (https://bit.ly/32cZMvh) and examined whether mere knowledge of the cognitive framework was enough to decrease emotion or whether individuals must actively apply it. Participants (n = 605) were assigned to one of three conditions. Those in the Mere Knowledge condition went through the learning module from Study 5, but not instructed to apply their learning. Instead, they were told we simply wanted to understand how clear the module was for future research. Those in the Application condition were instructed to apply their learning. Control participants were not given the framework nor any specific instructions. Participants used EL checklists to indicate their reactions. As preregistered, those in the Application condition felt less emotion toward each photograph compared to Control. Those in the Mere Knowledge condition showed no difference from Control. These results indicate consumers must apply the framework and that mere knowledge is not sufficient.

Across multiple domains, as consumers develop expertise, they become increasingly emotionally numb. This was evident using both traditional experimental approaches and growth curve modeling, which allowed us to track consumers' emotional trajectories as they gained expertise. Though this effect could be the result of multiple processes (e.g., hedonic satiation), we show that it can result from the cognitive structure experts develop and apply. Whereas past research has focused nearly exclusively on the benefits of expertise, we show that expertise can also have negative side effects: the pursuit of expertise can detract from the very experiences experts chased in the first place.

Wordify: A Tool for Discovering Consumer Vocabularies

EXTENDED ABSTRACT

There is currently growing interest in how consumers use words to express thoughts, feelings, and preferences. In this work we describe a new, easy-to-use online tool for automatic vocabulary discovery named *Wordify* that identifies the words most associated with different *a priori* categorizations of text. Unlike other text-analysis tools that may be familiar to consumer researchers (such as LIWC or LDA), *Wordify* does not seek to provide a summary measure of sentiment or a characterization of latent topics, but rather a list of words that are most predictive of different classifications that are of *a priori* interest to researchers. The tool has multiple domains of potential application, including:

1. *Exploratory analysis*: Discovering the vocabularies that consumers use when discussing a given topic (e.g., products, service experiences);
2. *Hypothesis testing:* A means of testing hypotheses about differences in word use across contexts (e.g., are the words most commonly used in reviews written on phones more emotional than those most commonly used in PC-generated reviews?);
3. *Augmentation:* When used in conjunction with tools such as LIWC and LDA, *Wordify* can yield deeper insights into the words that drive classifications produced by such methods; and
4. *Dictionary expansion:* The tool can be used to expand the dictionaries of bag-of-words text-analysis tools (such as LIWC) so that they provide more accurate measure of sentiment.

One of the main advantages of Wordify is its usability. The tool is freely available online (https://wordify.unibocconi.it/index; temporary user password 0981), and requires only the upload of a .csv file that includes text and a dichotomous classification variable of interest. The resulting output is a list of words that are most predictive of the classification, along with a measure of their degree of predictive validity. In this way, the tool can be seen as analogous to discriminant analysis, but applied to a setting where the predictors are potentially tens of thousands of words in a corpus.

The statistical basis of *Wordify* is randomized logistic regression (RLR, Meinshausen and Bühlmann 2010). Applied here RLR is a method of machine learning that repeatedly fits logistic models to random samples of words in a corpus, and then applies shrinkage or regularization methods to correct for overfitting of these models. The algorithm then computes the relative frequency with which each word in the corpus appears as a significant predictor in each of these models. The final output is the set of words that are most often able to discriminate between categories of interest. By relying on repeated sampling and randomized regularization, the method approximates an "ideal" world where all possible models are estimated, and the model with the best fit is selected (something that is computationally infeasible).

To illustrate the use and output of *Wordify*, consider a recent work by Melumad, Inman, and Pham (2019), who hypothesized that consumer reviews written on smartphones will often be more emotional than that written on personal computers (PCs). The hypothesis is that, because smartphones have a smaller keyboard and screen,

content written on smartphones will tend to be shorter, leading users to convey the gist or essential elements of an experience (in lieu of specific details). Since the gist of one's experience is usually based on the writer's emotional evaluation of that experience, this results in the creation of content that is more selectively emotional when written on smartphones versus PCs.

To test this, we applied *Wordify* to the same corpus of 61,642 *TripAdvisor* reviews analyzed by Melumad et al. (2019). We estimated two sets of *Wordify* models: one identifying the words most predictive of a review being written on a smartphone, and another of those most predictive of a review being written on a PC. The smartphone results yielded a vocabulary of 269 words that were significant predictors in more than 30% of RLR models, and the PC results yielded a vocabulary of 389 words (reflective of the greater number of PC-generated reviews). The partial output from the *Wordify* analysis is reported below.

The results illustrate that, indeed, consumers use different vocabularies when writing reviews on their smartphones compared to PCs. As hypothesized, reviews written on smartphones tended to contain a greater proportion of emotional words. Of the 269 words most predictive of a smartphone-generated review, 18.22% expressed emotionality or an evaluation, while of the 389 words most predictive of a PC review, only 6.43% were emotional or evaluative (Wald Chi-Square = 20.44, $p < .001$).

Perhaps more interestingly, the results reveal that the emotional words used in smartphone-generated reviews tended to be more intense in character than the emotional words used in PC-generated reviews. For example, of the emotional words used, the three that were most predictive of a smartphone-generated review were "amazing", "awesome", and "delicious" (appearing in 59%, 56%, and 53% of all models, respectively), while the three emotional words most predictive of a PC-generated review were "excellent", "wonderful", and "fine" (appearing in 54%, 46%, and 40% of all models, respectively).

While the words used in PC-generated reviews may have conveyed less intense emotionality, more generally, such reviews made greater use of words that were descriptive of the details surrounding the experience itself. For example, the three words that were overall most predictive of a PC-generated review were "restaurant", "dining", and "time" (significant in 58%, 57%, and 57% of models, respectively). In contrast, the three words overall most predictive of a smartphone were "recommend", "amazing", and "awesome" (significant in 59%, 59%, and 56% of models, respectively).

As shown in the above illustration, *Wordify* fills a gap in the growing array of text-analysis tools available to consumer researchers interested in the study of language. Here, the focus is on the individual words that consumers use in different contexts rather than overall patterns such as sentiment (e.g., LIWC) or topics (e.g., LDA). As interest in language grows in the consumer research community, there will be a growing need for similar turnkey tools that can be used by researchers without advanced training in natural language processing. *Wordify* exemplifies such a contribution.

Influencer-Generated Reference Groups

EXTENDED ABSTRACT

In a new "hyperconnected world" where consumers help co-create brand meaning on digital platforms (e.g., Swaminathan et al. 2020), an economy of consumer influencers has developed, where influencers with substantial followings are solicited by brands for mentions on social media (Khamis, Ang, and Welling 2017; Marwick 2015; Senft 2013). Differing from the celebrities in previous marketing research (e.g., McCracken 1989), consumer influencers in digital environments can vary dramatically in terms of their audience, and even consumers with less than 5,000 followers on social media (e.g., "micro-influencers") can now be tapped to support brands. Additionally, these consumer influencers have ultimate control in the publishing of content where they promote brands (Hughes, Swaminathan and Brooks 2019). Finally, these consumer influencers not only provide influence via sponsored engagements, but also through unsolicited opinions on brands and products (i.e. via earned media).

Notably, because of the emergence of the consumer influencer, the potential for brand reference group associations has never been greater. As multiple, similar consumer influencers mention a given brand, followers may repeatedly associate this brand with a certain "type" of person. Decades of research (e.g., Bearden and Etzel 1982; Escalas and Bettman 2005; Berger and Heath 2007; White, Argo, and Sengupta, 2012) have explored how reference groups can influence consumer behavior for brands or products with pre-existing group associations. At the same time, recent commentary suggests that our understanding of *how* cultural meanings are transferred to brands (e.g., how brands gain reference group associations) is still underdeveloped (Batra 2019), particularly from a quantitative, empirical perspective. Because consumers now have digital "megaphones" (McQuarrie, Miller, and Phillips 2013) and are more empowered than ever to shape brand meanings, we chose to explore (1) how influencers might transfer reference group meanings to brands at scale on social media, along with (2) the role of brand sponsorship and endorsement in instigating this meaning creation.

We analyzed a dataset of over 377,404 social media posts by 745 US-based consumer influencers on Instagram, generated through a major social media influencer search engine. First, we identified potential reference group categories by analyzing the text of all influencers' *Instagram* profile bios, which provide self-description of key roles and identities (e.g., "fitness enthusiast", "dog mom"). We consolidated the most frequent self-descriptions and used crowdsourced tagging (via an mTurk survey of 317 participants) to identify additional reference group categorizations for each influencer. We also processed users' bio photos through Microsoft Azure's deep learning FACE API to generate demo-faceo descriptives for the influencers in our dataset. Finally, using a series of nested (hierarchical) logistic regressions alongside a bi-partite network graph (containing 24,518 nodes and 94,807 edges), which we reduced via a Singular Value Decomposition exercise (SVD), we confirmed that several of our identified reference groups were uniquely different in terms of their social media tagging and mentioning behavior.

We then analyzed the brands that were uniquely associated with specific, discernable reference groups in our dataset. As an example, we considered the reference group category of "moms" mentioning the apparel brands in our network graph. We developed a weighted bi-partite graph to provide a visual representation of the connection between apparel brands and our mom reference group. This graph was weighted based on the following size of each influencer, such that macro-influencers exerted greater "pull" than micro-influencers on the positioning of each brand in the graph. A Fisher exact test with Bonferroni correction revealed five brands (Gap, Gap Kids, Express, Old Navy, and J.Crew) significantly associated with the mom reference group. To explore the underlying mechanism of this association, we applied keyword detection (Anderson and Simester 2013) to identify call-to-action and sponsorship signals (CTAs) which signal intent to advertise. Adapted mediation analyses using a Poisson generalized linear model suggested that these unique brand-reference group associations appear to be driven by brand sponsorship and

endorsements of these influencers. At the same time, evidence of unpaid chatter (e.g., for Gap Kids by mom influencers) was also evident based on our mediation analyses.

Our work builds on major ideas in consumer research on branding and social groups (e.g., Bearden and Etzel 1982; McCracken 1986; Solomon 1983), particularly on how brands gain cultural meanings from celebrities (e.g., McCracken 1989) and other cultural artifacts. We extend this research to a new era of social media, in order to quantitatively explore the emerging relationship between brands and consumer influencers. Leveraging tools from Natural Language Processing, network analysis and computer vision, we find that brands are connecting to distinct reference groups in social media, and that these brand-reference group associations can be driven not only by organic brand chatter (e.g., brand mentions in everyday conversation), by also by brand sponsorship and endorsement as part of a reference group branding strategy. Through this work, we hope to help build a bridge between longstanding cultural and sociological theories in consumer research and novel computer science methods, to provide new insights into the emerging digital era of influencer-driven marketing.

REFERENCES

Abele, Andrea E. and Bogdan Wojciszke (2007), "Agency and Communion from the Perspective of Self Versus Other," *Journal of Personality and Social Psychology,* 93(5), 751-763.

Alba, Joseph W. and J. Wesley Hutchinson (1987), "Dimensions of Consumer Expertise," *Journal of Consumer Research*, 13 (4), 411–54.

Anderson, E. T., and Simester, Duncan I. (2014), "Reviews without a purchase: Low ratings, loyal customers, and deception," *Journal of Marketing Research*, *51*(3), 249-269.

Batra, Rajeev (2019), "Creating Brand Meaning: A Review and Research Agenda. *Journal of Consumer Psychology*, 29(3), 535–46.

Bearden, William O. and Etzel, Michael J. (1982), "Reference Group Influence on Product and Brand Purchase Decisions," *Journal of Consumer Research*, 9(2), 183–94.

Berger, Jonah and Heath, Chip (2007), "Where Consumers Diverge from Others: Identity Signaling and Product Domains," *Journal of Consumer Research*, 34(2), 121–134.

Bolger, Niall and Jean-Philippe Laurenceau (2013), *Intensive Longitudinal Methods: An Introduction to Diary and Experience Sampling Research*, New York, NY: The Guilford Press.

Bradley, Margaret M. and Peter J. Lang (1994), "Measuring emotion: The self-assessment manikin and the semantic differential," *Journal of Behavior Therapy and Experimental Psychiatry*, 25 (1), 49–59.

Carlson, Jay P., Leslie H. Vincent, David M. Hardesty, and William O. Bearden (2009), "Objective and Subjective Knowledge Relationships: A Quantitative Analysis of Consumer Research Findings," *Journal of Consumer Research*, 35 (5), 864–76.

Castleberry, Stephen B., C. David Shepherd, and Rick Ridnour (1999), "Effective Interpersonal Listening in the Personal Selling Environment: Conceptualization, Measurement, and Nomological Validity," *Journal of Marketing Theory and Practice*, 7(1), 30-38.

de Ruyter, Ko and Martin G. M. Wetzels (2000), "The Impact of Perceived Listening in Voice-to-Voice Service Encounters," *Journal of Service Research*, 2(3), 276-284.

Fiske, Susan T., Amy J. C. Cuddy, and Peter Glick (2007), "Universal Dimensions of Social Cognition: Warmth and Competence," *Trends in Cognitive Sciences,* 11(2), 77-83.

Godfrey, Debra K, Edward E. Jones, Charles G. Lord (1986), "Self-promotion is not Ingratiating," *Journal of Personality and Social Psychology*, 50(1), 106-115.

Greene, Robert L. (1986), "Sources of recency effects in free recall," *Psychological Bulletin*, 99(2), 221-228.

Halmari, Helena (1993), "Intercultural Business Telephone Conversations: A Case of Finns vs. Anglo-Americans," *Applied Linguistics*, 14(4), 408-430.

Holbrook, Morris B. and Elizabeth C. Hirschman (1982), "The Experiential Aspects of Consumption: Consumer Fantasies, Feelings, and Fun," *Journal of Consumer Research*, 9 (2), 132–40.

Holoien, Deborah S and Susan T. Fiske (2013), "Downplaying Positive Impressions: Compensation Between Warmth and Competence in Impression Management," *Journal of Experimental Social Psychology*, 49(1), 33-41.

Hughes, C., Swaminathan, V., and Brooks, G. (2019), "Driving Brand Engagement Through Online Social Influencers: An Empirical Investigation of Sponsored Blogging Campaigns," *Journal of Marketing*, *83*(5), 78–96.

Johnson, Kathy E. and Carolyn B. Mervis (1997), "Effects of varying levels of expertise on the basic level of categorization," *Journal of Experimental Psychology: General*, 126 (3), 248–77.

Khamis, S, Ang, L. and Welling, R. (2017), "Self-Branding, 'Micro-Celebrity' and the Rise of Social Media Influencers," *Celebrity Studies*, 8(2), 191–208.

Kong, Dehan, Kaijie Xue, Fang Yao, and Hao H. Zhang (2016), "Partially Functional Linear Regression in High Dimensions," *Biometrika*, 103(1), 147-159.

Kronrod, Ann, Amir Grinstein, and Luc Wathieu (2011), "Enjoy! Hedonic Consumption and Compliance with Assertive Messages," *Journal of Consumer Research*, 39(1), 51-61.

Kurdi, Benedek, Shayn Lozano, and Mahzarin R. Banaji (2017), "Introducing the Open Affective Standardized Image Set (OASIS)," *Behavior Research Methods*, 49 (2), 457–70.

Latour, Kathryn A. and Michael S. Latour (2010), "Bridging Aficionados' Perceptual and Conceptual Knowledge to Enhance How They Learn from Experience," *Journal of Consumer Research*, 37 (4), 688–97.

Marwick, A. E. (2015), ""Instafame: Luxury Selfies in the Attention Economy," *Public Culture*, 27(1 (75)), 137–60.

McAuley, Julian John and Jure Leskovec (2013), "From Amateurs to Connoisseurs: Modeling the Evolution of User Expertise Through Online Reviews," in *Proceedings of the 22Nd International Conference on World Wide Web*, WWW '13, New York, NY, USA: ACM, 897–908.

McCracken, G. (1986), "Culture and Consumption: A Theoretical Account of the Structure and Movement of the Cultural Meaning of Consumer Goods," *Journal of Consumer Research*, 13(1), 71.

McCracken, Grant (1989), Who Is the Celebrity Endorser? Cultural Foundations of the Endorsement Process," *Journal of Consumer Research*, 16(3), 310.

McQuarrie, E. F., Miller, J. and Phillips, B. J. (2013), The Megaphone Effect: Taste and Audience in Fashion Blogging," *Journal of Consumer Research*, 40(1), 136–58.

Meinshausen, Nicolai and Peter Bühlmann (2010), "Stability Selection," *Journal of the Royal Statistical Society: Series B (Statistical Methodology),* 72 (4), 417–73.

Melumad, Shiri, J. Jeffrey Inman, and Michel Tuan Pham (2019), "Selectively Emotional: How Smartphone Use Changes User-Generated Content," *Journal of Marketing Research*, 56 (4), 259–75.

Mitchell, Andrew A. and Peter A. Dacin (1996), "The Assessment of Alternative Measures of Consumer Expertise," *Journal of Consumer Research*, 23 (3), 219–39.

Packard, Grant, Sarah G. Moore, and Brent McFerran (2018), "(I'm) Happy to Help (You): The Impact of Personal Pronouns Use in Customer-Firm Interactions," *Journal of Marketing Research*, 55(4), 541-555.

Parasuraman, A., Valarie A. Zeithaml, and Leonard L. Berry (1985), "A Conceptual Model of Service Quality and Its Implications for Future Research," *Journal of Marketing*, 49(4), 41-50.

Pennebaker, James W., Ryan L. Boyd, Kayla Jordan, and Kate Blackburn (2015), "*The development and psychometric properties of LIWC2015,*" Retrieved from https://repositories. lib.utexas.edu/bitstream/handle/2152/31333/LIWC2015_ LanguageManual.pdf

Ramsay, James O. and Bernard W. Silverman (2007), *Applied Functional Data Analysis: Methods and Case Studies*, New York: Springer.

Rocklage, Matthew D. and Russell H. Fazio (2015), "The Evaluative Lexicon: Adjective use as a means of assessing and distinguishing attitude valence, extremity, and emotionality," *Journal of Experimental Social Psychology*, 56, 214–27.

Rocklage, Matthew D. and Russell H. Fazio (2016), "On the dominance of attitude emotionality," *Personality and Social Psychology Bulletin*, 42(2), 259–70.

Rocklage, Matthew D. and Russell H. Fazio (2020), "The Enhancing Versus Backfiring Effects of Positive Emotion in Consumer Reviews," *Journal of Marketing Research*, 57(2), 332-52.

Rocklage, Matthew D., Derek D. Rucker, and Loran F. Nordgren (2018), "The Evaluative Lexicon 2.0: The measurement of emotionality, extremity, and valence in language," *Behavior Research Methods*, 50 (4), 1327–44.

Schellekens, Gaby A. C., Peeter Verlegh, and Ale Smidts (2010), "Language Abstraction in Word of Mouth," *Journal of Consumer Research*, 37(2), 207-23.

Senft, T. M. (2013), "Microcelebrity and the Branded Self, in *A Companion to New Media Dynamics*, ed. John Hartley, Jean Burgess, and Axel Bruns, Oxford, UK: Wiley-Blackwell, 346–54.

Sethna, Edward (1992), "Analysis of Judging," *Royal Photographic Society Journal*, 132, 424–26.

Solomon, Michael R. (1983), "The Role of Products as Social Stimuli: A Symbolic Interactionism Perspective," *Journal of Consumer Research*, 10(3), 319–329.

Spiro, Rosann L. and Barton A. Weitz (1990), "Adaptive Selling: Conceptualization, Measurement, and Nomological Validity," *Journal of Marketing Research*, 27(1), 61-69.

Swaminathan, V., Sorescu, A., Steenkamp, J. B. E., O'Guinn, T. C. G., and Schmitt, B. (2020), "Branding in a Hyperconnected World: Refocusing Theories and Rethinking Boundaries," *Journal of Marketing*.

Wang, Ze, Huifang Mao, Yexin Jessica Li, and Fan Liu (2017), "Smile Big or Not? Effects of Smile Intensity on Perceptions of Warmth and Competence," *Journal of Consumer Research*, 43(5), 787-805.

White, Kate, Simpson, B. and Argo, Jennifer J. (2014), "The Motivating Role of Dissociative Out-Groups in Encouraging Positive Consumer Behaviors," *Journal of Marketing Research*, 51(4), 433–47.

Yang, Yi and Hui Zou (2015), "A Fast Unified Algorithm for Solving Group-Lasso Penalized Learning Problems," *Statistics and Computing*, 25, 1129-1141.

Letting Go: What Does it Mean for Consumers to Declutter their Offline and Online Lives?

Chair: Mariam Humayun, University of Ottawa, Canada

Paper #1: Consuming Order & Discipline
Eric Li, University of British Columbia, Canada
Russell Belk, York University, Canada

Paper #2: Home Sweet Home: How Consumers Regain Implacement in Creating the Place of Home
Annetta Grant, Bucknell University, USA
Jay Handelman, Queen's University, Canada

Paper #3: Freed from Desire: Consumers' Escape from Market Ideologies Through Decluttering Practices?
Birte Manke, University of St. Gallen, Switzerland
Johanna Gollnhofer, University of St. Gallen, Switzerland

Paper #4: Offline *Is* The New Luxury? Consuming Digital Detoxing
Mariam Humayun, University of Ottawa, Canada

SESSION OVERVIEW

Embracing this year's ACR theme of enlightenment, we would like to critically examine the complexities of human-object interactions in modern consumers' lives (Epp and Price 2010; Hoffman and Novak 2018). In this special session we are exploring counter trends to abundance and excess in various contexts, e.g. digital and physical decluttering, home organization, and home renovation.

Consumers' lives are stuffed with 'things', be it offline or online (Miller 2008; Johnson 2010). While some consumers still follow a consumerist logic and accumulate objects, there has been a counter quest for *letting go,* reducing*,* and curation of spaces and belongings – be they physical or mental. The need for reducing chaos in our lives has remained consistent, be it in the ethos of voluntary simplicity or going off to live in the hippie communes of the 1960s (Schor 1998). This need to "make sense" and to reach a "better place" has become more pressing.

Drawing on various theoretical lenses ranging from the themes of pollution, conflict, implacement, to consumer resistance, the papers in this session bring up manifold questions: How are consumers in various contexts letting go of objects in their offline and online lives? Some of these consumers are focused on improving their homes to become idealized spaces. Others are engaged in reducing the clutter from their digital lives following the ethos of digital minimalism. What are the differences and similarities of these practices? Decluttering can range from permanent dispossession such as selling off a house to live off-the-grid, to more temporal states such as turning off all social media for a day. What role does temporality play? This de-cluttering takes place in "spaces" that are constituted as tangible (offline) to the more ephemeral (online). What is the role of materiality? How has the Covid19 pandemic affected some of these acts of *"letting go"*?

The first paper *"Consuming Order & Discipline"* derives the key concepts of order and pollution to understand the rise of consumer disciplinary mechanisms in professional home organization services. Findings show how two contesting regimes – the polluting ingestion regime of consumption and the disciplinary dietetic regime of organization – govern consumers' perceptions of self, home, and life.

Next, the paper *"Home Sweet Home: How Consumers Regain Implacement in Creating the Place of Home"* contributes to the theory of place through an examination of how consumers return to a more balanced equilibrium by way of the transformation of renovat-ing a home. The study analyzes the rituals consumers engage in to reach "implacement" – feeling "at home."

The third paper *"Freed from Desire: Consumers' Escape from Market Ideologies Through Decluttering Practices?"* highlights the conflicts that consumers face when dispossessing objects and explores consumer motives for divestment processes that focus rather on the societal consumption ideologies that may hinder the disposal process.

The final paper *"Offline Is The New Luxury? Consuming Digital Detoxing"* examines the emptiness and entanglements of the digital world and how consumers are engaging in digital detoxes and letting go of their digital devices and social media as a new form of consumer resistance.

Consuming Order and Discipline

EXTENDED ABSTRACT

Consumerism and materialism are placed under a strict dietetic regime through the institutionalized insistence that we own too much stuff (e.g., Bennett, 2012; Czarniawska and Lofgren 2013; Herring, 2014; Löfgren, 2012). Consumers continue to buy and accumulate material objects in order to feel secure or to compete with referent others (Schor, 1998). Whybrow (2006) argues that American consumers accumulate experiences and possessions at a rapid and unhealthy pace due to the accelerating work-spend-consume cycle. Similarly, longing for something more is often our response to a sense of imbalance and insecurity as well as the desire for more passion in life (Barton, 2014; Charland, 2014; Williamson, 1985). One response is to acquire and accumulate ever more possessions (Flanders, 2007).

No matter what drives us to buy more and possess more, our increasing inventories of possessions lead to the formation of what we and others perceive as clutter and chaos in our homes and offices. Consumer advocates and market agents have begun problematizing and stigmatizing over-consumption and excessive accumulation, and at the same time medicalizing and destigmatizing practices now called hoarding, obsessive compulsive disorder, and addiction, equating these practices with mental disorders (Belk, 1985; Frost and Steketee 2014; Hirschman, 1992; Kasser, 2002; O'Guinn & Faber, 1989; Richins & Dawson, 1992; Rook, 1987; Schor, 1998; Van Ameringen et al., 2014). Hoarding joined the others as a psychological disorder in DSM-5 (American Psychiatric Publishing, 2013).

Recent and ongoing criticism of consumerism and hoarding behaviors has revised societal definitions of order and disorder, cleanliness and dirtiness in North America. Such criticism also promotes a new desire for order and discipline. As well it has renewed social expectations and definitions of the ideal consumer-citizen.

Based on our research with a professional organizing firm and its clients, the aim of this paper is to unpack their co-constructed disciplinary processes. As consumers become bound by these new practices, the institutionalized regimes of order and discipline act as a domestic "diet." Our analysis of this intersection of materiality, home dietetics, and consumerism, shows that the vicious cycle of discipline/order and regression/disorder binds our self-image and mental health to the way we manage our over-stuffed homes and bodies.

Our collaborative study of professional organizers and their clients, also shows that the construction of order and discipline is

actively mediated by the interactions between these market agents and consumers. We find that transitions within a person's life create a psychological burden and increase levels of uncertainty and instability in their lives. Too much consumption, too many possessions, and too much failure in multi-tasking are other sources of domestic disorganization. Like dietary restrictions, home organization in the current study is viewed as a learnable skill and a "consumer-intensive" practice (Fischer et al., 2009), since consumers have to engage and commit to keeping up with prescribed new tasks and ordering systems to achieve desirable outcomes.

The societal obsession with home order and organization is similar to our obsession with slim and well-kept bodies. A cluttered home is seen as synonymous with an overweight body. In both cases programmatic dietary restriction is promoted as one way to achieve societal ideals. Professionals (e.g., dietitians and professional organizers) act as coaches who help in structuring and implementing these regimes. Disorganization becomes misconduct and therefore is seen to require regulation and treatment. Our findings also show that new organizational practices demand a new lifestyle for consumers who desire disciplined lives that consolidate their "good citizen-consumer" identities.

We find that the order-construction process encourages self-governance while simultaneously setting norms that are difficult or impossible to realistically achieve. The reinforcement of organizational concepts not only alters consumer practices but also introduces a new and harsh regime to their everyday lives. A clutter-free home is first collaboratively staged by professional organizers and clients through purging and ordering. Order and disorder as well as cleanliness and dirtiness are not purely abstract and depersonalized constructs. Rather, they are suffused with moralization, empathy, and sorrow (Herz, 2012; Kelly, 2011). When inevitable backsliding into clutter, disorder, and chaos occurs, a medicalized rationalization of disease averts blame and self-disparagement.

Being organized is now framed as a life choice. Society sets new standards, rules, and regulations. The market responds with systems to discipline and monitor our bodies and homes. Marketplace organizing services are offered to administer and reinforce these standards. Despite their empathetic intervention, new disciplines generate fear, anxiety, and discomfort. We discuss the discursive formation of these disciplinary discourses and show how dietetic principles render our homes, minds, and bodies as "disciplined spaces."

Home Sweet Home: How Consumers Regain Implacement in Creating the Place of Home

EXTENDED ABSTRACT

The home is an important consumer place. Historically, consumer researchers have come to understand the importance of the home as foundational in building "the good life" (Belk and Pollay 1985, 891), which at its core involves the quest for 'homeyness'—a culturally constructed state that consumers create through a constellation of material resources within the home (McCracken 1989). The home is where consumers enact authentic personal and family identities and practices (Epp and Price 2008, 2010; Tian and Belk 2005; Wallendorf and Arnould 1991), such as the identity of 'father' (Coskuner-Balli and Thompson 2012) and other gendered identities (Moisio, Arnould, and Gentry 2013). Within the home, consumers also enact taste regimes as they build social distinction and high cultural capital through the display of fashion, wealth, and elite tastes (Arsel and Bean 2013; Holt 1998; Üstüner and Holt 2009) while communicating and negotiating cultural norms and moral beliefs (Dion, Sabri, and Guillard 2014).

Throughout this literature, the home emerges ubiquitously as a place in Western culture where consumers act out identities, relationships, and build social distinction. However, this perspective portrays the home as an inert entity, a "receptacle for material and social objects… an arena in which objects [are] socially arranged and re-arranged" (Prior 1988, 88). For example, Bourdieu (1973, 102) adopted a Newtonian worldview of space in which "the house is organized according to a set of homologous oppositions," meaning that the home comes to stand as an objectified reflector of social life (Prior 1988). Such is the "disenchantment of place and its reconfiguration as a mere subdivision of universal space, inert and homogeneous" (Sherry 2000, 274). This prior literature tends to regard place as an inert platform upon which consumers engage in social activity, but overlooks the human condition that is entwined with place. The philosopher Edward Casey sensitizes us to this dynamic.

In his theory of place, Edward Casey (1993; 1998, 6) directs our attention to a predicament of the human condition in which people seek a feeling of being in place, or "to achieve the assurance offered by plenitude of place" as an antidote to "place panic; depression or terror even at the idea, and still more in the experience, of an empty place." The quest to achieve a "plenitude of place" is driven by a fear of "the void of no-place [which] is to be avoided at almost any cost" (Casey 1998, 6). At the extreme, this void of no-place, or "terror of the void" (Sherry 2000, 274), is evident when considering, for example, the trope of immigrants as an uprooted people (Bodnar 1985) who are obliged to "leave the place of [one's] birth to seek safety, opportunity, or even basic necessities of life" (Peñaloza 1995, 83); the struggles of homeless people who fantasize about living in a permanent home while coping with their displacement (Hill 1991); or the vulnerability of people who lose their homes as a result of a natural disaster (Baker, Hunt and Rittenburg 2007). Just as Roux and Belk (2019) note that one's body is the ultimate place of origin and destination that one cannot escape, Casey's work sensitizes us to the idea that having a place we call home is not an option.

To build an understanding of the dynamic of the human condition that is entwined with place, we engaged in an ethnographic exploration of the home renovation marketplace in which consumers find themselves on seemingly endless quests to modify their well-functioning homes. This paper examines how the quest for plenitude of place—implacement—which is grounded in the existential threat of no-place, shapes the home renovation marketplace and consumers' behavior around the modification of their homes. In so doing, we address three research questions: How does the fear of no-place manifest in a context in which the consumer does not fear literal physical displacement from one's home? How do modifications to the home help the consumer address this fear of no-place? What role do media and marketers play in our understanding of the place of home and the consumer quest to modify this place?

We contribute to the theory of place with an in-depth examination of the home renovation marketplace that comprises media observation, participant observation in home renovation shows, and longitudinal depth interviews with consumers engaging in home renovations. We draw on Edward Casey's (1993; 1998; 2009; 2017) theory of place as the lens through which to understand our data. We find that through media portrayals of the home, consumers are confronted with an anonymous gaze that admonishes them for portrayals of uniqueness within the home. The cosmogenic origins to which the home is thought to align is dysplaced—socially re-engineered—through this anonymous gaze. This invisible presence leaves consumers with an uneasy feeling within one's home, setting the consumer on a path of renovation and subsequent displacement—physical dislocation—during the renovation. As such, the home emerges as

a place where the consumer's quest for implacement is constantly impeded by forces of dysplacement and displacement.

Freed from Desire – Consumers' Escape from Market Ideologies Through Decluttering Practices?

EXTENDED ABSTRACT

Consumers in western countries have come to a place of material abundance. In 2019 Americans spent, on average, $ 1.497 per month or nearly $ 18,000 per year on non-essential goods (Backman, 2019). This material abundance has left many consumers living in cluttered environments (Arnold, Graesch, Ragazzini, & Ochs, 2019). One estimate suggests that the average American home is filled with about 300,000 things (MacVean, 2014). Clutter is defined as an "… overabundance of material possessions that collectively create disorderly and chaotic home environments" (Roster, Ferrari, & Peter Jurkat, 2016, 32). As a solution to the problem of abundance, consumers start the disposal of objects, which has grown into a consumption trend (Cwerner & Metcalfe, 2003; Löfgren, 2017).

Prior research on disposal focused on the role of consumer's identity (Lastovicka & Fernandez, 2005; Price, Arnould, & Folkman Curasi, 2000) and the transfer of meaning trough divestment processes (McCracken, 1986). Building on the theory of the extended self, Belk (1988) it is theorized that consumers let go of objects that no longer serve the purpose of maintaining or extending the self-concept (Kleine, Kleine, & Allen, 1995; Lastovicka & Fernandez, 2005; Trudel, Arg, & Meng, 2016).

Thompson and Haytko (1997) see personal identity as variable and cultural meanings as appropriated in a dynamic field of social relations through dialogue. Often consumers make an effort to live up to culturally prescribed standards of living and being (Schouten, 1991). However, consumers may also engage in modes of resistance against prevailing market ideologies and consumption practices (Gollnhofer, Weijo, & Schouten, 2019; Martin & Schouten, 2014). Resisting certain cultural meanings may cause a greater sense of personal identity than unconsciously embraced meanings (Thompson & Haytko, 1997). Research has shown that disposal processes can be accompanied by internal identity conflicts, feelings of guilt, and ambiguity (Phillips & Sego, 2011). Overall, consumers strive to resolve conflicts around their identity (Ahuvia, 2005). Therefore, we explore the conflicts encountered during the decluttering process.

We draw on the concept of acculturation to explain why consumers move away from market ideologies about object ownership during a decluttering process. The concept of acculturation has previously been applied to the process of risk acculturation for skydivers (Celsi, Rose, & Leigh, 1993), but more often in the context of migration and minorities (Askegaard, Arnould, & Kjeldgaard, 2005; Luedicke, 2015; Üstüner & Holt, 2007). In the context of changed consumer-object-relations and the rise of more liquid consumption, Bardhi et al (2012) started to critically reflect on the role of acculturation and we would like to build on this discussion. The phenomenological experience of consumer's object ownership (e.g. being overwhelmed by abundance and clutter) and dominant Western market ideologies are in conflict, and these conflicts are materialized in a decluttering process. As these conflicts are resolved during the decluttering process, consumers adapt their ideas around consumption, consumer identity, and object ownership.

To understand the conflicts consumers face during the decluttering process, we conducted 8 in-depth interviews with recent declutters and decluttering coaches, resulting in 177 pages of interview transcripts (1.5 spaced). For contextualization and triangulation, we examined series, documentaries, and YouTube videos, popular books, and articles in blogs, and magazines on the decluttering phenomenon. The interviews were systematically coded and analyzed.

From our research, we first distinguished two types of disposal processes. The first type of disposal process has already been studied: Consumers interact with the object and assess whether the individual meaning is still relevant to them. The second type of disposal process involves a reflection, not only on personal meanings but also on market ideologies, which can be materialized in the ownership of certain products (e.g. Zanette & Scaraboto, 2019). So far, we identified four consumer ideologies that consumers may let go of during a decluttering process: ownership, process professionalization, the pursuit of ideals, fear of scarcity. The first market ideology of ownership has already been discussed by Bardhi et al (2017; 2012) and also Belk (2010). During decluttering process consumers reflect on whether they need a physical object. Sometimes they take photos as digital representations or switch to access based services to let go of their physical objects. When consumers let go of process professionalization, they may dispose of the desire to own specialized equipment for certain tasks or events and overall simplify their consumption practices and the belongings involved. Consumers, who let go of the pursuit of ideals, let go of societal expectations regarding trendiness or looking fashionable. Instead they opt for more durable, timeless classic objects after their disposal experience. Consumers may also let go of the expectation to lose weight and adhere to a societal standard of beauty by keeping clothes size to small or very uncomfortable clothes that 'look nice'. Despite living in a world of abundance, consumers may still hold onto a fear of scarcity. Consumers may be prone to respond to deals, special offers, and freebies on the one side and/ or keep consumption objects 'just in case'. They start to realize in the process of decluttering that there is no need to be prepared for every instance in advance.

This study contributes to consumer research by providing insights on conflicting personal and market ideologies. Further, we introduce the concept of acculturation into the debate around disposal. Lastly, we contribute to identity theory by highlighting the role of disposal for the identity process as prior research only saw acquisition as relevant for perpetuating and creating a consistent-self-concept.

"Offline *Is* The New Luxury? Consuming Digital Detoxing"

EXTENDED ABSTRACT

"Take the phone off the hook and disappear for a while" – Vienna by Billy Joel.

Back in the day, it was possible to escape the daily grind of life by simply disconnecting one's phone. There was a time in the early days of the internet and the world wide web when there was a difference between offline and online lives. However, these boundaries have become ever more porous especially in the developed world. When once people used terms such as "BRB" (Be Right Back) or "IRL" (In Real Life), today the infiltration of the digital into our lives is ubiquitous where we are constantly connected and rarely – if ever – *exit* the system.

While social media was once hailed as a utopian technology connecting many, today there has been growing concern about the polarization and tribalism it has created (Lanier 2014; O'Neil 2016; Bauman 2017). Democracies and individual freedom have been threatened by the same technologies that once held the promise of consumer empowerment and liberation (Zuckerman 2019). Social media was designed to hijack our attention by inviting us down vari-

ous rabbit holes led by algorithmic systems (Sandvig et al. 2014; Harris 2016). Social media and our phones were in fact built to be addictive devices that keep us coming back for more content. We as consumers have taken to using free products offered by the likes of Google, Facebook, and TikTok, but there has always been an invisible hefty price to pay. As the saying goes, "if you are not paying for the product, you *are* the product" (Molla 2020).

We live in an era of big data where consumer-generated content has been one of the key drivers of innovation in marketing (Kozinets et al. 2010). While every facet of our lives is becoming ever more digitized, tracked, and monetized (Belk 2013; Kozinets et al. 2017; DuFault and Schouten 2018), there have been growing concerns over our digital futures, be it ethical concerns over AI, the rise of fake news, extensive surveillance through the social credit system, facial recognition technologies, or different forms of trolling and targeting enabled by social media (O'Neil 2016; Eubanks 2017; Noble 2018). Social media and the internet by their ubiquitous nature have become a part of the *background* or the digital *banal* (Dinnen 2018).

Technology often creates a paradoxical relationship where consumers feel connected to each other constantly and at the same time feel alienated by these interactions (Mick and Fournier 1998; Kozinets 2008; Turkle 2011). There has also been a significant erosion of trust in digital technologies of late (Zuboff 2015; Confessore and Kang 2018; Karppi 2018; Zuboff 2019). Consumers are seeking to escape the relentless march of the digital through postdigital consumption (Cramer 2015; Humayun and Belk 2017, 2020). Consumer resistance has found a new meaning online (Penaloza and Price 1993; Heath and Potter 2004; Kozinets and Handelman 2004).

Given that consumers' data is the "new oil" (Lanier 2014; Zuboff 2019) and the recognition that we have given up our privacy in return for free products, many consumers are seeking to resist complete surveillance and reclaim their privacy through engaging in digital detoxes or "going offline". Escaping the digital realm through postdigital consumption has become one form of such mundane resistance. These consumers are to an extent evangelical in their opposition to the cannibalization of the digital realm. Digital detoxing refers to the practice of purging of digital technologies from daily lives for either permanent or temporal periods (Syvertsen and Enli 2019).

This research is based on ethnographic data drawn from consumer interviews, participant observation, archival data, and a netnography focused on subreddits, podcasts, YouTube, social media announcements (e.g. Instagram, Twitter, Facebook posts of "going offline"), alongside blogposts focused on digital detoxing. While these consumers are engaging in digital detoxes, an important part of the experience, ironically enough is sharing the experience online.

There are various degrees to which consumers engage in digital detoxing. Some might give up social media for a week – or even a day – while other consumers are choosing to give up using cellphones or go completely "off the grid" by moving away from cities and living in ecovillages. Consumers often announce their "offline weeks" on their social media accounts and return to post about their offline experiences – be it through blogposts or through email newsletters which have made a comeback. They connect these conversations across disparate social media accounts by using #digitaldetox #offline or #unplugging. Others are also relying on their podcast network to engage in connected digital detoxes hinting at an entanglement (Lupton 2015). Many influencers and gig economy workers in fact have been some of the key figures leading the digital detox movement as they experience burnout from being constantly connected and entangled with the online world. Sharing the digital detox encounter often constitutes an important part of the experience.

Some consumers brand themselves as modern day *luddites* shunning technologies to find life at its core. Others are inspired by the principles of digital minimalism and mindfulness discourses (Newport 2019). Many take to digital detoxing simply because their lives have reached burnout points, especially gig-economy workers or 'influencers' (consumers-turned-entrepreneurs) for whom digital media is their main source of livelihood. At the other extreme are those who are considered "data fundamentalists" who are completely reclaiming privacy by living off-the-grid (Rosen 2010). Marketers are increasingly jumping on the digital detoxing bandwagon by sponsoring events encouraging "no Wi-Fi". For example, Lululemon promoting mindfulness through digital cleansing, the rising popularity of "digital wellness" apps, lifestyle brands like Goop extolling the benefits of being offline, or cities positioning themselves as places to engage in digital detox.

Being offline has become a new form of luxury and status symbol. Ironically enough, it is the tech elites who can afford to take off for offline retreats in the wake of the world they created. The Covid19 pandemic has in fact revealed some of these digital inequalities where only a few can really afford to truly disconnect. Others remain embedded in the vortex of "doomscrolling" or "zooming". Digital detoxes raise important questions about our digital lives and the possibly dystopian futures and the ever-changing social imaginaries that lie ahead.

REFERENCES:

Ahuvia, A. C. (2005), "Beyond the Extended Self: Loved Objects and Consumers' Identity Narratives," *Journal of Consumer Research*, 32(1), 171–184.

American Psychiatric Publishing (2013), "Obsessive Compulsive and Related Disorders" accessed on February 21, 2020 at http://www.dsm5.org/Documents/Obsessive%20 Compulsive%20Disorders%20Fact%20Sheet.pdf

Arsel, Zeynep and Jonathan Bean (2013), "Taste Regimes and Market-Mediated Practice," *Journal of Consumer Research*, 39 (5), 899-917.

Arnold, J. E., Graesch, A. P., Ragazzini, E., & Ochs, E. (2019), "Life at Home in the Twenty-First Century," *Life at Home in the Twenty-First Century*, Cotsen Institute of Archaeology Press.

Askegaard, S., Arnould, E. J., & Kjeldgaard, D. (2005), "Postassimilationist Ethnic Consumer Research: Qualifications and Extensions," *Journal of Consumer Research*, 32(1), 160–170.

Backman, M. (2019), *"Americans are spending $18,000 a year on nonessentials,"* Retrieved February 4, 2020, from https:// eu.usatoday.com/story/money/2019/05/07/americans-spend-thousands-on-nonessentials/39450207/

Baker, Stacey Menzel, David M. Hunt, and Terri L. Rittenburg (2007), "Consumer Vulnerability as a Shared Experience: Tornado Recovery Process in Wright Wyoming," *Journal of Public Policy and Marketing*, 26 (1), 6-19.

Bardhi, F., & Eckhardt, G. M. (2017), "Liquid Consumption," *Journal of Consumer Research*, 44(3), 582–597.

Bardhi, F., Eckhardt, G. M., & Arnould, E. J. (2012), "Liquid Relationship to Possessions," *Journal of Consumer Research*, 39(3), 510–529.

Bauman, Zygmunt (2017), *Retrotopia*, Cambridge, UK: Polity Press.

Barton, Adriana (2014), "Anorexia: A 'new passion' may help people recover," *The Globe and Mail*, September 14. Retrieved from: https://beta.theglobeandmail.com/life/health-and-fitness/health/anorexia-a-new-passion-may-help-people-recover/article20584523/?ref=http://www.theglobeandmail.com&

Belk, Russell W. (1985), "Materialism: Trait Aspects of Living in the Material World," *Journal of Consumer Research*, 12 (December), 265-280.

Belk, Russell W., and Richard W. Pollay (1985), "Images of Ourselves: The Good Life in Twentieth Century Advertising," *Journal of Consumer Research*, 11 (4), 887-897.

Belk, Russell W. (1988), "Possessions and the Extended Self," *Journal of Consumer Research*, 15(2), 139.

Belk, R. (2010), "Sharing," *Journal of Consumer Research*, 36(5), 715–734.

Belk, Russell (2013), "Extended Self in a Digital World," *Journal of Consumer Research,* 40 (3), 477-500. doi: 10.1086/671052.

Bennett, Jane (2012), "Powers of the Hoard: Further Notes on Material Agency," in *Animal, Vegetable, Mineral" Ethics and Objects*, ed. Jeffrey Jerome Cohen, Washington, D.C.: Oliphaunt, 237-269

Bourdieu, Pierre (1973), "The Berber House," in M. Douglas, *Rules and Meanings*, Harmondsworth: Penguin.

Charland, Louis C. (2014), "The distinction between 'passion' and 'emotion' Vincenzo Chiarugi: a case study," *History of Psychiatry*, 25 (December), 477-484.

Casey, Edward S. (1993), "*Getting Back into Place: Toward a Renewed Understanding of the Place World*", Bloomington: Indiana University Press.

_____ (1998), *The Fate of Place: A Philosophical History*, Los Angeles, CA: University of California Press.

Celsi, R. L., Rose, R. L., & Leigh, T. W. (1993), "An Exploration of High-Risk Leisure Consumption Through Skydiving," *Journal of Consumer Research*, 20(1), 1.

Coskuner-Balli, Gokcen, and Craig J. Thompson (2012), "The Status Costs of Subordinate Cultural Capital: At-Home Fathers' Collective Pursuit of Cultural Legitimacy Through Capitalizing Consumption Practices," *Journal of Consumer Research*, 40 (1), 9-41.

Confessore, Nicholas, and Cecilia Kang (2018), "Facebook Data Scandals Stoke Criticism That a Privacy Watchdog Too Rarely Bites." *New York Times* December 30, 2018.https://www.nytimes.com/2018/12/30/technology/facebook-data-privacy-ftc.html

Cramer, Florian (2015), "What Is 'Post-digital'?", in *Postdigital Aesthetics: Art, Computation & Design*, David Berry and Michael Dieter, ed. London: Palgrave Macmillan. 12-26

Cwerner, S. B., & Metcalfe, A. (2003), "Storage and Clutter: Discourses and Practices of Order in the Domestic World," *Journal of Design History*, 16(3), 229–239.

Dion, Delphine, Ouidade Sabri, and Valérie Guillard (2014), "Home Sweet Messy Home: Managing Symbolic Pollution," *Journal of Consumer Research*, 41 (3), 565-89.

Dinnen, Zara (2018), *The Digital Banal: New Media and American Literature and Culture*, New York: Columbia University Press.

Epp, Amber M., and Linda L. Price (2008), "Family Identity: A Framework of Identity Interplay in Consumption Practices," *Journal of Consumer Research*, 35 (1), 50-70.

_____ (2010), "The Storied Life of Singularized Objects: Forces of Agency and Network Transformation," *Journal of Consumer Research*, 36 (59), 820-837.

Epp, Amber M., Hope J. Schau, and Linda L. Price (2014), "The Role of Brands and Mediating Technologies in Assembling Long-Distance Family Practices," *Journal of Marketing,* 78 (3), 81-101.

Fischer, E., Otnes, C. C., Winegard, B., Li, E. P. H., & Wilner, S. J. S. (2009), "Are we there yet? Co-producing Success and Failure in a 'Consumer-intensive' Service Content*",* In J. F. Sherry & E. Fischer (Eds.), *Explorations in Consumer Culture Theory* (pp. 101-113). Abington, UK: Routledge.

Flanders, J. (2007), Consuming Passions: *Leisure and Pleasure in Victorian Britain*, London, UK: Harper Perennial.

Frost, Randy and Gail Steketee, eds. (2014), *The Oxford Handbook of Hoarding and Acquiring*, Oxford: Oxford University Press.

Gollnhofer, J. F., Weijo, H. A., & Schouten, J. W. (2019), "Consumer Movements and Value Regimes: Fighting Food Waste in Germany by Building Alternative Object Pathways," *Journal of Consumer Research*, 46(3), 460–482.

Harris, Tristan (2016), "How Technology Hijacks People's Minds—From a Magician and Google's Design Ethicist." *Observer*, June 1, 2016.https://observer.com/2016/06/how-technology-hijacks-peoples-minds%E2%80%8A-%E2%80%8Afrom-a-magician-and-googles-design-ethicist/

Heath, Joseph, and Andrew Potter (2004), *The Rebel Sell: Why the Culture Can't be Jammed*: HarperCollins.

Herring, Scott (2014), *The Hoarders: Material Deviance in Modern American Culture*, Chicago: University of Chicago Press.

Herz, Rachel (2012), *That's Disgusting: Unravelling the Mysteries of Repulsion*, New York, NY: W. W. Norton & Company.

Hill, Ronald Paul (1991), "Homeless Women, Special Possessions, and the Meaning of "Home": An Ethnographic Case Study," *Journal of Consumer Research*, 18 (3), 298-310.

Hirschman, Elizabeth C. (1992), "The Consciousness of Addiction: Toward a General Theory of Compulsive Consumption," *Journal of Consumer Research*, 19 (September), 155-179.

Hoffman, Donna L., and Thomas P. Novak (2018), "Consumer and Object Experience in the Internet of Things: An Assemblage Theory Approach," Journal of Consumer Research, 44 (6), 1178-1204.

Holt, Douglas B. (1998), "Does Cultural Capital Structure American Consumption?" *Journal of Consumer Research*, 25 (1), 1-25.

Humayun, Mariam, and Russell Belk (2017), "Being Dumb in the Age of Smart: Analogue Object Entanglements", in Association for Consumer Research, Ayelet Gneezy, Vladas Griskevicius and Patti Williams, ed. San Diego: Advances in Consumer Research. 117-122

Humayun, Mariam, and Russell Belk (2020), "The Analogue Diaries of Postdigital Consumption," *Journal of Marketing Management*, 1-27.

Johnson, Barbara (2010), *Persons and Things*, Cambridge: Harvard University Press.

Karppi, Tero (2018), *Disconnect: Facebook's Affective Bonds*, Minnesota: University of Minnesota Press.

Kasser, Tim (2002), *The High Price of Materialism*. Cambridge, MA: MIT Press.

Kelly, Daniel (2011), *Yuck! The Nature and Moral Significance of Disgust*, Cambridge, MA: A Bradford Book.

Kleine, S. S., Kleine, R. E. K., & Allen, C. T. (1995), "How is a Possession "Me" or "Not Me"? Characterizing Types and an Antecedent of Material Possession Attachment," *Journal of Consumer Research*, 22(3), 327.

Kozinets, Robert V, and Jay M. Handelman (2004), "Adversaries of Consumption: Consumer Movements, Activism, and Ideology," *Journal of Consumer Research,* 31 (3), 691-704. doi: 10.1086/425104.

Kozinets, Robert V. (2008), "Technology/Ideology: How Ideological Fields Influence Consumers' Technology Narratives," *Journal of Consumer Research,* 34 (6), 865-881. doi: 10.1086/523289.

Kozinets, Robert V., Kristine de Valck, Andrea C. Wojnicki, and Sarah J. S. Wilner (2010), "Networked Narratives: Understanding Word-of-Mouth Marketing in Online Communities," *Journal of Marketing*, 74 (2), 71-89.

Kozinets, Robert, Anthony Patterson, and Rachel Ashman (2017), "Networks of Desire: How Technology Increases Our Passion to Consume," *Journal of Consumer Research*, 43 (5), 659-682. doi: 10.1093/jcr/ucw061.

Lanier, Jaron (2014), *Who Owns The Future?*, New York: Simon and Schuster.

Lastovicka, J. L., & Fernandez, K. V. (2005), "Three Paths to Disposition: The Movement of Meaningful Possessions to Strangers" *Journal of Consumer Research*, 31(4), 813–823.

Löfgren, O. (2017), "Mess: on domestic overflows." *Consumption Markets and Culture*, 20(1), 1–6.

Löfgren, Orvar (2012), "It's Simply too much! Coping with Domestic Overflow," in *Managing Overflow in Affluent Societies*, eds. Barbara Czarniawska and Orvar Löfren, London: Routledge, 101-124.

Lupton, Deborah (2015), *Digital Sociology*, New York: Routledge.

Luedicke, M. K. (2015), "Indigenes' Responses to Immigrants' Consumer Acculturation: A Relational Configuration Analysis", *Journal of Consumer Research*, 42(1), 109–129.

MacVean, M. (2014), "For many people, gathering possessions is just the stuff of life", Retrieved September 10, 2018, from http://articles.latimes.com/2014/mar/21/health/la-he-keeping-stuff-20140322

Martin, D. M., & Schouten, J. W. (2014), "Consumption-Driven Market Emergence", *Journal of Consumer Research*, 40(5), 855–870.

McCracken, G. (1986), "Culture and Consumption: A Theoretical Account of the Structure and Movement of the Cultural Meaning of Consumer Goods," *Journal of Consumer Research*, 13(1), 71.

McCracken, Grant (1988), *The Long Interview*, Newbury Park, CA: Sage.

Mick, David Glen, and Susan Fournier (1998), "Paradoxes of Technology: Consumer Cognizance, Emotions, and Coping Strategies," *Journal of Consumer Research,* 25 (2), 123-143. doi: 10.1086/209531.

Miller, Daniel (2008), *The Comfort of Things*, Cambridge, UK: Polity.

Molla, Rani (2020), "Why Your Free Software Is Never Free." *Vox*, January 29, 2020.https://www.vox.com/recode/2020/1/29/21111848/free-software-privacy-alternative-data

Moisio, Risto, Eric J. Arnould, and James W. Gentry (2013), "Productive Consumption in the Class-Mediated Construction of Domestic Masculinity: Do-It-Yourself (DIY) Home Improvement in Men's Identity Work," *Journal of Consumer Research*, 40 (2), 298-316.

Newport, Cal (2019), *Digital Minimalism: Choosing a Focused Life in a Noisy World*, New York: Portfolio/Penguin.

O'Guinn, Thomas C. and Ronald J. Faber (1989), "Compulsive Buying: A Phenomenological Exploration," *Journal of Consumer Research*, 16 (September), 147-157.

O'Neil, Cathy (2016), *Weapons of Math Destruction: How Big Data Increases Inequality and Threatens Democracy*, New York: Crown.

Penaloza, Lisa, and Linda L Price (1993), "Consumer Resistance: A Conceptual Overview," *ACR North American Advances*.

Phillips, B. J., & Sego, T. (2011), "The role of identity in disposal: Lessons from mothers' disposal of children's possessions," *Marketing Theory*, 11(4), 435–454.

Price, L. L., Arnould, E. J., & Folkman Curasi, C. (2000), "Older Consumers' Disposition of Special Possessions," *Journal of Consumer Research*, 27(2), 179–201.

Prior, Lindsey (1988), "The Architecture of the Hospital: A Study of Spatial Organization and Medical Knowledge," *The British Journal of Sociology*, XXXIX (1), 86-113.

Richins, Marsha L. and Scott Dawson (1992), "A Consumer Values Orientation for Materialism and Its Measurement: Scale Development and Validation," *Journal of Consumer Research*, 19 (December), 303-316.

Rook, Dennis W. (1987), "The Buying Impulse," *Journal of Consumer Research*, 14 (September) 189-199.

Rosen, Nick (2010), *Off The Grid: Inside the Movement for More Space, Less Government, and True Independence in Modern America*: Penguin.

Roster, C. A., Ferrari, J. R., & Peter Jurkat, M. (2016), "The dark side of home: Assessing possession "clutter" on subjective well-being," *Journal of Environmental Psychology*, 46, 32–41.

Roux, Dominique and Russell Belk (2019), "The Body as (Another) Place: Producing Embodied Heterotopias Through Tattooing," *Journal of Consumer Research*, 46 (3), 483-507.

Sandvig, Christian, Kevin Hamilton, Karrie Karahalios, and Cedric Langbort (2014), "Auditing Algorithms: Research Methods for Detecting Discrimination on Internet Platforms," *Data and Discrimination: Converting Critical Concerns into Productive Inquiry,* 22.

Schor, Juliet B (1998), *The Overspent American: When Buying Becomes You*, New York: Basic Books.

Schouten, J. W. (1991), "Selves in Transition: Symbolic Consumption in Personal Rites of Passage and Identity Reconstruction," *Journal of Consumer Research,* 17(4), 412.

Sherry, John F. (2000), "Place, Technology, and Representation," *Journal of Consumer Research*, 27 (2), 273-278.

Syvertsen, Trine, and Gunn Enli (2019), "Digital Detox: Media Resistance and the Promise of Authenticity," *Convergence,* 0 (0), 1-15. doi: 10.1177/1354856519847325.

Tian, Kelly, and Russell W. Belk (2005), "Extended Self and Possessions in the Workplace," *Journal of Consumer Research*, 32 (2), 297-310.

Thompson, C. J., & Haytko, D. L. (1997), "Speaking of Fashion: Consumers' Uses of Fashion Discourses and the Appropriation of Countervailing Cultural Meanings," *Journal of Consumer Research*, 24(1), 15–42.

Turkle, Sherry (2011), *Alone Together: Why We Expect More From Technology and Less From Each Other*, New York Basic Books.

Trudel, R., Arg, J. J., & Meng, M. D. (2016), "The recycled self: Consumers' disposal decisions of identity-linked products," *Journal of Consumer Research*, 43(2), 246–264.

Üstüner, Tuba, and Douglas B. Holt (2007), "Dominated Consumer Acculturation: The Social Construction of Poor Migrant Women's Consumer Identity Projects in a Turkish Squatter," *Journal of Consumer Research,* 34 (1), 41-56.

Van Ameringen, Michael, Beth Patterson, and William Simpson (2014), "DSM-5 obsessive-compulsive and related disorders: Clinical implications of new criteria," *Depression and Anxiety*, 31 (June), 487-493.

Wallendorf, Melanie, and Eric J. Arnould (1991), "'We Gather Together': Consumption Rituals of Thanksgiving Day," *Journal of Consumer Research*, 18 (1), 13-31.

Whybrow, Peter C. (2006), *American Mania: When More is Not Enough,* New York: W. W. Norton.

Williamson, Judith. (1985), *Consuming passions: The dynamics of popular culture*, London, UK: Marion Boyars.

Zanette, M. C., & Scaraboto, D. (2019), "From the corset to Spanx: shapewear as a marketplace icon," *Consumption, Markets, and Culture*, 22(2), 183–199.

Zuboff, Shoshana (2015), "Big Other: Surveillance Capitalism and the Prospects of an Information Civilization," *Journal of Information Technology,* 30 (1), 75-89.

Zuboff, Shoshana (2019), *The Age of Surveillance Capitalism: The Fight for a Human Future at the New Frontier of Power*, New York: Public Affairs.

Zuckerman, Ethan (2019), "Building a More Honest Internet: What would social media look like if it served the public interest?" *Columbia Journalism Review*, Fall 2019.https://www.cjr.org/special_report/building-honest-internet-public-interest.php

Want/Should Conflicts in Ourselves and Others

Chair: Shwetha Mariadassou, Stanford University, USA

Paper #1: To Look Good or to Be Good? Holding (but Hiding) Viceful Motivations for Health Goals

Stephanie C. Lin, INSEAD, Singapore

Kaitlin Woolley, Cornell University, USA

Peggy J. Liu, University of Pittsburgh, USA

Paper #2: No Diet, No Problem: Social Judgments of Consumers' Indulgences

Geoffrey R. O. Durso, DePaul University, USA

Kelly L. Haws, Vanderbilt University, USA

Paper #3: Customizing Algorithmic Recommendations to Actual and Ideal Preferences

Poruz Khambatta, Stanford University, USA

Shwetha Mariadassou, Stanford University, USA

Joshua I. Morris, Stanford University, USA

S. Christian Wheeler, Stanford University, USA

Paper #4: The Motivating Power of Streaks: Incentivizing Streaks Increases Engagement in Effortful Tasks

Katie S. Mehr, University of Pennsylvania, USA

Jackie Silverman, University of Delaware, USA

Marissa Sharif, University of Pennsylvania, USA

Alexandra Barasch, New York University, USA

Katherine L. Milkman, University of Pennsylvania, USA

SESSION OVERVIEW

People often face choices between what they *want* to do and what they think they *should* do. The aim of this session is to explore the consequences of this intrapersonal conflict and to address ways in which consumer behavior can be shifted to better align with what consumers think they should do. In particular, we consider this discrepancy from two angles: first, the impact of the discrepancy on interpersonal judgments and behaviors; and second, the potential nudges that can be utilized to encourage behaviors in line with the "should" self.

The session will open with two papers that examine the interpersonal consequences of want/should conflicts. The first paper will focus on how the want vs. should conflict influences consumers' public vs. private behavior. Specifically, **Lin, Woolley, and Liu** discuss self-discrepancy in health goal motivations. Across seven studies, they show that consumers hide their appearance motivations from others because they feel that they should be less driven by physical appearance than they actually are. In the second paper, **Durso and Haws** discuss observers' perceptions of an agent experiencing a want/should conflict. Whereas prior literature largely deems indulgences as normatively "bad," the authors show that indulgences still generally result in positive evaluations (albeit with greater ambivalence). Thus, they suggest that social judgments of indulgent behavior are less severe and more nuanced than consumers generally perceive them to be.

In line with this year's theme of integrating multiple paradigm perspectives, the final two papers in this session utilize unique methods to nudge consumers into pursuing actions in line with their "should" selves. The third paper, by **Khambatta, Mariadassou, Morris, and Wheeler,** utilizes machine learning models to generate real-time, personalized predictions tailored to consumers' actual or ideal preferences. The authors find that consumers who receive recommendations in line with their ideal (vs. actual) preferences are more likely to report that their time is well-spent after they follow the

recommendation and that they are better off as a result, demonstrating the effectiveness of personalized nudges in improving consumer well-being. Last, **Mehr, Silverman, Sharif, Barasch, and Milkman** take a behavioral economic approach by using an economic game to model the motivational power of attaining a streak. Across five studies, they find that streak-rewarding payments increase persistence in effortful tasks, even relative to higher-paying incentives. These results provide implications for assisting consumers in initiating and achieving "should" goals.

Combined, these four papers examine how want/should conflicts affect both self-presentation and interpersonal perception and also how firms can motivate behaviors in line with what consumers feel they should want. We believe that this session is well-suited to this year's theme of integrating multiple perspectives as these papers draw on a variety of different methods and literatures, including attitude discrepancies, signaling, goal pursuit, self-control, and nudges. We hope that this session will attract a diverse audience and provide fruitful discussion for innovative research regarding this fundamental conflict in consumer behavior.

To Look Good or to Be Good? Holding (but Hiding) Viceful Motivations for Health Goals

EXTENDED ABSTRACT

Academic research treats health behaviors (e.g., dieting, exercise) as virtuous (Berman and Small 2018; Dhar and Wertenbroch 2012; Khan, Dhar, and Wertenbroch 2005; Wertenbroch 1998). We challenge this healthy=virtuous assumption and propose that consumers believe that health behaviors can be vicefully motivated from a moral perspective, with implications for consumers' public (vs. private) consumption behaviors.

We propose that appearance motivations for health are viewed as relatively viceful, as they violate internally held moral values (e.g., humility, concern for society, Beatty et al. 1985; Gurel-Atay et al. 2010; Schwartz 1994) by reflecting excessive pride and self-involvement (Cafaro 2005; Netemeyer, Burton, and Lichtenstein 1995), and perpetuating unhealthy societal standards. However, given the prominence of idealized societal standards for beauty (Richins 1991), consumers cannot avoid internalizing appearance motivations, leading to a moral conflict: although they are actually motivated to engage in diet and exercise to improve their physical appearance, this violates their internally held moral values. We document this self-discrepancy and examine its implications for consumers' public (vs. private) behavior.

Studies 1a and 1b (pre-registered; Ns=86, 100) documented this moral conflict in Asian and Western populations. Participants viewed multiple motivations for pursuing health goals (physical appearance, long-term health, mental health, and physical capabilities). Participants reported how much each motivation reflected their "virtuous" and "actual" motivations. Participants believed that appearance was less virtuous than all other motivations, $ps<.02$. Furthermore, participants indicated that appearance motivations reflected their actual more than their virtuous motivations, $ps<.001$, revealing the predicted moral conflict; by contrast, all other motivations reflected their virtuous motivations equally or more than their actual motivations.

The remaining studies test implications of this self-discrepancy for consumers' public (vs. private) behavior. Because consumers are more likely to act in line with their virtuous "ought" self-standards

in public than private (Baumeister 1982; Goffman 1978; Gollwitzer and Wicklund 1982; Peloza, White, and Shang 2013), we predicted that consumers hide their non-virtuous appearance motivations from others.

Study 2a (pre-registered; N=326) tested the basic effect. Participants chose hashtags for two health photographs (food, gym) to post as part of a private or public review. Those who considered posting in private chose more appearance-related hashtags (e.g., #bikini-body) (M=1.35) than those posting in public (M=.98), p<.001.

Study 2b (N=302) examined real choice in the lab. Participants believed their choices would be observed live by others in the lab session or that they would be private. They chose three articles to read from a set of six (three appearance, three non-appearance) articles. Participants chose fewer appearance articles to read in public (M=1.24) than in private (M=1.50), p = .013.

In Study 3a (N=138), participants were randomly assigned to imagine posting to a private or public Pinterest board. They indicated their likelihood of posting three appearance-related articles (e.g., Beach Body Challenge) and three non-appearance-related articles (e.g., Strategies for Running). Participants were less likely to post appearance-related articles in the public condition (M=1.78) than the private condition (M=2.44), p=.039; this did not occur for non-appearance articles (M$_{public}$=2.91; M$_{private}$=2.90); $t_{interaction}$(296)=2.45, p=.014. We further assessed how much appearance motivations reflected participants' actual and virtuous motivations (as in studies 1a and 1b). This effect was stronger for those with more moral conflict (i.e., who had a greater discrepancy between how much appearance reflects their actual and virtuous motivations), $t_{interation}$(686)=2.00, p=.046.

Study 3b (pre-registered, N=401) examined posting behavior of real Pinterest users. Participants created real private and public boards for health articles. They chose three articles to post from six appearance or six non-appearance related articles, randomly assigned. Participants indicated whether they would post these articles to their private or public boards. Participants posted more pins to their private board when the posts were appearance-related (M=1.66) versus appearance-unrelated (M=1.08), p<.001. This effect was again (directionally) stronger for those higher in moral conflict, $t_{interation}$(397)=1.64, p=.101.

Study 4 (pre-registered, N=594) tested whether framing appearance as secondary to an overarching health motivation increases public sharing. Participants imagined receiving a discount for posting about a healthy meal plan subscription to Facebook. The post described appearance as a primary motivation ("We help you be healthier, so that you can achieve your ultimate goal to look good!"), secondary motivation ("We help you look good, so that you can achieve your ultimate goal of being healthier!"), or did not mention appearance ("We help you be healthier!"). Participants decided whether to incur (a real) 30-second cost to privatize the post (i.e., to make the post not viewable by Facebook friends). Participants privatized the post more in the appearance-primary condition (62.3%) than the other two conditions (collapsed 53.2%), p=.034.

Study 5 (N=324) tested whether people privatize their appearance motivations because they desire to act in line with their moral value systems. Participants were given an ostensibly real choice between two fitness subscription programs that would post daily workouts to their Facebook timelines: "Trim Body Program," (appearance) and "Heart Health Program" (non-appearance). Participants were assigned to one of three conditions: private, public, or private-with-values-reminder. Those in the private-with-values-reminder condition first wrote about why they should or ought to pursue their health goals, as dictated by their moral values. Those in the public

condition were told that the program title would be visible to others. Those in the private conditions were told the workout would appear with a generic "Your Fitness Program" title. Participants were more likely to choose the appearance program in the private condition (56.48%) than either the public (41.28%), p=.026, or private-with-values-reminder (42.99%), p=.049, conditions.

Overall, this research contributes theoretically to the vice-virtue literature, challenging the notion that health pursuits are inherently virtuous. This research also offers practical implications for how marketers should frame health programs to encourage private attention versus public sharing.

No Diet, No Problem: Social Judgments of Consumers' Indulgences

EXTENDED ABSTRACT

How do people judge the consumer who indulges however they "want", rather than restricts as they "should"? Consumption decisions are a common basis for rendering judgments about oneself and others (Belk 1988; Vartanian, Herman and Polivy 2007), especially when decisions involve conflict (i.e., ambivalent feelings; Durso, Brinol and Petty 2016; Keller and Siegrist 2015; Ramanathan and Williams 2007). Research on self-control conflicts and "hedonic consumption," however, has often made strong assumptions that indulgences (e.g., eating pizza) are normatively "bad" whereas restrictions (eating salad) are "good" (Haws, Davis and Dholakia 2016; Shiv and Fedorikhin 1999; cf. Vosgerau, Scopelliti and Huh 2020).

Do consumers evaluate others' indulgent "wants" so negatively compared to restrictive "should" choices? Or, similar to many judgments of their own decision conflicts, do consumers instead feel *ambivalent* about others' indulgences? If so, when? This is critical for predicting consumer behavior, as social judgments of *others* provide invaluable information toward understanding *personal* self-control decisions (Fishbach, Eyal and Finkelstein 2010).

We examine these questions here. Across three studies, participants learned about a target, "Bob," who eats indulgently or restrictively. We manipulated the presence versus absence of a dieting goal (Study 1), the relevance of the behavior (eating vs. spending) to a dieting goal (Study 2), and whether an extraordinary opportunity was present or not (Study 3) when Bob indulged. We focus on two outcomes: How is Bob evaluated (positively vs. negatively), and how ambivalent (e.g., conflicted) do they feel about him?

In Study 1, we examined judgments of Bob in a 2 (dieting goal: present vs. absent) x 2 (behavior: indulgent vs. restrictive) between-participants design. Our findings revealed significant interactions on evaluations, F(1,403)=52.43, and ambivalence, F(1,403)=38.77, ps<.001. *Absent* a diet, evaluations were equally positive whether Bob indulged on pizza (M=7.90) or restricted by eating salad (M=8.22), t(200)=1.30, p=.195. Ambivalence was marginally greater when he indulged (M=4.35) versus restricted (M=3.73), t(200)=1.76, p=.079.

When dieting was *present*, however, evaluations were less positive following indulgence (M=6.31) versus restriction (M=9.25), t(203)=11.48, p<.001. Ambivalence was greater when he indulged (M=6.67) versus restricted (M=3.16), t(203)=11.33, p<.001. In all, participants evaluated Bob less positively (and more ambivalently) when he indulged (vs. restricted) when dieting goals were present. However, Bob was judged equally positively *absent* a dieting goal, regardless of indulging versus restricting.

In Study 2, we examined whether evaluations and ambivalence toward Bob might differ as a function of normative indulgence versus restriction, but now depending on whether his behavior was relevant or irrelevant to dieting in particular. Prior research suggests that

self-control often manifests domain-specifically (Haws et al. 2016) rather than generally (cf. Tangney et al. 2004). As such, Bob was always presented as dieting, but was observed either as eating (goal-relevant) or spending (goal-irrelevant) in a normatively indulgent or restrictive manner.

Results revealed that significant interactions of context (eating vs. spending) by behavior (indulgent vs. restrictive) again emerged on evaluations, $F(1,403)=71.09$, and ambivalence, $F(1,403)=40.94$, ps<.001. Spending was evaluated equally positively regardless of its normative indulgence (buying designer clothing with next-day delivery; M=8.09) or restriction (saving it on his wish list; M=8.43), $t(201)=1.43$, p=.155, with equal ambivalence (Ms=4.27, 4.61), $t(201)=0.98$, p=.328.

When eating, however, his indulgence (ordering "loaded fries") was evaluated less positively (M=6.18) and more ambivalently (M=6.29) than restriction (ordering salad; Ms=9.35, 2.84), ts(202)=13.26, 10.45, ps<.001. Thus, while participants had less positive evaluations (and more ambivalence) toward Bob when he indulged (vs. restricted) in his food choice, this was *not* the case when Bob indulged or restricted himself when *spending* (goal-irrelevant), where he was viewed equally positively and (un)ambivalently.

Finally, in Study 3 we tested another boundary condition by providing a rationalization for indulgent behavior within the domain of dieting. In this case, Bob was *always dieting and always indulging* as in Study 2—whether his indulgence was goal-relevant (eating) or not (spending) and whether his birthday was mentioned (vs. unmentioned) were manipulated orthogonally. Significant interactions of context (eating vs. spending) by situation (birthday vs. unmentioned) emerged on evaluations, $F(1,395)=11.86$, p=.001, and ambivalence, $F(1,395)=5.47$, p=.020. When Bob shopped indulgently, evaluations were equally positive whether his birthday was not mentioned (M=8.45) or mentioned (M=8.47), $t(197)=0.12$, p=.907, with equally low ambivalence (Ms=3.84, 3.91), $t(197)=0.21$, p=.836.

When Bob *ate* indulgently, however, evaluations were less positive when his birthday was not mentioned (M=5.76) versus mentioned (M=6.98), $t(198)=4.45$, p<.001, and reflected greater ambivalence (Ms=6.33, 5.29), $t(198)=3.08$, p=.002. As such, we again found that when the behavior was unrelated to the stated goal, participants evaluated Bob equally positively and with low ambivalence. But, when an extraordinary circumstance was provided (versus not provided), even indulgent behavior directly in contrast to a stated goal was more positively evaluated and with less ambivalence.

In sum, contrary to common assumptions that indulgences represent normatively negative outcomes—via established perspectives in self-control, hedonic consumption, and licensing (Vosgerau et al. 2020)—these studies reveal that even indulgences result in positive evaluations overall. More specifically, the degree of positivity and ambivalence were found to vary as a function of relevant goal information being present versus absent (Study 1) and whether the dieting target indulged in a relevant (eating) or not (shopping) manner (Study 2). Even an extraordinary situational attribution used explicitly to justify the indulgence (Study 3) *improved* evaluations while reducing ambivalence, rather than being negatively evaluated as "excuse-making" (Kivetz and Zheng 2006).

Variation in ambivalence is an especially interesting contribution from these studies, as this is a critical and unique predictor of decision making and social comparison compared with outright negativity (Durso et al. 2016; Petty 2006; van Harreveld et al. 2009; Zemborain and Johar 2007), with clear implications for self-control (Keller and Siegrist 2015). This represents an unappreciated discrepancy between what consumers (and researchers) have characterized as a supposedly "negative" outcome of indulgence based on how

they *ought* to behave (prudently) compared to how they *desire* to behave (indulgently). Overall, we suggest that social judgments of others indulgent behaviors are perhaps less severe and more nuanced than has been assumed.

Customizing Algorithmic Recommendations to Actual and Ideal Preferences

EXTENDED ABSTRACT

Many of people's decisions for what to read, what to watch, where to eat, and what to buy are made on digital platforms. Given the abundance of available options, algorithms often curate the choice set presented to consumers by learning consumers' preferences and providing them with recommendations. Such recommendations can be helpful but can sometimes increase risks to consumer well-being, particularly in cases of biased recommendations (Banker and Khetani 2019; Yeomans et al. 2019). An additional challenge these algorithms face is that consumers often demonstrate discrepancies between what they *actually* want and what they *ideally* want. For instance, consumers might actually want to read about celebrity gossip but ideally want to learn more about personal finance. Both evaluations have been shown to independently influence subsequent information processing and behavior (DeMarree et al. 2017; DeMarree et al. 2014; Milkman, Rogers, and Bazerman 2009).

In this research, we expand on the effectiveness of personalized nudges (Peer et al. 2019) and show that the decisions of recommendation algorithms regarding which types of preferences to target can have important consequences for individuals' consumption patterns and consumer well-being. Specifically, we examine how people respond to personalized recommendations tailored to actual preferences versus ideal preferences. To test this, we built an online recommendation agent that inferred consumer preferences using pre-trained machine learning models hosted on a cloud computing platform.

In the training study (N = 1,003), we collected the data needed to generate machine learning model predictions. We collected participants' actual and ideal preferences for stimuli from a naturalistic context: articles posted on Twitter. For 52 tweets about news articles, we asked participants how likely they were to read each article now and how likely they were to read each article later on 100-point slider scales. Additionally, participants reported how much they actually and ideally wanted to read each article. Using data from these participants, we built machine learning models (random forests) to predict actual and ideal ratings for the ten articles with the largest preference discrepancies. To evaluate the accuracy of our models, we used 10-fold cross-validation, a method in which we generated predictions for 10% of the data at a time using the remaining 90% of the data to train the models. We evaluated the accuracy by comparing the predicted and true values using the following metrics: the average correlations (r), the square root of the average squared difference (*RMSE*), and the average absolute difference (*MAE*). The average accuracy (r) for actual ratings was 0.54 (*RMSE* = 29.93, *MAE* = 25.15), and the average accuracy for the ideal ratings was 0.60 (*RMSE* = 29.52, *MAE* = 24.36). We used these models to generate real-time predictions in the main study.

In the main, pre-registered study (N = 6,488), participants were presented with 42 tweets about news articles and reported how likely they were to read each article now and later. Employing an online cloud computing platform, we used our previously validated machine learning models to generate a real-time personalized recommendation for each participant based on their responses. The study employed three conditions. Participants in the actual (*ideal*) condi-

tion received a recommendation for the article that we predicted they actually (*ideally*) wanted to read the most from the set of ten possible articles. Participants in the control condition were recommended a randomly selected article from the set of ten articles. Participants were asked to report their reactions to the recommendations and were asked if they would rather read their recommended article or an alternative article. Nevertheless, to avoid self-selection effects, all participants read their recommended article and subsequently reported their reactions to the article.

For our initial analysis, we compared both the actual and ideal conditions to the control condition. We found that customized recommendations (vs. random recommendations) resulted in more favorable impressions of the recommendation system and the article along all reported measures. This confirms that the recommendations were customized to participants' unique preferences.

For our primary analysis, we compared the actual and ideal conditions to each other. As predicted, participants whose recommendations aligned with their actual preferences were more likely to choose to read the article than participants whose recommendations aligned with their ideal preferences (52% vs. 40%, $p < .001$). These participants also found more pleasure in reading the article: they reported that they liked reading the article more ($M_{actual} = 4.12$, $M_{ideal} = 3.77$, $p < .001$) and found the article more enjoyable than participants in the ideal condition ($M_{actual} = 4.02$, $M_{ideal} = 3.52$, $p < .001$). However, participants in the ideal condition found the recommendations to be more helpful ($M_{actual} = 3.83$, $M_{ideal} = 4.32$, $p < .001$) than participants in the actual condition and also felt more positively about the recommendation agent. They were more likely to report that the organization generating the recommendation had people's best interest at heart ($M_{actual} = 3.43$, $M_{ideal} = 4.02$, $p < .001$). Finally, after reading the recommended articles, participants who received recommendations tailored to their ideal preferences were more likely to report that their time was well-spent ($M_{actual} = 3.87$, $M_{ideal} = 4.26$, $p < .001$) and that they were better off as a result ($M_{actual} = 3.20$, $M_{ideal} = 4.91$, $p < .001$). Perhaps most importantly for a recommendation service, contrary to the notion that companies must exploit people's actual preferences to increase engagement, we found that those who received recommendations in line with their ideal preferences were more inclined to use the recommendation service again ($M_{actual} = 3.48$, $M_{ideal} = 3.30$, $p = .028$). These results were robust to analyzing the data of only participants who self-selected to read the article.

In conclusion, this research suggests that, rather than exploit people's base desires and recommend content they want to consume (but wish they did not), organizations can benefit from training recommendation algorithms to cater to people's ideal preferences. In doing so, they can also improve overall consumer well-being by assisting individuals in narrowing the gap between who they are and who they ideally want to be.

The Motivating Power of Streaks: Incentivizing Streaks Increases Engagement in Effortful Tasks

EXTENDED ABSTRACT

When faced with a choice between instantly-gratifying distractions (e.g., watching television, browsing Facebook) and exerting effort to obtain delayed rewards (e.g., studying for tests, staying focused at the office), people often favor distractions, only to later regret their choices (Bazerman, Tenbrunsel, and Wade-Benzoni 1998; Kotabe and Hofmann 2015; Milkman, Rogers, and Bazerman 2008; Thaler and Shefrin 1981). One way to increase engagement in effortful behaviors is to make initiation of goal-related behaviors more appealing (Milkman, Minson, and Volpp 2014). Across five incen-

tive-compatible, pre-registered experiments, we find that encouraging consumers to complete streaks via incentives (i.e., paying people for completing three or more effortful tasks consecutively) increases engagement in effortful tasks because doing so feels more game-like.

In Study 1, participants (N=1,104) made five decisions to either engage in a lengthy, effortful task for a bonus payment (looking up the definition of three words) or a shorter, fun task (watching a clip of a popular television show) without a bonus. In the streak-rewarding payment condition, participants were paid for choosing to complete vocabulary tasks consecutively. Participants received a lower reward for the first vocabulary task they completed, then a higher amount for the second and third vocabulary tasks they completed in a row, but returned to lowest amount for the next vocabulary task completed after watching a video. In the flat payment condition, participants received the maximum payment amount from the streak-rewarding payment condition each time they completed a vocabulary task; thus, holding the number of vocabulary tasks completed constant, payment in the flat payment condition was always larger than payment in the streak payment condition. Using a t-test, we found that participants in the streak-rewarding payment condition completed significantly more vocabulary tasks ($M = 2.65$, $SD = 2.30$) than those in the flat payment condition ($M = 2.15$, $SD = 2.17$; $d = 0.22$, $t(1068.1) = 3.69$, $p < .001$).

In Study 2 (N = 421), all participants made 10 choices between completing CAPTCHA tasks (decoding 6 CAPTCHAs) and watching funny videos. Payment amount was varied to establish robustness. Using linear regressions, we found that participants in the streak-rewarding payment condition completed more CAPTCHA tasks ($M = 6.36$, $SD = 3.82$) than those in the flat payment condition ($M = 5.40$, $SD = 4.04$; $b = 1.04$, $t(418) = 2.77$, $p = .006$), and there was no significant interaction with incentive size ($b = 0.93$, $t(417) = 1.23$, $p = .218$). Thus, regardless of magnitude, streak-rewarding incentives encouraged participants to complete more unappealing tasks than larger, flat incentives.

In Studies 3 and 4, we use the same basic paradigm to test which features of streak-rewarding payments lead participants to complete more effortful tasks. In Study 3 (N=712), we compare the two earlier conditions to an increasing payment scheme (i.e., increasing payments for completing non-consecutive CAPTCHA sets). We replicated our finding that streak-rewarding payments ($M = 6.71$, $SD = 3.43$) outperformed flat payments ($M = 5.38$, $SD = 4.29$; $b = 1.33$, $t(709) = 3.62$, $p < .001$). In addition, participants in the streak-rewarding payment condition completed more CAPTCHA sets than those in the increasing-payment condition ($M = 5.98$, $SD = 3.71$; $b = 0.74$, $\chi^2 = 4.76$ $p = .029$), and there was a marginally significant difference between the flat and increasing payment conditions ($b = 0.60$, $t(709) = 1.70$, $p = .089$). Thus, the increasing nature of streak-rewarding payments does not explain the observed difference between streak-rewarding and flat payments.

In Study 4 (N=702), we examine the costly nature of skipping a CAPTCHA set by adding a third streak-without-penalty condition in which payments remained the same, instead of decreasing, after a skipped CAPTCHA task. Again, streak-rewarding payments ($M = 7.03$, $SD = 3.34$) outperformed flat payments ($M = 5.89$, $SD = 4.25$; $b = 1.15$, $t(699) = 3.36$, $p < .001$). Additionally, there was no difference between performance in the streak-without-penalty condition ($M = 6.88$, $SD = 3.38$) and our standard streak-rewarding payment condition ($b = 0.16$, $\chi^2 = 0.18$, $p = .670$). This suggests that decreasing payments after a broken streak is not necessary to harness the motivating power of streak-rewarding payments.

In Study 5 (N = 1,204), we test if streak-rewarding incentives increase persistence in effortful tasks because they make the tasks

more game-like. Participants were again randomly assigned to either the streak-rewarding or flat payment condition. After completing the tasks, participants were asked two items regarding the extent to which the tasks felt game-like (e.g., how much completing the survey felt like a game; $r = .74$). Importantly, we once again replicated the effect of payment condition on number of tasks completed ($M_{\text{streak-rewarding}} = 5.25$, $SD = 4.12$ vs. $M_{\text{flat}} = 4.52$, SD =4.10; $b = 0.727$, $t(1201.90) = -3.07$, $p = .002$). Averaging responses to both questions, participants in the streak-rewarding payment condition indicated that the study felt marginally more game-like ($M = 3.98$, $SD = 2.12$) than those in the flat payment condition ($M = 3.74$, $SD = 1.96$; $d = 0.12$, $t(974.75) = 1.87$, $p = .061$). We also found that the positive effect of the streak-rewarding payments on number of tasks completed was mediated at the 90% confidence level by how game-like the tasks felt (indirect effect = .13, 95% CI = [-0.004, 0.14]; 90% CI = [0.01, 0.25]).

In sum, our work suggests that incentivizing consumers to initiate streaks can increase persistence in effortful tasks, even relative to higher-paying incentives. The results of our research have several practical implications. For example, marketers can offer incentives that encourage streaks via loyalty programs to increase consumer engagement at a lower cost. More broadly, policy makers could harness the power of encouraging streaks to help people initiate and meet important goals, such as those related to health and savings.

REFERENCES

Banker, Sachin, and Salil Khetani (2019), "Algorithm Overdependence: How the Use of Algorithmic Recommendation Systems Can Increase Risks to Consumer Well-Being," *Journal of Public Policy & Marketing*, 38(4), 500-515.

Baumeister, Roy F. (1982), "A Self-Presentational View of Social Phenomena," *Psychological Bulletin*, 91(1), 3–26.

Bazerman, Max H., Ann E. Tenbrunsel, and Kimberly Wade-Benzoni (1998), "Negotiating with Yourself and Losing: Making Decisions with Competing Internal Preferences," *The Academy of Management Review*, *23*(2), 225–241.

Beatty, Sharon E., Lynn R. Kahle, Pamela Homer, and Shekhar Misra (1985), "Alternative Measurement Approaches to Consumer Values: The List of Values and the Rokeach Value Survey," *Psychology and Marketing*, 2(3), 181–200.

Belk, Russell W. (1988), "Possessions and the Extended Self," *Journal of Consumer Research,* 15 (2), 139-168.

Berman, Jonathan Z. and Deborah A. Small (2018), "Discipline and Desire: On the Relative Importance of Willpower and Purity in Signaling Virtue," *Journal of Experimental Social Psychology*, 76, 220–30.

Cafaro, Philip (2005), "Gluttony, Arrogance, Greed, and Apathy: An Exploration of Environmental Vice," in *Environmental Virtue Ethics*, eds. Ronald Sandler and Philip Cafaro, New York and Oxford, 135–58.

DeMarree, Kenneth G., Cory J. Clark, S. Christian Wheeler, Pablo Briñol, and Richard E. Petty (2017), "On the Pursuit of Desired Attitudes: Wanting a Different Attitude Affects Information Processing and Behavior," 70, 129–42.

DeMarree, Kenneth G., S. Christian Wheeler, Pablo Briñol, and Richard E. Petty (2014), "Wanting Other Attitudes: Actual–Desired Attitude Discrepancies Predict Feelings of Ambivalence and Ambivalence Consequences," 53, 5–18.

Dhar, Ravi and Klaus Wertenbroch (2012), "Self-Signaling and the Costs and Benefits of Temptation in Consumer Choice," *Journal of Marketing Research*, 49(1), 15–25.

Durso, Geoffrey R.O., Pablo Briñol, and Richard E. Petty (2016), "From Power to Inaction: Ambivalence Gives Pause to the Powerful," *Psychological Science*, 27 (12), 1660-1666.

Dweck, Carol S., and Ellen L. Leggett (1988), "A Social-Cognitive Approach to Motivation and Personality," *Psychological Review,* 95 (2), 256-273.

Festinger, Leon (1954), "A Theory of Social Comparison Processes," *Human Relations* 7 (2), 117-140.

Fishbach, Ayelet, Tal Eyal, and Stacey R. Finkelstein (2010), "How Positive and Negative Feedback Motivate Goal Pursuit," *Social and Personality Psychology Compass* 4 (8), 517-530.

Goffman, Erving (1978), *The Presentation of Self in Everyday Life*, London: Harmondsworth.

Gollwitzer, Peter M. and Robert A. Wicklund (1982), "Admission of Failure and Symbolic Self-Completion: Extending Lewinian Theory," *Journal of Personality and Social Psychology*, 43(2), 358–71.

Gurel-Atay, Eda, Guang-Xin Xie, Johnny Chen, and Lynn Richard Kahle (2010), "Changes in Social Values in the United States: 1976–2007," *Journal of Advertising Research*, 50(1), 57–67.

Haws, Kelly L., Scott Davis, and Utpal Dholakia (2016), "Salad = Success and Fries = Failure? Conceptualizing and Assessing Self-Control Outcome Measures in Food Decision-Making Research," *Journal of Consumer Behaviour* 15 (2), 99-116.

Keller, Carmen, and Michael Siegrist (2015), "Does Personality Influence Eating Styles and Food Choices? Direct and Indirect effects," *Appetite*, 84, 128-138.

Khan, Uzma, Ravi Dhar, and Klaus Wertenbroch (2005), "A Behavioral Decision Theoretic Perspective on Hedonic and Utilitarian Choice," in *Inside Consumption: Frontiers of Research on Consumer Motives, Goals, and Desires*, eds. S Ratneshwar and David Glen Mick, New York, NY: Routledge, 144–165.

Kivetz, Ran, and Itamar Simonson (2002), "Self-Control for the Righteous: Toward a Theory of Precommitment to Indulgence," *Journal of Consumer Research*, 29 (2), 199-217.

Kivetz, Ran, and Yuhuang Zheng (2006), "Determinants of Justification and Self-Control," *Journal of Experimental Psychology: General*, 135 (4), 572-587.

Kotabe, Hiroki P., and Wilhelm Hofmann (2015), "On Integrating the Components of Self-Control," *Perspectives on Psychological Science*, *10*(5), 618–638.

Milkman, Katherine L., Julia A. Minson, and Kevin GM Volpp (2014), "Holding the Hunger Games Hostage at the Gym: An Evaluation of Temptation Bundling," *Management Science*, 60(2), 283–299.

Milkman, Katherine L., Todd Rogers, and Max H. Bazerman (2008), "Harnessing Our Inner Angels and Demons: What We Have Learned About Want/Should Conflicts and How That Knowledge Can Help Us Reduce Short-Sighted Decision Making," *Perspectives on Psychological Science*, 3(4), 324–38.

Milkman, Katherine L., Todd Rogers, and Max H. Bazerman (2009), "Highbrow films gather dust: Time-inconsistent preferences and online DVD rentals," Management Science, 55(6), 1047-1059.

Netemeyer, Richard G., Scot Burton, and Donald R. Lichtenstein (1995), "Trait Aspects of Vanity: Measurement and Relevance to Consumer Behavior," *Journal of Consumer Research*, 21(4), 612–26.

Peloza, John, Katherine White, and Jingzhi Shang (2013), "Good and Guilt-Free: The Role of Self-Accountability in Influencing Preferences for Products with Ethical Attributes," *Journal of Marketing*, 77(1), 104–9.

Peer, Eyal, Serge Egelman, Marian Harbach, Nathan Malkin, Arunesh Mathur, and Alisa Frik (2019), "Nudge Me Right: Personalizing Online Nudges to People's Decision-Making Styles," working paper. *Available at SSRN 3324907.*

Petty, Richard E (2006), "A Metacognitive Model of Attitudes," *Journal of Consumer Research* 33 (1), 22-24.

Ramanathan, Suresh, and Patti Williams (2007), "Immediate and delayed emotional consequences of indulgence: The moderating influence of personality type on mixed emotions," *Journal of Consumer Research* 34(2), 212-223.

Richins, Marsha L. (1991), "Social Comparison and the Idealized Images of Advertising," *Journal of Consumer Research*, 18(1), 71–83.

Schwartz, Shalom H. (1994), "Are There Universal Aspects in the Structure and Contents of Human Values?," *Journal of Social Issues*, 50(4), 19–45.

Shiv, Baba, and Alexander Fedorikhin (1999), "Heart and Mind in Conflict: The Interplay of Affect and Cognition in Consumer Decision Making," *Journal of Consumer Research*, 26 (3), 278-292.

Tangney, June P., Roy F. Baumeister, and Angie Luzio Boone (2004), "High Self-Control Predicts Good Adjustment, Less Pathology, Better Grades, and Interpersonal Success," *Journal of Personality*, 72 (2), 271-324.

Thaler, Richard H., and Hersh M. Shefrin (1981), "An Economic Theory of Self-Control," *Journal of Political Economy,* 89(2), 392–406.

Van Harreveld, Frenk, Bastiaan T. Rutjens, Mark Rotteveel, Loran F. Nordgren, and Joop Van Der Pligt (2009), "Ambivalence and Decisional Conflict as a Cause of Psychological Discomfort: Feeling Tense Before Jumping Off the Fence," *Journal of Experimental Social Psychology*, 45 (1), 167-173.

Vartanian, Lenny R., C. Peter Herman, and Janet Polivy (2007), "Consumption Stereotypes and Impression Management: How You Are What You Eat," *Appetite*, 48 (3), 265-277.

Vosgerau, Joachim, Irene Scopelliti, and Young Eun Huh (2020), "Exerting Self-Control ≠ Sacrificing Pleasure," *Journal of Consumer Psychology*, DOI: 10.1002/jcpy.1142.

Wertenbroch, Klaus (1998), "Consumption Self-Control by Rationing Purchase Quantities of Virtue and Vice," *Marketing Science*, 17(4), 317–37.

Yeomans, Michael, Anuj Shah, Sendhil Mullainathan, and Jon Kleinberg (2019), "Making sense of recommendations," *Journal of Behavioral Decision Making*, 32(4), 403-414.

Zemborain, Martin R., and Gita Venkataramani Johar (2007), "Attitudinal Ambivalence and Openness to Persuasion: A Framework for Interpersonal Influence," *Journal of Consumer Research*, 33 (4), 506-514.

Conspicuous Consumption: Signaling and Compensatory Motivations

Chair: Didem Kurt, Northeastern University, USA

Paper #1: I am Product, Hear Me Roar: Social Dominance and Preference for Loud Products

Michael Lowe, Georgia Tech, USA
Morgan Ward, Emory University, USA
Cem Ozturk, Georgia Tech, USA

Paper #2: Obesity and Compensatory Consumption: Evidence from Jewelry Shopping

Didem Kurt, Northeastern University, USA

Paper #3: Conspicuously Insecure: When Conspicuous Consumption Backfires

Sean Blair, Georgetown University, USA
Derek D. Rucker, Northwestern University, USA
Monika Lisjak, Arizona State University, USA

Paper #4: Luxury and Consumer Well-being: Using Luxury Products Impairs Women's Self-Control

Yajin Wang, University of Maryland, USA
Deborah Roedder John, University of Minnesota, USA

SESSION OVERVIEW

Conspicuous consumption has been on the rise around the world (Deloitte, 2019). Some consumers buy visible and expensive products to communicate their social status (Han et al. 2010), while others are motivated to bridge the gap between their current and ideal selves through such purchases (Mandel et al., 2017). This special session comprises four papers that examine the causes and consequences of status signaling via product purchases and compensatory aspect of conspicuous consumption. The session broadly contributes to our understanding of how consumers' self-discrepancies affect conspicuous consumption activity, and whether consumers' status signaling efforts actually work and at what cost. The session also helps expand the current scope of research on status-driven and compensatory consumption by examining novel characteristics such as product noise and body-related products as well as by investigating some unintended social and personal implications of engaging in such consumption activity.

The first paper by Lowe, Ward and Ozturk analyzes the status signaling effect of product noise. This examination is important because related research to date has focused primarily on the role of product visibility and brand in status signaling. The authors demonstrate that a product's sound also plays an important role how observers make inferences about consumers' personal qualities and status. Specifically, the authors find that relatively louder products help consumers signal their social dominance to others, whereas relatively quieter products communicate social prestige.

The second paper by Kurt examines the compensatory consumption motivation behind people's jewelry purchases. Based on the compensatory consumer behavior model, this paper argues that jewelry shopping interest and spending will be higher in places with greater obesity rate because wearing jewelry can help people feel better about their looks and reduce their appearance-related self-discrepancy. The data obtained from Google Trends, the U.S. Economic Census on jewelry retail sales, the U.S. Consumer Expenditure Survey, and Twitter support this theory.

The third paper by Blair, Rucker and Lisjak highlights the risk that observers may actually perceive conspicuous consumption as a compensation for one's insecurities rather than as a signal of their achievements. This risk, however, depends on observers' feelings of insecurity. The authors show that when observers feel insecure about their power, they perceive the driver of a more conspicuous car as having lower status than that of a less conspicuous car. As such, taking the perspective of an observer helps consumers realize this unexpected consequence of conspicuous consumption (i.e., being seen as engaging in compensatory consumption), preventing them from paying a premium for a conspicuous item when they feel insecure.

Finally, the fourth paper by Wang and John demonstrates another unwanted cost of conspicuous consumption: self-control impairment after the use of luxury products. The authors argue that using luxury products makes women feel more entitled to fulfill their wants, resulting in lower self-control. Their experiments involving the use of real luxury products and consumption of unhealthy snack lend support for their thesis.

Overall, this session brings together papers that use a variety of methods—experiments, field studies, and archival data analysis— to shed more light on the benefits and costs of conspicuous consumption and status signaling via product purchases.

I am Product, Hear Me Roar: Social Dominance and Preference for Loud Products

EXTENDED ABSTRACT

A billboard advertising Porsche shows a picture of the iconic luxury car and the words "*IT'S LOUD*." On the other hand, Bosch, a luxury appliance brand, positions its dishwasher as the 'quietest model' in the US. It is evident that the sounds products emit contribute to consumers' perceptions of them. In this research, we examine how products' auditory noises function as signals of status.

Expressions of dominance and prestige represent social strategies used to achieve status within a group. The dominance-prestige account of status-striving (Henrich and Gil-White 2001) suggests that social hierarchies arise from two systems of rank allocation: prestige and dominance. The theory states that individuals may increase their social status by engaging in behaviors that express one or both of these qualities. Expressing dominance usually entails behaviors that induce fear through intimidation (Chase et al. 2002), while expressing prestige refers to individuals who influence others by being "considered worthy of emulation" for their skills, access to material resources, or knowledge (Cheng et al. 2013, pg. 105; Cheng and Tracy 2014).

In this research, we relate loud and quiet sounds to these two status-striving strategies. Prior research on non-human primates has established that having a particularly loud call or roar may establish an animal as being more dominant and consequently, having higher status within the pack (Neumann et al., 2010; Kitchen et al., 2003). Likewise, amongst humans, speaking louder or in a deeper voice may afford one a more dominant position in a group (Carney 2020), however, status may also be conferred to those who speak quietly insofar as it signals the refined demeanor of the speaker. To be sure, quiet sounds are more easily ignored or overlooked than loud sounds, however, they are equally effective at signaling product attributes, including high quality (Lageat, Czellar, and Laurent 2003).

Because consumers use products strategically to send desired social signals about themselves, we predict that consumers wishing to express dominance will show a marked preference for louder product sounds, while those wishing to express prestige will prefer quieter products.

The purpose of Study 1 is to demonstrate that using loud products serves as a signal of social dominance, but not necessarily of social prestige. In a 2 (product: loud vs. quiet) by 2 (user intent: purposeful vs. unintended) factorial design, participants imagined observing another individual using a product in public (a truck or a radio). In one condition, participants read that this product was extremely loud, while in the other condition the product is described as quiet. Participants also read that the reason for the unusual volume of the product was either intentional on the part of the driver (a purposeful modification or setting), or unintentional (the result of manufacturer's setting). After reading the scenario, participants were asked about their impressions of the other consumer (i.e. likeable, dominant, submissive, humble, aggressive, high-status, and important they perceived this consumer to be).

An ANOVA interacting intent and product loudness on perceived social dominance was significant ($F(1,443) = 5.66$, $p = .018$). Specifically, when the volume of the product was seen as unintentional, there was no difference between the loud and quiet conditions ($M_{Loud} = 3.61$, $M_{Quiet} = 3.58$; $F(1,443) = .018$, $p = .89$). When product volume was seen as intentional, however, there was a significant difference in perceptions of social dominance between two conditions such that the individual was seen as more dominant when the individual used the louder product ($M_{Loud} = 4.61$, $M_{Quiet} = 3.95$; $F(1,443) = 12.08$, $p = .001$).

In Study 2, we tested whether consumers use auditory sounds to express social status. First, student participants were instructed to imagine that that they were preparing a presentation that they would give at a later date to win a Business Leaders of America competition. They were instructed to design the look (e.g. colors, fonts) and feel of the presentation. Additionally, they were asked them how quiet or loud they would set their 'walk in' music to be (scale of 1 – 100). They listened to some EDM music and adjusted the volume to their preferred audio level for the presentation and recorded the numeric value. Lastly, they indicated whether they thought the winner of this contest was likely to be more prestigious or more dominant (1-7 scale). The results confirm that that those indicating the winner should be more prestigious (vs. dominant) set their walk in music volume lower than those who thought that the winner would be a dominant individual ($F(1,144) = 4.73$, $p = .031$).

In Study 3, we conducted an empirical model to show support for these predictions using real marketplace data. Using a data set a 2014 aggregation of Facebook data capturing consumers' college football team allegiances at a zip code level, we identified 482 zip codes where fan allegiances were the relatively homogenous among the area's population. For each zip code, data was provided indicating the 3 most popular teams in that area. Then team performance data (win percentage) was gathered for all teams across 4 years (2011 to 2014). This data was matched with a complete dataset of car sales at the zip code level. Another dataset was used to find the actual operating volume (dB) of each model of automobile present in the dataset. Finally, control variables including population, education and income were collected.

We predicted that the better a zip codes' preferred college football team performs, the more this population should feel relatively dominant, sharing in their team's success. As such, more dominant zip codes should show a preference for louder vehicles, all else held equal. The results show that overall, that the better a college football team performed (resulting in increased feelings of dominance in the fans), the more zip codes that associated themselves with that team, sought out louder cars. In addition, there was a main effect such that more educated zip codes (individuals who strive for status using prestige signals) showed a preference for quieter vehicles overall.

Obesity and Compensatory Consumption: Evidence from Jewelry Shopping

EXTENDED ABSTRACT

Obesity rates have been rising across the U.S. over the years, with four out of every ten adults having obesity (Hales et al., 2017). Yet, there is limited research on the link between obesity and consumption behavior in non-health domains. In particular, higher obesity may fuel appearance-related compensatory consumption because prior studies highlight that individuals with obesity exhibit greater disparagement of body image and report lower self-esteem than normal weight individuals (e.g., Wadden and Stunkard 1985; Miller and Downey 1999; Wang et al. 2009). Motivated by this observation, the present research examines whether shopping interest and spending on jewelry, which is regarded as the architecture of the body (Beckett 2015), are higher in places with high versus low obesity rates.

Obesity stigma is a well-documented effect (e.g., Crandall 1994; Miller et al. 1995; Hebl and Heatherton 1998; Carr and Friedman 2005; Puhl and Heuer 2009). Prior research has shown that people view obese individuals and those around them less favorably than others with normal weight (Hebl and Mannix 2003) and that obese individuals face discrimination due to weight (Sutin, Stephan, and Terracciano 2015; Daly, Sutin, and Robinson 2019). People also tend to associate obesity with disease and approach overweight individuals with disgust (Hoyt, Burnette, and Auster-Gussman 2014). In turn, overweight individuals try to mitigate disease threats by choosing to wear clean clothes (Neel, Neufeld, and Neuberg 2013). Despite the growing interest on obesity-focused consumer research, there has not been much progress on understanding whether and how obesity plays a role in shaping people's shopping interest and decisions pertaining to visible products that may help boost their body images. Jewelry, for instance, has historically been viewed as a tool for transforming human body (Gomelsky 2018). With over $68 billion annual sales in the U.S. (Branstrator 2019), jewelry consumption is therefore a suitable study setting in testing the compensatory consumer behavior model (CCBM; Mandel et al., 2017) with a focus on appearance and body image threats (Park and Maner 2009; Hoegg et al. 2014).

According to the CCBM, self-esteem represents an important psychological asset that consumers desire to maintain at a certain level. When consumers' self-esteem is threatened by social stigmas and other external factors, they try to enhance the self via different compensatory consumption strategies. Because wearing jewelry can help people feel better about their physical appearance and boost their self-esteem, one would expect that jewelry shopping interest and spending in a locality increases with obesity rate. The present research tests this hypothesis across four archival studies using online and field data. All the studies in the paper utilize U.S. data and measure obesity rate either at the state- or county-level depending on data availability.

Study 1 uses data obtained from Google Trends for the period 2010-2017 to test whether people's search interest in jewelry stores increases with obesity rate. The dependent variable is annual state-level interest score for the search term "jewelry stores". By construction, the online search interest score is standardized by the total volume of online searches in a given state and year. The independent variable of interest is state-level obesity rate. The control variables are median resident income, median resident age, the proportion of female residents, the proportion of white residents, the proportion of college-graduate residents, and year dummies. The OLS regression results show that for a one-standard-deviation increase in obesity

rate, online search interest for jewelry stores goes up by 12.9% ($p < .01$). The results also show that people's interest in the search term "lose weight"—a proxy for weight- and appearance-related self-discrepancy— mediates the positive relation between obesity rate and search interest in jewelry stores. Falsification tests conducted with alternative search terms such as "appliance stores" and "hardware stores" did not yield any significant results.

Study 2 analyzes the 2012 U.S. Economic Census data on retail sales (2017 data is not available yet) and tests the relationship between jewelry store sales and obesity rate across counties. The dependent variable is the total sales volume for jewelry stores in a county (log-transformed). The independent variable of interest is county-level obesity rate. The control variables include the number of jewelry stores in a county and the same controls from Study 1 (measured at the county-level). The OLS regression results reveal that a one-standard-deviation increase in obesity rate is associated with a 13.0% increase in jewelry store sales ($p < .01$). Falsification tests based on sales volume for different types of stores such as electronics and appliance stores and hardware stores did not generate any significant results.

Study 3 employs the U.S. Consumer Expenditure Survey data for the period 2010-2017 to investigate whether consumers living in states with greater obesity rates are more likely to buy jewelry. The data were collected through quarterly interviews with households. Gift purchases were excluded from the analysis. After controlling for total spending and various state and household characteristics, the logistic regression results show that for a one-standard-deviation increase in obesity rate, the likelihood of jewelry purchase goes up by 6.4% ($p < .01$). The OLS regression of dollar amount of jewelry spending yields similar results.

Study 4 performs a textual analysis of a large sample of jewelry-related tweets downloaded between January, 2019 and April, 2019 to understand whether people from states with greater obesity rates use more self and body words in their tweets. Tobit regression results show that the use of self and body words increases by 5.6% and 3.1%, respectively, when obesity rate is higher by one standard deviation (p's $< .05$). This evidence suggests that as obesity becomes more prevalent, self- and body-related themes stand out as more important themes in consumers' expressions about jewelry.

The present research demonstrates an additional cost of obesity. Unlike weight loss, engaging in compensatory consumption through jewelry purchases does not provide a direct resolution to appearance-related self-discrepancy stemming from obesity. Thus, resorting to jewelry shopping as a compensatory consumption activity is likely to be detrimental to consumers' financial, physical, and psychological well-being in the long-run.

Conspicuously Insecure: When Conspicuous Consumption Backfires

EXTENDED ABSTRACT

Shrek: "So, that must be Lord Farquaad's castle."
Donkey: "Uh-huh, that's the place."
Shrek: "Do you think maybe he's compensating for something?"

In this scene from the movie Shrek, the eponymous hero and his companion Donkey are approaching the evil Lord Farquaad's castle. Having been powerless to prevent the relocation of grating fairytale creatures to his once-tranquil swamp, Shrek has come to the formidable fortress to confront the man responsible. Laughter ensues, however, when Shrek suggests that the large and conspicuous castle is an indication of the despot's personal shortcomings. Although the

audience is never explicitly told what he means, it is readily understood that Shrek is suggesting that the massive monument is compensating for Farquaad's petite physique.

Both common sense and prior literature suggest that conspicuous consumption is often viewed as a symbol of an individual's achievements. For example, merely wearing luxury brands can lead people to view individuals as having greater status (Cannon and Rucker 2019; Nelissen and Meijers 2011). Yet, Shrek's observation, and the audience's response to it, suggests that conspicuous consumption can sometimes be viewed as a symbol of an individual's shortcomings instead. The present research explores this latter possibility. Specifically, this work tests when observers interpret conspicuous consumption as an attempt to compensate for a deficit as opposed to a signal of achievement (Cutright 2012; Gao, Wheeler, and Shiv 2009). To illustrate, consider a middle-aged man purchasing a sports car. Do observers believe the purchase represents his success and status as an elite businessman, or do they infer that the purchase is driven by the psychological insecurities of a man in midlife crisis?

We suggest that observers' inferences are often influenced by their own psychological insecurities. Specifically, we propose that observers are more likely to attribute an actor's conspicuous consumption to compensatory motives when they feel insecure (vs. not). This prediction builds on prior research showing that insecure individuals desire conspicuous products primarily because they believe the products will make them feel more confident in a desired self-view (Rucker and Galinsky 2008). Because people often impute their own thoughts and feelings to others when making attributions (Gordon 1986; Nickerson 1999), we argue that insecure (vs. secure) observers are more likely to believe that an actor's conspicuous consumption is similarly motivated by feelings of insecurity. Ironically, this suggests that although feelings of insecurity make actors more likely to use conspicuous products to gain social acknowledgment, it simultaneously makes observers less likely to provide it.

Study 1 tested our hypotheses by having participants complete a recall task manipulating power (insecure vs. secure vs. baseline). Subsequently, respondents were shown two Mercedes-Benz cars that differed in terms of how conspicuously they were branded. Respondents were asked which driver they thought had more status. Consistent with our theorizing, participants thought that the driver of the more conspicuous car had less status when they felt insecure about their power but more status when they felt secure about their power ($p < .05$). This study provides initial support for our theorizing that observers are more likely to attribute an actor's conspicuous consumption to compensatory motives when feeling insecure (vs. secure).

Study 2 explored the proposed psychological mechanism by showing that the focal effect is attenuated when observers take the perspective of the actor rather than their own perspective, as perspective-taking reduces the tendency to impute one's own mental states to others. After completing a recall task manipulating security of their intelligence (insecure vs. secure), respondents were shown two Yale University t-shirts that varied in terms of the conspicuousness of the university's logo. Respondents were told to imagine they saw two people wearing the shirts and were asked to rate which person felt more secure about his intelligence. Before responding, half the respondents were first asked to take the perspective of the actor. As expected, observers were more likely to report the conspicuous t-shirt signaled insecurity when they themselves were insecure than when they were secure ($p < .05$). However, this effect was eliminated when observers engaged in perspective taking (interaction $p < .05$).

Study 3 tested an implication of observers' attributions of compensatory consumption. Specifically, if insecure observers are more

likely to see conspicuous consumption as driven by compensatory motives, then insecure *actors* should be less likely to engage in conspicuous consumption if they take the perspective of the observer. The idea is that calling an actor's attention to the observer's perspective might make salient the possibility that the purchase would be seen as compensatory. Thus, the actor might reduce their own compensatory behavior to avoid looking like a compensator. To test this idea, we first manipulated participants' power (insecure vs. baseline). Next, respondents were shown a picture of an executive pen and were asked either how powerful and respected owning the pen would make them feel (actor condition) or how powerful and respected *others* would think owning the pen would make them feel (observer condition). Respondents then provided their reservation price for the pen. Replicating previous findings in the literature, respondents in the actor condition tended to pay more for the pen if they were first led to experience insecurity about their power. However, as predicted, this effect was eliminated when respondents took the perspective of the observer (interaction $p < .05$).

In conclusion, we find that while engaging in conspicuous consumption may help actors feel more secure, it can also send the exact opposite signal to observers. For consumers seeking to compensate for a self-threat, this finding suggests that conspicuous consumption may actually backfire if observers see it as reflecting psychological insecurity and thus treat them as compensators. Furthermore, this finding suggests that even when an actor's behavior is *not* driven by compensatory motives, observers may nevertheless make such an inference. In doing so, this research sheds light on potentially unwanted costs of conspicuous consumption and highlights the importance of considering the social context when studying both conspicuous and compensatory consumption.

Luxury and Consumer Well-being: Using Luxury Products Impairs Women's Self-Control

EXTENDED ABSTRACT

The growth of luxury consumption is one of the most important consumer trends in the last decade. Sales of luxury goods have skyrocketed to over $1.3 trillion globally, and luxury goods are in the hands of more consumers than ever. Despite the explosion of luxury consumption, there is a paucity of research aimed at understanding how the use of luxury goods affects our lives, especially how it might negatively affect aspects of our well-being.

We provide women with an opportunity to use real luxury products, and find this experience makes them feel more entitled, more deserving of whatever they want and entitled to more than other people. Entitlement is known to be associated with a number of negative psychological traits, such as narcissism and selfishness, but we focus on an under researched consequence of entitlement that has particular relevance for consumer behavior—loss of self-control. We theorize that feelings of entitlement run counter to exercising self-control, where one depresses their immediate wants and desires to meet higher-order goals. Four studies are presented to test our hypothesis.

In Study 1, 121 female students were assigned to one of three conditions: Chosen Luxury vs. Given Luxury vs. Non-Luxury. In the Chosen Luxury condition, women were shown a luxury handbag (Louis Vuitton) and a non-luxury handbag and were asked to choose one of the handbags for the study. Participants in the Given Luxury condition were given the Louis Vuitton handbag and were asked to use it for the study. Participants in the Non-Luxury condition were given a non-luxury cross-body handbag and were asked to use it for the study. Participants were asked to imagine that they owned

the handbag and were instructed to walk around the building with the handbag. Next, each participant was directed to an individual room which had a computer and a bowl of M&M's candies on the desk. The participants were then left alone in the room to complete the survey. As predicted, we found that participants in the Chosen Luxury condition consumed significantly more M&M's (M = 23.33 grams, SD = 20.28) than participants in the Non-Luxury condition (M = 12.38 grams, SD = 11.93; $t(118) = 2.31$, $p = .023$, ηp2 = .043). Women in the Given Luxury condition consumed significantly more M&M's (M = 21.81 grams, SD = 24.33) than women in the Non-Luxury condition (M = 12.38 grams, SD = 11.93, $t(118) = 2.08$, $p = .039$, ηp2 = .35). Finally, the amount of M&M's consumed did not differ for women in the Chosen Luxury versus Given Luxury conditions ($p = .73$, ηp2 = .001). Study 1 also tested the role of mood and feelings of authenticity and did not find evidences for these effects.

In Study 2, 174 (M_{age} = 20.28, SD = 1.57) female students from a large North American university participated and were randomly assigned to one of the conditions in a 2 (Product Type: Luxury vs. Non-Luxury) by 2 (Food Type: Healthy vs. Unhealthy) between-subjects design. The procedure was similar to study 1 except two types of food were provided. The results revealed that participants in the Luxury condition ate significantly more unhealthy food (M = 30.12, SD = 17.08) than participants in the Non-Luxury condition (M = 22.12, SD = 23.84, ($F(1,170) = 4.34$, p = .039, ηp2 = .025). However, for healthy food consumption, there was no significant difference between participants in the Luxury condition (M = 13.98, SD = 17.34) and Non-Luxury condition (M = 16.47, SD = 20.85, ($F(1,170) = .347$, $p = .56$, ηp2 = .002).

In Study 3, 126 women (M_{age} = 39.81, SD = 16.72) attending the State Fair were recruited to participate in the study. After participants walked around at the State Fair with a Louis Vuitton bag or a non-luxury bag, snacks were provided while they filled out the survey. Entitlement was also measured (adopted from Campbell, et al. 2004). A one-way ANOVA revealed that women in the Luxury condition ate significantly more M&M's (M = 21.16, SD = 22.68) than women in the Non-Luxury condition (M = 13.49, SD = 17.99; $F(1,124) = 4.45$, $p = .037$, ηp2 = .035). Women in the Luxury condition felt more entitled (M = 3.04, SD = 1.21) than women in the Non-Luxury condition (M = 2.56, SD = 1.19; $F(1,124) = 5.00$, $p = .027$, ηp2 = .039). Finally, a 5000 resample bootstrap test of the indirect effect of luxury use on the amount of M&M's consumed revealed that feelings of entitlement statistically mediated this effect (b = 2.07, SE = 1.74, 95% CI: [.0297, 6.8526]).

In our final study, we examine an intervention that luxury consumers can undertake to counteract the negative effects of luxury use on self-control. The key is to identify an intervention that reduces feelings of entitlement. We propose and test that encouraging a grateful disposition among luxury users would serve this purpose, by reducing feelings of entitlement that lessen self-control. 143 female students (Mage = 19.73, SD = 1.54) from a large North American university were assigned to one of three conditions: Luxury vs. Luxury with Gratitude vs. Non-Luxury. Replicating prior studies, we found that participants in the Luxury condition consumed significantly more M&M's (M = 17.75, SD = 19.82) than participants in the Non-Luxury condition (M = 10.71, SD = 14.51; $F(1,140) = 4.26$, $p = .041$, ηp2 =.030). Next, women in the Luxury with Gratitude condition consumed significantly less M&M's (M = 9.79, SD = 10.80) than women in the Luxury condition (M = 17.75, SD = 19.82; $F(1,140) = 4.05$, $p = .008$; ηp2 =.049). In fact, the gratitude intervention was so successful that consumption of M&M's for women in the Luxury with Gratitude condition was similar to that of women in the Non-Luxury condition (M = 9.79 vs. 10.71; $F(1,140) = .10$, $p = .92$).

Taken together, our results show that the experience of using a luxury product can have unanticipated negative consequences—it can lower consumer's ability to exert self-control in everyday life.

REFERENCES

Beckett, Kathleen (2015), "Jewelry As 'Architecture for the Body'," The New York Times, https://www.nytimes.com/2015/12/07/fashion/jewelry-as-architecture-for-the-body.html.

Branstrator, Brecken (2019), "US Jewelry, Watch Spending Rose 7% Last Year. National Jeweler," https://www.nationaljeweler.com/majors/market-developments/7602-us-jewelry-watch-spending-rose-7-last-year.

Cannon, Christopher and Derek D. Rucker (2019), "The Dark Side of Luxury: Social Costs of Luxury Consumption," *Personality and Social Psychology Bulletin*, 45 (5), 767-779.

Carney, Dana R. (2020), "The Nonverbal Expression of Power, Status, and Dominance," *Current Opinion in Psychology*, forthcoming.

Carr, Deborah and Michael A. Friedman (2005). "Is Obesity Stigmatizing? Body Weight, Perceived Discrimination, and Psychological Well-Being in the United States," *Journal of Health and Social Behavior*, 46 (3), 244-259.

Chase, Ivan D., Craig Tovey, Debra Spangler-Martin, and Michael Manfredonia (2002), "Individual Differences versus Social Dynamics in the Formation of Animal Dominance Hierarchies," *Proceedings of the National Academy of Sciences*, 99(8), 5744-5749.

Cheng, Joey T., Jessica L. Tracy, Tom Foulsham, Alan Kingstone, and Joseph Henrich (2013), "Two Ways to the Top: Evidence that Dominance and Prestige Are Distinct Yet Viable Avenues to Social Rank and Influence," *Journal of Personality and Social Psychology*, 104 (1), 103.

Cheng, Joey T. and Jessica L. Tracy (2014), "Toward a Unified Science of Hierarchy: Dominance and Prestige are Two Fundamental Pathways to Human Social Rank," in *The Psychology of Social Status*, New York, NY: Springer, 3-27.

Crandall, Christian S. (1994), "Prejudice Against Fat People: Ideology and Self-interest," *Journal of Personality and Social Psychology*, 66 (5), 882-894.

Cutright, Keisha M. (2012), "The Beauty of Boundaries: When and Why We Seek Structure in Consumption," *Journal of Consumer Research*, 38 (5), 775-790.

Daly, Michael, Angelina R. Sutin, and Eric Robinson (2019), "Perceived Weight Discrimination Mediates the Prospective Association between Obesity and Physiological Dysregulation: Evidence from a Population-Based Cohort," *Psychological Science*, 30 (7), 1030-1039.

Deloitte (2019), "Global Powers of Luxury Goods 2019: Bridging the Gap Between the Old and the New," https://www2.deloitte.com/global/en/pages/consumer-business/articles/gx-cb-global-powers-of-luxury-goods.html.

Gao, Leilei, S. Christian Wheeler, and Baba Shiv (2009), "The 'Shaken Self': Product Choices as a Means of Restoring Self-View Confidence," *Journal of Consumer Research*, 36 (1), 29-38.

Hales, Craig M, Margaret D. Carroll, Cheryl D. Fryar, C.D., and Cynthia L. Odgen (2017), "Prevalence of Obesity Among Adults and Youth: United States, 2015-2016," *NCHS Data Brief*, 288, 1-8.

Han, Young Jee, Joseph C. Nunes, and Xavier Drèze (2010), "Signaling Status with Luxury Goods: The Role of Brand Prominence," *Journal of Marketing*, 74 (4), 15-30.

Hebl, Micheel R. and Todd Heatherton (1998), "The Stigma of Obesity in Women: The Difference is Black and White," *Personality and Social Psychology Bulletin*, 24 (4), 417-426.

Hebl, Michelle R. and Laura M. Mannix (2003), "The Weight of Obesity in Evaluating Others: A Mere Proximity Effect," *Personality and Social Psychology Bulletin*, 29 (1), 28-38.

Henrich, Joseph and Francisco J. Gil-White (2001), "The Evolution of Prestige: Freely Conferred Deference as a Mechanism for Enhancing the Benefits of Cultural Transmission," *Evolution and Human Behavior*, 22 (3), 165-196.

Hoegg, JoAndrea, Maura L. Scott, Andrea C. Morales, and Darren W. Dahl (2014), "The Flip Side of Vanity Sizing: How Consumers Respond to and Compensate for Larger than Expected Clothing Sizes," *Journal of Consumer Psychology*, 24(1), 70-78.

Hoyt, Crystal L., Jeni L. Burnette, and Lisa Auster-Gussman (2014), "'Obesity is a disease': Examining the Self-Regulatory Impact of This Public-Health Message," *Psychological Science*, 25 (4), 997-1002.

Gomelsky, Victoria (2018), "How Jewelry Makes Us Who We Are," The New York Times, https://www.nytimes.com/2018/11/30/fashion/jewelry-metropolitan-museum-of-art.html.

Gordon, Robert M. (1986), "Folk Psychology as Ssimulation," *Mind & Language*, 1 (2), 158-171.

Kitchen, Dawn M., Dorothy L. Cheney, and Robert M. Seyfarth (2003), "Female Baboons' Responses to Male Loud Calls," *Ethology*, 109 (5), 401-412.

Lageat, Thierry, Sandor Czellar, and Gilles Laurent (2003), "Engineering hedonic attributes to generate perceptions of luxury: Consumer perception of an everyday sound," *Marketing Letters*, 14 (2), 97-109.

Mandel, Naomi, Derek D. Rucker, Jonathan Levav, and Adam D. Galinsky (2017), "The Compensatory Consumer Behavior Model: How Self-Discrepancies Drive Consumer Behavior," *Journal of Consumer Psychology*, 27 (1), 133-146.

Miller, Carol T. and Kathryn T. Downey (1999), "A Meta-Analysis of Heavyweight and Self-Esteem," *Personality and Social Psychology Review*, 3 (1), 68-84.

Miller, Carol T., Esther D. Rothblum, Diani Felicio, and Pamela Brand (1995), "Compensating for Stigma: Obese and Nonobese Women's Reactions to Being Visible," *Personality and Social Psychology Bulletin*, 21 (10), 1093-1106.

Neel, Rebecca, Samantha L. Neufeld, and Steven L. Neuberg (2013), "Would an Obese Person Whistle Vivaldi? Targets of Prejudice Self-Present to Minimize Appearance of Specific Threats," *Psychological Science*, 24 (5), 678-687.

Nelissen, Rob M. A. and Marijn H. Meijers (2011), "Social Benefits of Luxury Brands as Costly Signals of Wealth and Status," *Evolution and Human Behavior*, 32 (5), 343-355.

Neumann, Christof, Gholib Assahad, Kurt Hammerschmidt, Dyah Perwitasari-Farajallah, and Antje Engelhardt (2010), "Loud Calls in Male Crested Macaques, Macaca Nigra: A Signal of Dominance in a Tolerant Species," *Animal Behaviour*, 79 (1), 187-193.

Nickerson, Raymond S. (1999), "How We Know—and Sometimes Misjudge—What Others Know: Imputing One's Own Knowledge to Others," *Psychological Bulletin*, 125 (6), 737-759.

Park, Lora E. and Jon K. Maner (2009), "Does Self-Threat Promote Social Connection? The Role of Self-Esteem and Contingencies of Self-Worth," *Journal of Personality and Social Psychology*, 96 (1), 203-217.

Puhl, Rebecca M. and Chelsea A. Heuer (2009), "The Stigma of Obesity: A Review and Update," *Obesity*, 17 (5), 941-964.

Rucker, Derek D. and Adam D. Galinsky. (2008), "Desire to Acquire: Powerlessness and Compensatory Consumption," *Journal of Consumer Research*, 35 (2), 257-267.

Sutin, Angelina R., Yannick Stephan, and Antonio Terracciano (2015), "Weight Discrimination and Risk of Mortality," *Psychological Science*, 26 (11), 1803-1811.

Wadden, Thomas A. and Albert J. Stunkard (1985), "Social and Psychological Consequences of Obesity," *Annals of Internal Medicine*, 103 (6), 1062-1067.

Wang, F., T. C. Wild, W. Kipp, S. Kuhle, and P. J. Veugelers (2009), "The Influence of Childhood Obesity on the Development of Self-Esteem," *Health Reports*, 20 (2), 21-27.

Splash Out or Cheap Out? Motivational Influences on Consumers' Management of Tradeoffs

Chairs: Lawrence E Williams, University of Colorado, USA
Nicole L. Mead, York University, Canada

Paper #1: Meaning Comes Cheap: The Pursuit of Meaning and the Preference for Low Price Options

Nicole L. Mead, York University, Canada
Lawrence E Williams, University of Colorado, USA

Paper #2: Hurts So Good: Status Products that Incur Environmental Costs Are Preferred by Status Striving Consumers

Morgan K Ward, Emory University, USA
Sara Loughran Dommer, Georgia Tech, USA
Darren Dahl, University of British Columbia, Canada

Paper #3: Status Pivoting: Coping with Status Threats through Motivated Trade-off Beliefs and Consumption in Alternative Domains

Dafna Goor, London Business School, UK
Anat Keinan, Harvard Business School, USA
Nailya Ordabayeva, Boston College, USA

Paper #4: 'I'll Have What She's Having:' Neighbors Socially Influence Households' Mortgage Decisions

W. Benadict McCartney, Purdue University, USA
Avni Shah, University of Toronto, Canada

SESSION OVERVIEW

George Orwell's *Down and Out in Paris and London* describes how he managed to live in Paris on pennies a day, a tale that stands in sharp contrast to the City of Lights' reputation for luxury and elegance. In Paris, Orwell found himself deciding between paying rent (and sleeping comfortably indoors) or sleeping on park benches to afford wine on the weekends. Although few people experience the extremes Orwell faced, tradeoffs are inherent to any consumer choice, as people decide which options to consider, which ones to choose, and how much to pay for those chosen options. For example, when planning vacations we decide whether to stay in expensive premium hotels or cheaper budget ones, or when commuting we decide whether to rely on public transportation or less ecofriendly single passenger rides.

Collectively, these papers seek to add to the literature on how consumers' goals shape their management of tradeoffs. To kick things off, in "*Meaning Comes Cheap...*" the authors show that participants who were induced to derive meaning (vs. pleasure) from consumption tend to cheap out – that is, they displayed a preference for lower-end (vs. higher-end) products. The authors of the second paper "*Hurts So Good...*" provide novel insight into why consumers sometimes want luxury products that are not only financially costly but also environmentally costly. They show that consumers who are motivated to achieve high status desire luxury products that are environmentally costly because those products symbolically express consumers' desire for dominance. Following on the status theme, in "*Status Pivoting...*" the authors provide new insight into why and where consumers splash out when they experience a status threat. In reaction to an upward status comparison, consumers are less likely to engage in within-domain compensatory consumption than they are to pivot to high status products in alternative domains. Finally, in "*I'll Have What She's Having...*" the authors examine how social influence changes households' economic decisions regarding mortgage

loans. They find that refinancing and loan-type decisions are influenced by the decisions of their neighbors. In particular, households that are relatively higher in value are more likely to exhibit the social influence effects as compared to relatively cheaper households, suggesting that expensive houses exert a greater social influence effect.

Questions emerging from this session might include the following:

- Which social processes are more likely to move consumers toward luxury versus frugality?
- How might the pursuit of meaning (vs. pleasure) interact with the felt need for status to drive consumption decisions?
- How might households' status concerns interact with normative social influences to drive economic decision-making?

Importantly, this collection of papers utilizes a diverse array of methods to explore how consumers' goals shape the tradeoffs they make, including field studies, lab experiments, incentive compatible choice designs, observational methods, interviews, and large-scale panel data analysis. Given its multimethod nature, this session provides ideal conditions for a productive meeting of the minds, where researchers of different stripes can come together to generate new insight into when and why consumers splash out versus cheap out.

Meaning Comes Cheap: The Pursuit of Meaning and the Preference for Low Price Options

EXTENDED ABSTRACT

Consumers strive to find and create meaning in their daily lives. Yet, despite this fundamental need, there is a paucity of research that has examined how consumers use the marketplace to help them in their pursuit of meaning. When consumers wish to add meaning to their lives, what do they want?

Past research suggests that pursuing meaning may cause people to "splash out' by seeking higher-quality, more expensive products. Meaning is associated with a desire for self-growth (Baumeister et al. 2013) and the belief that larger investments will provide longer-lasting benefits (Percival Carter and Williams 2017). Those desires are best fulfilled by high-quality products because those products can be incorporated into consumers' sense of self over time (Belk 1988).

In this research, we posit (and find) the opposite: meaning causes people to "cheap out" by gravitating toward less expensive options. This effect is robust across a variety of usage situations and diverse material goods, experiences, and services, and this effect is explained by an enhanced focus on opportunity costs. The distinct thought processes associated with meaning (increased thoughtfulness, thinking about non-monetary ways to generate meaning, and a focus on the future) encourage people pursuing meaning to think about opportunity costs – the alternative ways they can spend their limited time, energy, and money – which in turn makes them reluctant to devote their resources to any given high-price option.

We report five studies which provided support for our hypotheses. Consistent with previous research studying meaning, we contrasted the pursuit of meaning with the pursuit of pleasure. Not only is this a conceptually and empirically valid approach, it is also eco-

logically valid as pleasure is a related but distinct motivation that is considered to be one of the most important drivers of consumer choice (Alba and Williams 2013; Holbrook and Hirschman 1982).

In experiments 1a (N=173; undergraduate participants) and 1b (N=181; Amazon Mechanical Turk (mTurk) workers), respondents induced to purse meaning (vs. pleasure) reported a stronger preference for the less-expensive alternatives across multiple product categories (cars, coffee, skiing, dining, cameras, and water) and within single-use products (e.g., a cup of coffee) and multiple-use products (e.g., a coffee maker) of each product category (experiment 1a: $F(1,171)=14.86$, $p<.001$; experiment 1b: $F(1,179)=20.460$, $p<.001$).

To check the robustness and external validity of our findings, we conducted an incentive-compatible study which was pre-registered (experiment 2; N=193 MTurkers). Participants were asked to go shopping on Amazon.com, and they were randomly assigned to choose something to create meaning (or pleasure). Participants were given a budget of $100, but otherwise they were free to select whatever they wished. To make this study incentive compatible, participants were told they would be entered into a draw to win the product selected, and that if they spent less than $100 on the product, they would receive the remainder in cash (i.e., MTurk bonus). This lottery was executed. Conceptually replicating experiments 1a-1b, participants who were induced to pursue meaning chose a less expensive product (M=$38.23, SD=$23.52) as compared to those induced to pursue pleasure (M=$49.71, SD=$27.72), $t(191)=3.100$, $p=.002$.

In experiment 3 (N=437; Prolific workers), we tested the hypothesis that pursuing meaning (vs. pleasure) causes people to "cheap out" because the pursuit of meaning heightens consumers' focus on alternative uses for their resources (i.e., opportunity costs). Consistent with predictions, we observed an indirect effect of the meaning (vs. pleasure) manipulation on increased preference for less-expensive products through heightened focus on opportunity costs for both single-use products (c'=.1666, SE=.0464, 95%CI [.0820, .2631]) and multiple-use products (c'=.1815, SE=.0514, 95%CI [.0877, .2867]).

In experiment 4 (N=344; Prolific workers), we tested a theoretically relevant boundary condition. If pursuing meaning heightens consumers' focus on opportunity costs, then they may neglect to think of the longer-term benefits of more expensive products – namely, that high-quality products last longer. In this way, reminding consumers that higher-quality products tend to last longer should mitigate the effect of meaning (vs. pleasure) on increased preferences for less-expensive products, but only when products can be used over time (i.e., multiple-use products not single-use products). In this way, the experiment was a 2 (pleasure vs. meaning) by 2 (durability reminder: yes vs. no) by 2 (single-use product vs. multiple-use product) mixed design, with consumption goal and durability reminder as between-subjects factors and product longevity as a within-subjects factor.

We observed the predicted three-way interaction between consumption goal, durability, and product longevity ($F(1, 340) = 7.022$, $p = .008$). Examining preferences for *single-use products*, we observed the predicted main effect of the goal manipulation ($F(1, 340)=32.046$, $p<.001$). Conceptually replicating the previous studies, participants in the meaning (vs. pleasure) condition reported a stronger preference for the lower-quality products.

When predicting preferences for *multiple-use products*, we observed the predicted interaction between the durability reminder and the consumption goal manipulation ($F(1, 340)=8.149$, $p=.005$). The results of pairwise comparisons supported our theorizing. When participants were *not* reminded that higher-quality products last longer, we replicated our previous findings: meaning (vs. pleasure)

participants reported a higher preference for less expensive products ($p<.001$). More important, this effect was mitigated when the link between quality and durability was made salient to participants ($p=.330$). This attenuation was due to the durability reminder (vs. no reminder) increasing preferences for more expensive products among meaning participants ($p<.001$). Confirming that the moderator was having an effect on meaning participants specifically, the durability reminder did not have an effect on participants in the pleasure condition ($p = .740$).

This research provides a first look at how the pursuit of meaning guides marketplace choices. Across five studies, we find that the pursuit of meaning (vs. pleasure) causes consumers to gravitate toward less expensive options because of a heightened focus on opportunity costs. The findings thus point to a disconnect between what people say they want when engaged in meaningful consumption (more expensive products that last longer) and what they choose when pursuing meaningful consumption (less expensive products that fail sooner).

Hurts So Good: Status Products that Incur Environmental Costs Are Preferred by Status Striving Consumers

EXTENDED ABSTRACT

The motivation to strive for elevated status within one's social circle is evident across cultures (Barkow 1989). Although the particular behaviors and objects that enable upward mobility differ considerably across culture (Bian and Forsythe 2012), the behavioral strategies used to achieve high-status are universal. The dominance-prestige account of status-striving (Henrich and Gil-White 2001) states that individuals may increase their social status by expressing dominance, which usually entails displaying products or engaging in behaviors that represent an individual's control over other entities through force or aggression (e.g. individuals, animals, surroundings; Maeng and Aggrawal 2017; Chase et al. 2002) and by expressing prestige, which is accomplished by displaying material resources or knowledge considered "worthy of emulation" (Cheng et al. 2013, pg. 105; Cheng and Tracy 2014).

Both prestige and dominance are effectively signaled to others vis a vis the products consumers use and display. Although modern consumers seldom procure products via physical force, symbols of dominance are embedded in certain luxury products via the "environmental costs" that they incur in their sourcing or production (i.e. the physical destruction, or damage that occurs to an environmental entity as an outcome of the procurement of a material or the production of a good). Environmentally costly products symbolically express the producer's (and by extension, the consumer's) dominance over another living being or resource.

We contend that products that incur environmental costs are particularly desirable to those engaged in status-striving. We theorize that goods that are symbolic of both paths (i.e. prestige and dominance) are particularly appealing to individuals who are seeking higher social status. The ego-enhancing benefits of luxury coupled with the signals of physical threat makes the consumption of environmentally costly luxury items particularly effective tools in upward mobility (Sivanathan and Pettit 2010).

While some might view scarcity as the inevitable result of the environmental costs inherent in the production of luxury products, scarcity and environmental costs are orthogonal constructs. Thus, we acknowledge the importance of scarcity in consumers' desire for luxury but control for scarcity perceptions in our studies.

Study 1 was a 2 (environmental costs: high vs. low) x 2 (status-striving: high vs. low) behavioral study (n = 205). First, participants were instructed to write about why choosing status goods makes sense (high status-striving condition) or does not make sense (low status-striving condition). Next, an RA asked participants to take part in a taste test for a luxury cold-pressed juice brand. Those who agreed read about juice made from Camu Camu fruit. Only in the high environmental cost condition were participants told that harvesting the fruit has a detrimental effect on the fauna and flora surrounding it. Participants were then given samples of the juice. Participants endorsed the degree to which they liked the juice, found it desirable and thought it tasted good (1 = not at all/ 9 = very much; α = .94). Participants in the high status-striving condition found the juice with high environmental costs more appealing compared to the juice with low environmental costs (M_{HEC} = 6.97 vs. M_{LEC} = 5.93, $F(1, 202)$ = 9.38, p = .002). This pattern was reversed in the low status-striving condition (M_{HEC} = 6.01 vs. M_{LEC} = 6.59, $F(1, 202)$ = 2.64, p =.10).

Study 2 manipulated one between-subjects factor (environmental costs: high vs. low) and measured status-striving (Eastman et al. 1999). Participants (n = 131) were told that the marketing department was working with the university bookstore to determine which kind of luxury chocolate squares they should carry. At each computer was 10 chocolate samples and a booklet offering information about the luxury chocolate. In the high environmental cost condition participants read that cocoa farming contributes to deforestation and damage to wildlife habitats. Before leaving, participants were told they could take as many chocolate samples from their stations as they liked. RAs recorded how many chocolates participants took (0-10). Two weeks later, a follow-up email survey measured status-striving (Eastman et al. 1999). For high status-strivers (+1 SD), the presence of high environmental costs caused an increase in the number of chocolate samples taken (β = .43, p = .0002). For low status-strivers (-1 SD), the presence of high environmental costs caused a decrease in the number of chocolate samples taken (β = -.33, p = .03).

Study 3 examines our hypothesized dominance process via moderation. We conducted a 2 (environmental cost: high vs. low) X 2 (dominance: validated vs control) between subjects design with status-striving measured. Participants (n = 323) were primed by writing about a time that they had felt dominant (dominance validated condition) or to describe their typical morning routine (control). Then, they were instructed to read a passage about how snakeskin is procured for luxury accessories. In the high (low) environmental cost condition we included information that snakes were killed for their skins (molted their skins). Next, participants rated a luxury snakeskin bag on how attractive, appealing, and desirable the bag was (1 = not at all/ 9 = very much; α = .91) and completed the same status-striving scale used in Study 2 (Eastman et al. 1999).

In the control condition, where dominance had not been validated, we continue to find a significant and positive effect of environmental costs at high status-striving (JN point at +1.66 SD), and significant and negative effect of environmental costs at low status-striving (JN point at -.45 SD). In the high environmental cost condition, the effect of the dominance manipulation on product appeal was negative and significant at high levels of status-striving (JN point at +.42 SD).

In sum, we contend that certain consumers (those striving for status) are drawn to status products *because* they are destructive to environmental resources. Consuming these products enables consumers to access an object that represents an additional path to high social status: dominance. Thus, we find support for our prediction that objects that embody both signals (prestige and dominance) are a stronger representation of status and, as such, are particularly appealing to status-striving consumers.

Status Pivoting: Coping with Status Threats through Motivated Trade-off Beliefs and Consumption in Alternative Domains

EXTENDED ABSTRACT

Prior research suggests that consumers cope with status threats by engaging in compensatory consumption, i.e. by purchasing and displaying status-related products and brands that signal professional success and affluence to restore their "shaken self" (Gao et al. 2009; Mandel et al. 2017). Going beyond compensatory consumption in the domain of the status threat, we examine when and how consumers cope with status threat by choosing to pivot to alternative domains. We argue that upward comparisons to higher-status individuals motivate consumers to adopt beliefs about trade-offs between success in the domain of the threat (e.g., professional or financial success) and alternative domains (e.g., personal life or physical fitness). These motivated trade-off beliefs, which are specifically pronounced when consumers experience a status threat, fuel consumption and display of brands associated with accomplishments in these alternative domains. We investigate the domains consumers pivot to, compare the prevalence and appeal of the "status pivoting" behavior to compensatory consumption within the threat domain, and examine when consumers are more or less likely to engage in status pivoting.

Eight studies combining field and lab experiments, observational methods, incentive-compatible designs, and an analysis of social media posts, explore the status pivoting phenomenon.

Study 1 examined the prevalence and appeal of status pivoting in a real-world natural setting. We recorded and coded 217 responses to a question posted on an online platform Quora.com: "How can you overcome your envy of people who are your age but are far more successful?" A greater proportion of posts mentioned pivoting to an alternative domain (48.8%) than restoring status within the threat domain (25.3%; c^2=6.031, p=.014). The most frequently mentioned alternative domain was social life and relationships (30.2%), followed by mental wellness (23.6%), personal character and moral values (20.8%), and physical health (15.1%). Furthermore, comments about status pivoting were viewed (p<.001) and liked (p=.006) more than those about restoring status within the threat domain, indicating its greater prevalence and appeal.

In Studies 2A-C, we explored how car bumper stickers can be consumed as a form of status pivoting. In Study 2A, we examined cars at golf club parking lots in Crans-Montana, a luxurious resort town in Switzerland. Analysis of the cars that had bumper stickers (N=98) revealed that, compared to owners of luxury cars, owners of non-luxury cars were more motivated to signal status in alternative domains using stickers associated with collectable experiences (e.g., extreme sports; c^2=28.63, p<.001) or social causes (c^2=48.17; p<.001) over stickers associated with the status threat domain – golf.

To test causality, in Study 2B, we surveyed 73 runners (M_{age}=45.1, 55.4% males) in the Boston Marathon pre-race exposition. Runners who described someone they knew with a very expensive car (status threat) were more interested in displaying the "26.2" sticker on their car, laptop, or at work (1-7 scale; α=.56) (M=4.51) than runners who did not describe such an individual (control) (M=3.65; $F(1,72)$=13.84, p=.045).

Study 2C manipulated status threat in a controlled setting and tested the mediating role of motivated trade-off beliefs. Car owners (N=179; M_{age}= 37.9; 47.5% female; MTurk) imagined that one of their coworkers had won a large amount of money ($100,000; status threat) vs. a smaller amount of money ($1,000; no threat) in the lottery. Participants were more interested in putting stickers that display alternative domains on their cars in the threat (vs. no threat) condi-

tion (*p*=.030). The effect was mediated by motivated trade-off beliefs (that financial success leads to problems in alternative life domains; *a×b*=.8421, 95% CI=[.4947,1.2206]).

The following studies tested the effect of status threat on choice between status pivoting to an alternative domain versus status restoration within the threat domain.

In Study 3, participants (N=203, M_{age}=35.9, 41% female, MTurk) imagined they met a former classmate at a high-school reunion. In the status threat (vs. no threat) condition, the classmate was described as more (vs. less) professionally successful than them. Afterwards, participants chose which mug they would like to win a real raffle. Participants were more likely to choose a mug that highlighted an alternative domain ("Keep Calm and Be a Friend") over a mug that highlighted the domain of the status threat ("Keep Calm and Back to Work") in the status threat (vs. no threat) condition (c^2=4.51, *p*=.024).

Studies 4A-B tested a boundary condition of status pivoting – attainability of high status in the domain of the threat. Study 4A (N=355; M_{age}=34.7; 36.2% female; MTurk) showed that subjectively perceiving the success of the higher status person in the domain of the threat as attainable can attenuate the effect of status threat on status pivoting and lead consumers to signal status in the threat domain (c^2(3)=10.00, *p*=.019). Study 4B (N=236; M_{age}=48.6; males; Qualtrics panelists) revealed that consumers' actual ability to attain high status within the threat domain (i.e. income) attenuates the effect of status threat on status pivoting, as status threat (vs. no threat) increased status pivoting only at annual income levels below $107,768 ($b_{jn}$=.4057, *p*=.05).

Study 5 examined an alternative possibility that pivoting could occur because people merely want to escape the status threat. It also further tested the process (trade-off beliefs) by manipulating the salience of trade-offs across domains. 180 women (M_{age}=35, MTurk) imagined that their friend enrolled in a professional course. She either felt disadvantaged because her classmates were more accomplished (status threat), felt that she was doing well (no threat), or felt disadvantaged compared to her classmates who were more accomplished but did not have rewarding relationships (trade-off between domains highlighted). Participants evaluated bracelet charms to gift to their friend. Participants were more likely to prefer charms associated with an alternative domain (relationships) in the status threat and the trade-off salient conditions than in the no-threat condition (*p*=.028; *p*=.011), but their preferences for charms associated with the threat domain (*p*>.11) and neutral domains (*p*>.491) did not differ across conditions.

Our work adds to theory on status-signaling and compensatory consumption by enhancing the understanding of status pivoting, and it contributes to prior work on lay theories about cost-benefit heuristics by demonstrating that beliefs about trade-offs may be pronounced under status threat.

'I'll Have What She's Having:' Neighbors Socially Influence Households' Mortgage Decisions

EXTENDED ABSTRACT

A mortgage is the largest and most consequential financial contract that the typical household makes. For most families, their house is their largest asset and their mortgage their largest liability. Understanding the drivers of household mortgage choices therefore remains critical to the study of consumer behavior and household finance. A growing body of work shows that decision-making and risk-taking behavior can be influenced by various contextual factors, including social influence. However, neighbors have been largely unexamined in this research agenda. While this may be partially due to identification challenges that necessitate linking high-quality and precisely located geographic data to outcome variables of interest, recent literature and labor trends have pointed to other concerns diminishing the importance of this group.

In his influential book, *Bowling Alone*, Putnam (2000) argues that Americans are largely disconnected from their neighbors and local communities. Recent trends also find that Americans are increasingly spending more time working and online (O'Boyle and Harter, 2013; Perrin, 2015). Yet there are clear reasons that neighbors should not be overlooked as a consequential source of influence, particularly in household mortgage decisions. Americans live in their homes for an average of thirteen years, more than twice the average workplace tenure, and are living in their homes increasingly longer (BLS, 2019; Modestino and Dennett, 2013). And, finally, while people are working longer hours, more and more of these hours are spent working from home (BLS, 2017). Consequently, do social interactions from our neighbors have a meaningful impact on households' economic decisions? If so, by what mechanism? Do they improve decision-making or lead to worse outcomes? And in particular, does living in a relatively more expensive home lead you to be more or less likely to be socially influenced that those in relatively cheaper homes?

We build a comprehensive panel dataset that details the owners, outstanding mortgages, and characteristics of every property in Los Angeles between 1992 and 2012. Crucially, we know the precise latitude and longitude of each property and can therefore map households and their hyperlocal neighbors. With this fine level of detail, we can isolate and identify social influence effects occurring at a hyperlocal level. This level of precision affords the ability to identify hyperlocal sources of influence in a way that is not possible using zip code-level or county-level data alone, where endogenous group formation concerns prevail. Our empirical strategy tests whether decisions made by a household's block peers, the sixteen neighbors on the household's residential block, exert a significant influence on its mortgage decisions even when controlling for the decisions made by the household's larger set of neighborhood peers, the 130 neighbors on the household's census block and those blocks adjacent to it, and controlling for borrower and lender-specific fixed effects as well as time quarter-by neighborhood level fixed effects.

We find households make refinancing and loan-type decisions especially like those of their hyperlocal, block-level neighbors, even after controlling for the decisions of those neighbors who live just slightly farther away, on adjacent blocks. Specifically, we estimate that households are 4% more likely to refinance and 2% more likely to choose an adjustable rate mortgage (ARM) if the count of block peers who have recently refinanced or the share of their block peers with an ARM for their last loan increases from the 10th percentile block to the 90th percentile block, respectively. We further find that households making purchase loan decisions, who have not lived in the neighborhood before and therefore had no opportunity to socially interact with their new neighbors, show no signs of being socially influenced. However, though not initially socially influenced, we show that movers who later refinance become socially influenced over time.

Unlike real estate listings, adding solar panels (Bollinger and Gillingham, 2012), and foreclosure (Gupta, 2018), refinancing and ARM choice are not decisions typically visible at the hyperlocal level, ruling out the possibility of a visual salience mechanism. Instead, these hyperlocal social influence effects are more consistent with a word-of-mouth mechanism. To provide further support of a word-of-mouth transmission mechanism, we investigate whether hyperlocal peer effects change as the likelihood of social interac-

tions among neighbors increases. To do so, we estimate our model across areas with varying walkability scores. Walkability scores measure accessibility to public transportation, the presence and quality of footpaths, and traffic and road conditions, among other factors, therefore serving as a proxy for the likelihood that households living in that zip code interact with their neighbors, particularly those beyond their specific block. We find that the estimated effect of block peer influence is steady and similar across all ten deciles of walkability score. Social interactions between block neighbors are no more likely to occur as areas become more walkable. This is unsurprising since interactions between block-neighbors are already almost a certainty. Getting mail, taking out the trash, and shoveling snow all happen regardless of the area's walkability. Importantly, this also means that block-level social interaction effects are always in play, regardless of neighborhood attributes correlated with walkability. We also find that the estimated effect of adjacent-block peers' decisions do increase as a function of increased walkability. While we cannot attribute all of this increase to an increase in social interactions as there are other correlated unobservable forces, the notion that more walkable neighborhoods increase the neighborhood-level social influence effect is consistent, once again, with a word-of-mouth, social interaction mechanism.

Finally, we use our data to speak to the welfare implications of hyperlocal neighbor social interactions. First, we examine whether households are better/worse off from social interaction by examining optimal refinancing. We do this by determining what the current prevailing interest rate to the interest rate prevailing when the loan was originated and measure how long it has been since the house has refinanced. By looking just at the extremes, we can say what a given household "ought" or "ought not" to do (Keys et al., 2016). We find that the effects of hyperlocal social influence are significantly stronger for households who ought to refinance compared to households who ought not to. This indicates that interacting with neighbors might encourage learning whereby households who ought to be making a certain choice are more likely to do so if their block peers have recently made that same decision. Second, we examine whether there is heterogeneity in the 'type' of households who are more likely to be socially influenced. We find that relatively larger households on a block (as determined by estimated value) are, in fact, *more* likely to exhibit social influence effects while households that are relatively cheaper on a block are *less* likely to show these effects. This implies that households who are relatively wealthier in terms of visual salience are more likely to show hyperlocal social influence effects in their refinance decisions relative to those households whose visual display of wealth is comparatively less.

In summary, we demonstrate hyperlocal social interactions may be an important mechanism for information flow in household finance and mortgage markets, spurring households to learn about prevailing interest rates and new mortgage products, leading them towards "better" decisions.

REFERENCES

Alba, Joseph W., and Elanor F. Williams (2013), "Pleasure Principles: A Review of Research on Hedonic Consumption," *Journal of Consumer Psychology*, 23 (1), 2–18.

Barkow, Jerome H. *Darwin, sex, and status: Biological Approaches to Mind and Culture*. University of Toronto Press, 1989.

Baumeister, Roy F., Kathleen D. Vohs, Jennifer L. Aaker, and Emily N. Garbinsky (2013), "Some Key Differences between a Happy Life and a Meaningful Life," *Journal of Positive Psychology*, 8 (6), 505-16.

Belk, Russell (1988), *Possessions and self.* John Wiley & Sons, Ltd.

Bian, Qin, and Sandra Forsythe (2012), "Purchase intention for Luxury Brands: A Cross Cultural Comparison." *Journal of Business Research,* 65, (10), 1443-51.

Chase, Ivan D., Craig Tovey, Debra Spangler-Martin, and Michael Manfredonia (2002), "Individual Differences versus Social Dynamics in the Formation of Animal Dominance Hierarchies." *Proceedings of the National Academy of Sciences*, 99 (8), 5744-49.

Cheng, Joey T., and Jessica L. Tracy (2014), "Toward a Unified Science of Hierarchy: Dominance and Prestige are Two Fundamental Pathways to Human Social Rank," In *The Psychology of Social Status*, pp. 3-27. Springer, New York, NY.

Gao, L., Wheeler, S.C., & Shiv, B. (2009). The "Shaken Self": Product Choices as a Means of Restoring Self-View Confidence. *Journal of Consumer Research*, 36(1), 29-38.

Henrich, Joseph and Francisco J. Gil-White (2001), "The Evolution of Prestige: Freely Conferred Deference as a Mechanism for Enhancing the Benefits of Cultural Transmission," *Evolution and Human Behavior,* 22 (3), 165-96.

Hirschman, Elizabeth C., and Morris B. Holbrook (1982), "Hedonic Consumption: Emerging Concepts, Methods and Propositions," *Journal of Marketing*, 46, 92-101.

Maeng, Ahreum and Pankaj Aggarwal (2017), "Facing Dominance: Anthropomorphism and the Effect of Product Face Ratio on Consumer Preferences," *Journal of Consumer Research,* 44 (5), 1104-21.

Mandel, N., Rucker, D.D., Levav, J., & Galinsky, A.D. (2017). The Compensatory Consumer Behavior Model: How Self-Discrepancies Drive Consumer Behavior. *Journal of Consumer Psychology*, 27(1), 133-146.

Percival Carter, Erin and Lawrence Williams (2017), "Meaningful Consumption Provides Long Lasting Benefits at a High Cost," in *NA – Advances in Consumer Research*, Vol. 45, ed. Ayelet Gneezy, Vladas Griskevicius, and Patti Williams, Duluth, MN: Association for Consumer Research, 63-67.

Ryan, Richard M. and Edward L. Deci (2001), "On Happiness and Human Potentials: A Review of Research on Hedonic and Eudaimonic Well-Being," *Annual Review of Psychology*, 52, 141-66.

Sivanathan, Niro, and Nathan C. Pettit (2010), "Protecting the Self Through Consumption: Status Goods as Affirmational Commodities." *Journal of Experimental Social Psychology,* 46, (3), 564-70.

Consumer Interactions with Voice Technology

Chairs: Kurt Munz, Bocconi University, Italy
Johann Melzner, New York University, USA

Paper #1: Verba Volant Scripta Manent: Communication Modality Affects Privacy Expectations

Johann Melzner, New York University, USA
Andrea Bonezzi, New York University, USA
Tom Meyvis, New York University, USA

Paper #2: Experiential Effects of Device-Dependent Voice Interactions: Resolving the Power Imbalance between Voice-assistants and Users

Ana Valenzuela, Baruch College, USA and Ramon Llull Esade, Spain
David Luna, University of Central Florida, USA
Christian Hildebrand, University of St. Gallen, Switzerland
Jessie Du, Baruch College, USA

Paper #3: Is That an Accent I Hear? How a Digital Voice Assistant's Accent Affects Consumer Perceptions and Intentions

Rebecca Chae, Santa Clara University, USA
James A. Mourey, DePaul University, USA
Carolyn Yoon, University of Michigan, USA

Paper #4: Not-so Easy Listening: Roots and Repercussions of Auditory Choice Difficulty in Voice Commerce

Kurt P. Munz, Bocconi University, Italy
Vicki G. Morwitz, Columbia University, USA

SESSION OVERVIEW

Voice-enabled technologies enjoy widespread popularity and are being adopted at a staggering rate. Sixty-six million US adults own a smart speaker (Levin and Lowitz 2019), 49% of US smartphone users use voice-technology at least once a week (Statista 2018), and 20% of mobile Google searches are done by voice (Sterling 2016). Some industry experts predict that in the coming decade 30% of online browsing will be done entirely without screens (Gartner 2016), and it cannot be disputed that voice-enabled technologies are becoming a part of consumers' daily lives with myriad marketing implications (Dawar 2018).

As we are entering the era of voice (Campos 2017), this session combines four papers that shed light on various dimensions on consumer interactions with voice technology with important downstream consequences for advertising effectiveness, product preferences, and choice.

The first paper investigates differential privacy perceptions in online interactions with technology as a function of communication modality. Specifically, Melzner, Bonezzi, and Meyvis find that consumers expect oral versus written interactions with technology to be more private with negative consequences for the receptivity of targeted advertising based on orally as compared to written disclosed information.

The second paper by Valenzuela, Luna, Hildebrand, and Du explores the use of imperative language while interacting with voice assistants. Experienced voice assistant users adapt their speech toward greater use of commands, while inexperienced users feel uncomfortable doing so, making them less likely to seek status products.

Next, Chae, Mourey, and Yoon show that a subtle cue, such as a programmed accent in the voice of an artificial intelligence agent can influence willingness to pay and purchase intention–an effect not intuited by consumers. That is, accents in smart technology voices can elicit country of origin associations that boost evaluations of products from that country.

Finally, Munz and Morwitz explore the cognitive consequences of shopping by voice. Voice shoppers have greater difficulty making comparisons, leading them to choose recommended items more often, but also making them more likely to choose nothing. They rely more heavily on information they can understand apart from a comparative context.

This session should be of interest to a broad audience of researchers with substantive interests in voice technology, human-technology communication as well as a theoretical interest in normative beliefs, associative processes, and information processing. The consequential nature of the dependent variables provides insights for practitioners.

Verba Volant Scripta Manent: Communication Modality Affects Privacy Expectations

EXTENDED ABSTRACT

Consumers increasingly interact with technology by speaking instead of typing. This voice technology boom is predicted to affect marketing on many levels (Dawar 2018). In this research, we focus on targeted advertising. Specifically, we propose that oral versus written communication increases consumers' privacy expectations with negative effects for targeted advertising.

Privacy expectations are social norms about how information should flow within and outside of the contextual boundaries of an information exchange (Nissenbaum 2009). Oral communication is ephemeral and transient and thus tends to be contextually bounded. That is, spoken content typically remains within the social (i.e., with the audience involved directly in the communication), spatial (i.e., in the same location), and temporal (i.e., no record) boundaries of the information exchange setting (Jahandarie 1999). Written communication, however, is a contextually impoverished modality, as content can easily be saved and transmitted to third-parties at remote place at later times (Sproull and Kiesler 1986). Thus, consumers may have internalized the norm that orally versus written disclosed information should not be accessible to parties not involved in the immediate information exchange and not be transmitted to other places or saved and later used. Even though, ephemerality of the spoken word does not hold in online communications with technology (as content is recorded, sent to remote servers, and often disseminated; e.g., Acquisti, Brandimarte, and Loewenstein 2015), the physical ephemerality of consumers' spoken output is highly salient to consumers, while the digital translation of the disclosed information is arguably not. Furthermore, consumers tend to apply well-established offline norms to interactions with technology online (Moon 2000) even though they do not apply in this context.

In four studies, we show that consumers display increased privacy expectations in oral versus written communication with technology online. Furthermore, consumers perceive contextual boundary breaches as higher privacy violation in oral versus written communication with negative downstream consequences for the effectiveness of targeted ads, which necessitate contextual boundary breaches of provided information. For brevity, we report two studies in this report.

Study 1: Undergraduate students were each seated in private rooms and presented with an online survey on a topic of relevance to them, namely dating. Participants were assigned to one of three conditions. In the oral (written) condition, participants heard (read) the questions recorded with a female Google Assistant voice and responded by speaking into a built-in laptop-microphone (typing). The oral transcription condition closely resembled the oral condition, with the exception that participants were specifically notified that no audio files of their recordings are saved and that their responses will be automatically transcribed (participants in the oral condition received no further information even though no voice files were saved either).

Measures. As measures of privacy expectations, participants were presented with the following five statements and asked to indicate the extent they would find social (three items: the researchers get access to their answers, the researchers give others access to their answers, a third-party company gets access to their answers), temporal (their answers are stored indefinitely), and spatial (their answers are transmitted to remote servers) boundary breaches acceptable. Since all items show highly similar results and load on a single factor, they will be reported as a single composite measure of privacy expectations for brevity. Next participants indicated the degree to which they felt that their answers made them identifiable as individual.

Results. Conditions differed in acceptability of contextual boundary breaches, such that participants in the oral condition indicated lower acceptability (and thus higher privacy expectations) than participants in both the oral transcription than written condition) with no difference between the latter two conditions. Additionally, conditions differed in perceived identifiability, with the oral condition indicating higher identifiability than the oral transcription and marginally higher identifiability than the written condition with no difference between the latter two conditions. However, identifiability did not mediate the effect of oral versus oral transcription and written condition on acceptability.

Discussion. The results support the hypothesis that consumers find boundary breaches less acceptable in oral versus written communication. The effect does not seem to be a function of feeling more identifiable through speaking than writing. Furthermore, it is not the act of speaking itself that evokes increased privacy expectations but the ephemerality of spoken output as indicated by the fact that participants in the oral transcription condition displayed privacy expectations similar to the written condition.

Study 2: Undergraduate students were seated in private rooms and asked to imagine that they had to Google things to do for a weekend-trip (amongst which was eating at a restaurant). Participants were assigned to one of two conditions (oral and written) and entered search terms either by typing or by speaking into the built-in laptop-microphone using the Google voice functionality. The keyboard was disabled in the latter condition. Afterwards, participants completed unrelated studies for about 30 minutes. On a different laptop, participants were informed that the search terms they entered previously were used to generate a personalized ad for them and were then presented with an ad for a restaurant.

Measures. Upon seeing the ad, participants were asked to indicate the degree to which they felt like their privacy has been violated. They further indicated the degree to which they were interested in visiting the website of and eating at the advertised restaurant. These items were averaged into measure of ad effectiveness. Additionally, they were asked how identifiable they felt based on the search terms they provided and how good a match the ad was for them.

Results. Participants indicated marginally higher privacy violations in the oral than written condition. Conversely, participants indicated lower ad effectiveness in the oral than written condition. However, the indirect effect of oral versus written condition via privacy violation on ad effectiveness was only marginally significant.

Discussion. The results provide first evidence in an ecologically valid context that targeted ads based on oral versus written information from consumers are received less favorably due to increased consumer privacy expectations in oral communication.

Experiential Effects of Device-Dependent Voice Interactions: Resolving the Power Imbalance between Voice-assistants and Users

EXTENDED ABSTRACT

Amazon's Echo (a voice-activated device) is a smart home speaker embedded with artificial intelligence. Dubbed Alexa, Amazon's Artificial Intelligence has gained popularity in many households. The U.S. installed base of smart speakers has hit 66 million in 2018 (Levin and Lowitz 2019) with 252 million U.S. adults using voice-assistants in their homes or cars (Voicebot 2019). Alexa only responds when summoned, and consumers usually talk to her using imperative language. In this paper, we investigate how the consumer's experience originating from device-dependent voice interactions may have an effect on downstream decisions.

The chameleon effect is a specific form of synchrony that takes place among dyads rather than within and between groups (for a review, see Chartrand & Lakin 2013). As adults, we engage in mimicry to establish and maintain social relations with others (Chartrand & Bargh 1999). In linguistics, accommodation theory investigates the mechanism underlying verbal mimicry (Gallois, Ogay, and Giles 2005; Koslow, Shamdasani, and Touchstone 1994). Convergence, within linguistic accommodation, explores the motivation for verbal imitation. Convergence arises when speakers alter their linguistic patterns to adopt styles more like that of their interaction partners (Wisniewski, Mantell and Pfordresher 2013).

In this paper, we focus on the dynamics of language accommodation in the dyad "consumer - voice activated assistant" (assemblage theory; Hoffman and Novak 2018). We posit that technology devices' inherent constraints make digital assistants less conversational, and, consequently they potentially limit consumers' use of language. Specifically, in their working paper, Hildebrand, Hoffman and Novak (2019) link phonetic signals in the human voice when interacting with voice-activated assistants with consumer experiences, and differentiate between command-based ("Alexa, length of marathon") and request-based ("Alexa, can you tell me the length of a marathon?") voice inputs.

Our research question centers on the idea that differential experiences of the interaction with a voice interface may have downstream consequences. Consumers may experience this interaction differently depending on whether they have already started their accommodation process towards talking "with a Machine". Consumers that already use voice-activated devices would be accommodated to using Commands instead of Requests, while the opposite would be true for those that have never used such devices. This differential extent of accommodation may create friction in their experience, which may lead to compensatory processes to resolving the power imbalance between the voice-assistant and the user. In this paper, we examine the impact of device-dependent voice Interactions on consequential marketing outcomes like the evaluation of "status"-related cues. A set of three studies tests these ideas.

In the first study (N= 114), participants worked in individual lab rooms with an Amazon Echo dubbed "Computer." Participants were given a 3-minute practice run. At that point, participants were given 8 tasks to fulfill with their Echo and told they would get rewarded by their performance. We then measured their level of language accommodation ("I changed the way I spoke to make it easier for X to understand me"; 0-100) and their success communicating (1-7). Individual differences in their experience (yes/no) with Alexa and with voice-activated phone systems were recorded.

Study 1: We identify a significant two-way interaction between whether participants had prior experience with Alexa or with other voice-operated systems in the extent of language accommodation (F $(1,113)=3.87$, p <0.05) and communication effectiveness (F $(1,113)=6.73$, $p<.01$). Participants accommodated less and experienced less effectiveness in their communication when they had not used Alexa or Siri before ($M_{accommod;success}$ = 45; 5.7) or had used Siri but not Alexa ($M_{accommod;success}$ = 35; 6.2), compared with when they had already used Alexa and other voice-activated systems ($M_{accommod;success}$ = 55; 6.6).

Study 2 (N= 159) and 3 (N= 80) followed a similar procedure as study 1. Participants were given 8 tasks to fulfill. However, when interacting with the voice-activated assistant (either just repeating the sentence to the screen - study 2 - or interacting with the actual Echo dubbed "Computer" - study 3), participants were directed to use either Commands or Requests (e.g. "Alex, Turn on the TV" instead of "Alex, Can you turn on the TV?"). After that, they answered a set of questions about language accommodation, communication effectiveness, and prior experience with Alexa and other voice-activated devices. In study 2, they also rated whether their experience was that of a 1 = Master; 7 = Servant. In study 3, we included some downstream DVs: a) Attitude towards status-cuing ads ("A symbol of status. The Office Pen is designed to attract attention with its sophisticated design") vs. a non-status driven ad ("A symbol of quality. The Office Pen is designed to perform consistency with its extraordinary quality"; 7-point scale: "I would like/share this ad"); b) Evaluation of status-cuing products (*WTP* (10% to 120% of retail price) for status (e.g. briefcase, silk tie) vs. non-status (e.g. sofa, washing machine)).

Study 2: We identify a significant two-way interaction between whether participants had prior experience with Alexa and whether they were using Commands/Requests in the extent in which they felt like a Servant (F $(1,158)=3.49$, $p<0.05$), their language accommodation (F $(1,158)=8.66$, $p<0.01$) and communication effectiveness (F $(1,113)=3.41$, $p<.07$). With prior Alexa experience, participants felt more like a Master using Commands ($M_{Command}$ = 5 vs. $M_{Request}$ = 3.8), while those without experience using Requests ($M_{Command}$ = 4.2 vs. $M_{Request}$ = 4.6). When using Commands, those with experience accommodated much less than those without experience ($M_{Alexa\_experience}$ = 35 vs. $M_{Alexa\_no\_experience}$ = 62).

Study 3: We identify a significant two-way interaction between whether participants had prior experience with Alexa and were using Commands/Requests in their relative evaluation of status items (F $(1,80)=4.09$, $p<0.05$) and marginal for attitude towards status claims (F $(1,80)=2.40$, $p<.10$). Without prior Alexa experience, participants exhibited lower relative evaluations towards status items when using Commands ($M_{Command}$= .85 vs. $M_{Request}$ = 1.15), while those with experience when using Requests ($M_{Command}$= 1 vs. $M_{Request}$ = .90).

Taken together, device-dependent voice Interactions like the evaluation of "status"-related items. This results could be driven by the pattern of language accommodation when talking to voice-activated assistants, which may lead to compensatory behavior based on the consumers' conversational experience.

Is That an Accent I Hear?
How a Digital Voice Assistant's Accent Affects Consumer Perceptions and Intentions

EXTENDED ABSTRACT

Is a Chinese horoscope more likely to come true if the fortune teller speaks with a Mandarin accent? The country-of-origin (COO) literature (Hong and Wyer 1989, 1990) suggests it is possible to produce positive market outcomes by leveraging existing associations between cultures and products, such as the French and wine. However, when most digital devices–like Amazon's Alexa–feature standard voices in a user's native language, would adding accents to particular responses help or hurt user perceptions? Two studies suggest that a native accent can dominate, but that deliberately adding accents to particular responses can affect user-related outcomes via perceptions of fit and competence.

To date, the majority of smart devices feature female voices speaking a user's native language without any regional accent (Kinsella 2019; West, Kraut, and Chew 2019). For some devices, consumers are able to customize the specific language and gender of a device's voice, but regional accents, foreign accents, and dialects are not yet customizable features (Fingas 2018). For English-speaking consumers, the fact that English tends to be perceived as the "international" language and even as the expected voice for companies engaged in global business may explain why English is the default language setting for most smart devices (Krishna and Ahluwalia 2008). When it comes to smart devices, English is the *expected* voice.

However, English as the default language ignores the vast literature on the COO effect in which consumers link positive associations between particular products and their source country (Bilkey and Nes 1982; Erickson, Johansson, and Chao 1984; Han 1989, Hastak and Hong 1991). These associations typically result in greater liking, purchase intentions, and satisfaction for the product, such as paying more for pasta from Italy (Hong and Wyer 1989, 1990; Johansson, Douglas, and Nonaka 1985). Once a particular COO association has been established, deviations or incongruities with that association can produce negative outcomes that could have been avoided by omitting any COO reference in the first place (Melnyk, Klein, and Volckner 2012).

That English is generally considered the default "voice" for global business poses an interesting question with respect to smart device voices: what happens when a smart device response, provided in English, is delivered with a foreign accent? The goal of the current research is to explore the extent to which an accent for a smart device's voice predictably affects consumer outcomes. We predict that the standard, American English accent--recognized as the default, global business language and accent--is likely to yield positive outcomes given its ubiquitousness and familiarity. However, we argue that English spoken with particular foreign accents--like Mandarin or French--can help or hinder consumer outcomes depending on context. Specifically, when a positive COO association exists, the relevant accent should bolster consumer outcomes; when no such association exists, the accent should harm consumer outcomes.

A pilot study tested people's beliefs about our predictions. Participants (N =198) rated whether they thought accents could affect their perceptions and behaviors. Participants were significantly likely to say that accent, gender, and vocal age would certainly *not* affect their perceptions of truth, product quality, or behavioral intentions.

We next tested how accents actually influence people's perceptions and behavioral intentions.

In Study 1, participants (N = 183) heard a vocal instruction that was created using Amazon's Polly Artificial Intelligence. A smart home device gave recipe instructions for grilled cheese or French toast in a voice with an American or French accent. As predicted, the interaction of recipe and accent was significant on participants' recommendations (p = .02). When the AI had an American accent, French toast (M = 4.79) versus grilled cheese (M = 5.23) recipes did not influence recommendations (p = .12). However, speaking with a French accent for French toast (vs. grilled cheese) increased recommendations (M = 4.53 vs. M = 3.99; p = .05). The interaction effect was also significant on the perceived fit of voice (p < .001). While a French accent increased the perceived fit with French toast more than with grilled cheese (M = 4.51 vs. M = 3.21; p < .001), an American accent increased the perceived fit with grilled cheese more than with French toast (M = 5.62 vs. M = 4.69; p = .001). Importantly, the perceived fit was a significant underlying mechanism for a French, not American, accent (95% CI for index of moderated mediation = [.83, 1.78]). Only when the AI spoke with a French accent, providing the French (vs. American) recipe increased the perceived fit between product and voice and subsequently increased participants' recommendations.

Study 2 further examined the underlying processes in a new context. Participants (N = 193) heard an audio clip of a Chinese or Zodiac horoscope read in a voice with either a Chinese accent or an American accent. They rated the extent to which they believe the horoscope would come true, the amount they are willing to pay for a 1-year subscription, the perceived fit of voice, and the perceived competence of the AI. As predicted, horoscope and accent resulted in a significant interactive pattern that was similar to Study 1, on all of the measures (ps < .04). A significant moderated serial mediation showed that only when the AI had a Chinese accent, reading the Chinese (vs. Zodiac) horoscope increased the perceived fit, which enhanced the perceived competence and subsequently the level of belief and willing to pay.

Despite the fact that individuals do not think a smart device's accent can affect their perceptions and behavioral intentions, two experiments provide initial evidence to the contrary. Although an American English accent consistently yielded positive effects on consumer outcomes and intentions, ethnic accents bolstered consumer outcomes in COO-relevant contexts and diminished those outcomes in non-COO-relevant contexts. Further, the better the perceived fit of the voice, the higher the perceived competence of the smart device. This better fit and greater competence had important consequences on consumer outcomes that users did not think were possible. Together, results suggest that simply altering the accent of a smart device's voice can have interesting consumer implications.

Not-so Easy Listening:
Roots and Repercussions of Auditory Choice Difficulty in Voice Commerce

EXTENDED ABSTRACT

Will shopping by voice resonate with consumers or will the many upbeat forecasts (e.g. Hayllar and Coode 2018; Simms 2019) prove to be mostly chatter? We take an information-processing perspective to suggest that voice shopping can be cognitively challenging for consumers, particularly when they need to make comparisons.

While presenting information to consumers by voice is not new (e.g. radio advertisements or spoken daily specials), interest in this area has boomed since voice assistants like Amazon Alexa opened a new shopping channel. Yet research into auditory consumer behavior is relatively scarce (Krishna 2010; Meyers-Levy, Bublitz, and Peracchio 2010). While there are undoubtedly aspects to shopping by voice that make it more like a human *social* interaction (e.g. Schroeder and Epley 2016), we compare text presented visually (in writing) to the same text spoken aloud and explore the underlying *cognitive* processes.

In the context of persuasive messaging, some studies have directly compared spoken words to their equivalent written form, as we do in this research (e.g. Chaiken and Eagly 1976, 1983; Sparrow 2007; Unnava, Burnkrant, and Erevelles 1994). However, we focus on the novel circumstance of choices made from options presented by voice, suggesting that this context may be particularly challenging for consumers.

It is not necessarily the case that spoken information is always harder to process. Indeed, processing auditory information is generally easier than reading text (Liberman 1989)prior to all others: why is it easier to perceive speech than to read, and why is it easier to speak a word than to spell it? My aim is to repair these omissions. To that end, I divide my talk into two parts. First, I say why we should consider that the greater ease of perceiving and producing speech is paradoxical, by which I mean to suggest that the reasons are not to be found among surface appearances. Then I propose how, by going beneath the surface, we can find the reasons, and so resolve the paradox. THE PARADOX Before developing the paradox. I should first remind you that perceiving and produCing speech are easier than reading or writing. for thiS is the point from which I depart and to which I will. at the end. return. The relevant facts include the following. (1, a sentiment anyone who has hesitated to read subtitles in a foreign-language film can appreciate. For proficient readers however, differences in processing difficulty between text and speech may be minimal, with comprehension of written text (books) and auditory text (audiobooks) being generally similar (Gernsbacher, Varner, and Faust 1990). However, for particularly difficult passages, reading can be easier than listening due to an ability to re-read (Daniel and Woody 2010).

We propose that voice shopping is challenging due to difficulty making auditory comparisons. Voice comparisons require a greater reliance on memory. Spoken words persist only in the instant of their utterance while typeset words can be re-visited with ease. A rich literature in consumer behavior has demonstrated that holding information in memory can interfere with processing new information due to increased cognitive load (Shiv and Fedorikhin 1999)compared to a second (fruit salad. Limitations on memory may also enhance the likelihood of ignoring some of the information (e.g. Tversky 1972) an aspect is selected (with probability proportional to its weight, and consumers might rely on summary information or on important attributes when choosing, rather than integrate all available information.

We predict that these processes will lead auditory consumers to have greater difficulty processing choice options compared to visual consumers with three consequences. First, auditory difficulty may make accepting a recommendation more likely, as difficulty while choosing can increase acceptance of advice (Gino and Moore 2007). Second, auditory consumers may be more likely to "defer" choice by choosing none of the available options, which also becomes more likely as choice difficulty increases (Dhar 1997) or even as the subjective feeling of choice difficulty increases (Novemsky et al. 2007). Third, because cognitive load disrupts attitude formation (Cronley, Mantel, and Kardes 2010), we predict that auditory consumers will have less polarized attitudes toward items they evaluate in a comparative context.

Experiments 1a-1i confirmed the above hypotheses. In Experiment 1a, in-lab participants chose a lip balm as a free gift. One of two options was recommended. Based on random assignment, half the participants heard the options read aloud to them in the voice of "Alexa" and half read the same information. Participants chose one and were given it to keep. As predicted, a significantly greater percentage of auditory participants chose the recommended option ($\chi^2(1;N=74)=6.77,p=.009$).

In Experiment 1b (preregistered), participants faced a similar (hypothetical) choice, but could also defer. Auditory participants were more likely to choose the recommended option ($\chi^2(1;N=603)=17.06,p<.001$). They also deferred more often $\chi^2(1;N=603)=15.43,p<.001$), as predicted. Attitudes toward both choices revealed less polarized attitudes among auditory consumers ($F(1,601)=19.24,p<.001$), also as predicted. A processing difficulty scale ("complex," "complicated," "easy to comprehend" (reverse); Anand & Sternthal, 2006) mediated the effect of presentation mode on choice. Additional measures suggested the effects were not due differences in anthropomorphism or trust.

Experiments 1c through 1i demonstrated robustness across various stimuli and voices, controlling for order effects, and when the visual stimuli were presented sequentially or in an ephemeral manner mimicking speech.

Experiments 2 through 4 provided evidence that the effects are specifically related to difficulty making comparisons in auditory mode. In Experiment 2, we crossed presentation mode (voice vs. text) with a classic joint versus separate evaluation paradigm (Hsee 1996), reasoning that preference reversals should be less likely by voice due to difficulty learning from context. As predicted, we replicated the classic preference reversal only in visual mode. Auditory consumers' evaluations were similar whether considering the options jointly or each option separately. Experiment 3 (preregistered) extended this idea to comparisons of items previously encountered. Consumers rated a single novel product less favorably when it was described by voice and they compared to one they had encountered previously, but evaluations were similar when consumers were not making comparisons. In experiment 4, manipulating the difficulty of making comparisons eliminated the differences that naturally exist between the conditions and provided stronger causal evidence.

Experiments 5 and 6 explored the role of memory. In experiment 5, working memory was measured with a "digit span" task (recalling strings of numbers). As consumers' working memory capacity improved, the differences in choice outcomes between auditory and visual consumers diminished. Experiments 6a and 6b used the insight that the effects are related to memory to design interventions useful for marketing managers. Negative effects of voice presentation can be mitigated by explicitly stating the comparative value of an option, eliminating the need to make comparisons (Experiment 6a) or by describing the choice options in a by-feature (rather than by-option) manner (Experiment 6b), which reduces the time and amount of information needed to be held in memory.

This research represents one of the first explorations of voice commerce and contributes to our understanding of auditory judgment and decision making.

REFERENCES

Acquisti, Alessandro, Laura Brandimarte, and George Loewenstein (2015), "Privacy and Human Behavior in the Age of Information," *Science*, 347 (6221), 509-14.

Anand, Punam and Brian Sternthal (2006), "Ease of Message Processing as a Moderator of Repetition Effects in Advertising," *Journal of Marketing Research*, 27(3), 345.

Bilkey, Warren J. and Eric Nes (1982), "Country-of-origin effects on product evaluations," *Journal of International Business Studies*, 13 (1), 89–100.

Campos, Ivan (2017), "The Era of Voice: From Keyboards to Vocal Chords," *Medium* (June 25), https://medium.com/slalom-technology/the-era-of-voice-from-keyboards-to-vocal-cords-5f891705a5ea

Chaiken, Shelly and Alice H. Eagly (1976), "Communication Modality as a Determinant of Message Persuasiveness and Message Comprehensibility.," *Journal of Personality and Social Psychology*, 34(4), 605–14.

——— (1983), "Communication Modality as a Determinant of Persuasion: The Role of Communicator Salience.," *Journal of Personality and Social Psychology*, 45(2), 241–56.

Chartrand, Tanya L. and John A. Bargh (1999), "The Chameleon Effect: The Perception-behavior Link and Social Interaction," *Journal of Personality and Social Psychology*, 76 (6), 893–910.

Chartrand, Tanya L. and Jessica L. Lakin (2013), "The Antecedents and Consequences of Human Behavioral Mimicry," *Annual Review of Psychology*, 64, 285-308.

Cronley, Maria L., Susan Powell Mantel, and Frank R. Kardes (2010), "Effects of Accuracy Motivation and Need to Evaluate on Mode of Attitude Formation and Attitude–Behavior Consistency," *Journal of Consumer Psychology*, 20(3), 274–81.

Daniel, David B. and William Douglas Woody (2010), "They Hear, but Do Not Listen: Retention for Podcasted Material in a Classroom Context," *Teaching of Psychology*, 37(3), 199–203.

Dawar, Niraj (2018), "Marketing in the Age of Alexa," Harvard Business Review," (June), https://hbr.org/2018/05/marketing-in-the-age-of-alexa

Dhar, Ravi (1997), "Consumer Preference for a No-Choice Option," *Journal of Consumer Research*, 24(2), 215–31.

Erickson, Gary M., Johny K. Johansson, and Paul Chao (1984), "Image Variables in Multi-attribute Product Evaluations: Country-of-Origin Effects," *Journal of Consumer Research*, 11 (2), 694–99.

Fingas, Jon (2018, July 19), "*Voice Assistants still Have Problems Understanding Strong Accents*," *Engadget*, https://www.engadget.com/2018/07/19/voice-assistant-problems-understanding-accents/

Gallois, Cindy, Tania Ogay and Howard Giles (2005), "Communication Accommodation Theory: A Look Back and a Look Ahead," in *Theorizing about Intercultural Communication*, ed. W. Gundykunst, Thousand Oaks: Sage, 121-148.

Gartner (2016), "Top Strategic Predictions for 2017 and Beyond: Surviving the Storm Winds of Digital Disruption," *Gartner* (October 14), https://www.gartner.com/binaries/content/assets/events/keywords/cio/ciode5/top_strategic_predictions_fo_315910.pdf

Gernsbacher, Morton A., Kathleen R. Varner, and Mark E. Faust (1990), "Investigating Differences in General Comprehension Skill.," *Journal of Experimental Psychology: Learning, Memory, and Cognition*, 16(3), 430–45.

Gino, Francesca and Don A. Moore (2007), "Effects of Task Difficulty on Use of Advice," *Journal of Behavioral Decision Making*, 20(1), 21–35.

Han, C. Min (1989), "Country Image: Halo or Summary Construct?," *Journal of Marketing Research*, 26 (2), 222–29.

Hastak, Manoj and Sund-Tai Hong (1991), "Country-of-Origin Effects on Product Quality Judgments: An Information Integration Perspective," *Psychology & Marketing*, 8 (2), 129-143.

Hayllar, Will and Matt Coode (2018), *The Talking Shop: The Rise of Voice Commerce*, London.

Hoffman, Donna L. and Thomas P. Novak (2018), "Consumer and Object Experience in the Internet of Things: An Assemblage Theory Approach", *Journal of Consumer Research*, 44 (6), 1178-1204.

Hong, Sung-Tai and Robert S. Wyer Jr. (1989), "Effects of Country-of-Origin and Product-Attribute Information on Product Evaluation: An Information Processing Perspective," *Journal of Consumer Research*, 16 (2), 175-87.

Hong, Sung-Tai and Robert S. Wyer Jr. (1990), "Determinants of Product Evaluation: Effects of the Time Interval between Knowledge of a Products Country of Origin and Information about its Specific Attributes," *Journal of Consumer Research*, 17 (3), 277–88.

Hsee, Christopher K. (1996), "The Evaluability Hypothesis: An Explanation for Preference Reversals between Joint and Separate Evaluations of Alternatives," *Organizational Behavior and Human Decision Processes*, 67(3), 247–57.

Jahandarie, Khosrow (1999), "Structural Differences between Speech and Writing: The Linguistic Evidence," in *Spoken and Written Discourse: A Multi-Disciplinary Perspective,* K. Jahandarie ed., Stamford, CT: Ablex, 131-51.

Johansson, Johny K., Susan P. Douglas, and Ikojiro Nonaka (1985), "Assessing the Impact of Country of Origin on Product Evaluations: A New Methodological Perspective," *Journal of Marketing Research*, 22 (4), 388-96.

Kinsella, Bret (2019), "U.S. Consumers Do Express a Preference for Female Gendered Voice Assistants According to New Research," *Voicebot.ai*, https://voicebot.ai/2019/11/23/u-s-consumers-do-express-a-preference-for-female-gendered-voice-assistants-according-to-new-research/

Kinsella, Bret (2019), "Twice the Number of U.S. Adults Have Tried In-Car Voice Assistants as Smart Speakers," *Voicebot.ai*, https://voicebot.ai/2019/01/15/twice-the-number-of-u-s-adults-have-tried-in-car-voice-assistants-as-smart-speakers/

Krishna, Aradhna (2010), "An Introduction to Sensory Marketing," in *Sensory Marketing*, ed. Aradhna Krishna, New York: Routledge, 1–13.

——— and Rohini Ahluwalia (2008), "Language Choice in Advertising to Bilinguals: Asymmetric Effects for Multinationals versus Local Firms, *Journal of Consumer Research*, 35 (4), 692–705.

Koslow, Scott, Prem N. Shamdasani and Ellen E. Touchstone (1994), "Exploring Language Effects in Ethnic Advertising: A Sociolinguistic Perspective," *Journal of Consumer Research*, 20(4), 575-85.

Levin, Michael R. and Joshua N. Lowitz (2019), "Smart Speaker Market Takes Off in Holiday Quarter," CIRP.com, https://files.constantcontact.com/150f9af2201/5c84cae5-7ff0-403d-acd5-9065db944222.pdf

Liberman, Alvin M. (1989), "Reading Is Hard Just Because Listening Is Easy," in *Wenner-Gren International Symposium Series: Brain and Reading*, ed. C. von Euler, Hampshire, England: Macmillan, 197–205.

Melnyk, Valentyna, Kristina Klein, and Franziska Völckner (2012), "The Double-Edged Sword of Foreign Brand Names for Companies from Emerging Countries," *Journal of Marketing*, 76 (6), 21–37.

Meyers-Levy, Joan, Melissa G. Bublitz, and Laura A. Peracchio (2010), "The Sounds of the Marketplace: The Role of Audition in Marketing," in *Sensory Marketing*, ed. Aradhna Krishna, New York: Routledge, 137–56.

Moon, Youngme (2000). "Intimate Exchanges: Using Computers to Elicit Self-Disclosure From Consumers," *Journal of Consumer Research*, 26 (4), 323-39.

Nissenbaum, Helen (2009), *Privacy in Context: Technology, Policy, and the Integrity of Social Life*. Stanford University Press.

Novemsky, Nathan, Ravi Dhar, Norbert Schwarz, and Itamar Simonson (2007), "Preference Fluency in Choice," *Journal of Marketing Research*, 44(3), 347–56.

Schroeder, Juliana and Nicholas Epley (2016), "Mistaking Minds and Machines: How Speech Affects Dehumanization and Anthropomorphism," *Journal of Experimental Psychology: General*, 145(11), 1427–37.

Shiv, Baba and Alexander Fedorikhin (1999), "Heart and Mind in Conflict: The Interplay of Affect and Cognition in Consumer Decision Making," *Journal of Consumer Research*, 26(3), 278–92.

Simms, Kane (2019), "How Voice Assistants Could Change the Way We Shop," *Harvard Business Review*, May.

Sparrow, Nick (2007), "Quality Issues in Online Research," *Journal of Advertising Research*, 47(2), 178–82.

Sproull, Lee and Sara Kiesler (1986), "Reducing Social Context Cues: Electronic Mail in Organizational Communication," *Management Science*, 32 (11), 1492– 1512.

Statista (2018), "Frequency with which Smartphone Owners Use Voice-Enabled Technology in the United States in 2017," *Statista* (July 12), https://www.statista.com/statistics/787369/voice-technology-utilization-in-us/

Sterling, Greg (2016), "Google Says 20 Percent of Mobile Queries Are Done by Voice Searches," Search Engine Land (May 18), https://searchengineland.com/google-reveals-20 percent-queries-voice-queries-249917

Tversky, Amos (1972), "Elimination by Aspects: A Theory of Choice," *Psychological Review*, 79(4), 281–99.

Unnava, H. Rao, Robert E. Burnkrant, and Sunil Erevelles (1994), "Effects of Presentation Order and Communication Modality on Recall and Attitude," *Journal of Consumer Research*, 21(3), 481.

West, Mark, Rebecca Kraut, and Han Ei Chew (2019), "I'd Blush if I Could: Closing Gender Divides in Digital Skills through Dducatio," *UNESCO and EQUALS Skills Coalition.*

Wisniewski, Matthew G., James T. Mantell, and Peter Q. Pfordresher (2013), "Transfer Effects in the Vocal Imitation of Speech and Song," *Psychomusicology: Music, Mind, and Brain, 23,* 82–99.

Words and Beyond: Using Language to Better UnderstandConsumer Experiences and Goals

Chair:Gizem Ceylan, University of Southern California, USA

Paper #1: Emotional Echo Chambers: Observed Emoji Clarify Individuals' Emotions and Responses to Social Media Posts

Sarah G. Moore, University of Alberta, Canada
Gopal Das, Indian Institute of Management Bangalore, India
Anirban Mukhopadhyay, HKUST, Hong Kong

Paper #2: Is a Photo Worth a 1000 Words? The Usage of Images and Text to Express Opinions in Online Reviews

Gizem Ceylan, University of Southern California, USA
Kristin Diehl, University of Southern California, USA

Paper #3: Construal Matching in Online Search: Applying Text Analysis to Illuminate the Consumer Decision Journey

Ashlee Humphreys, Northwestern University, USA
Mathew S. Isaac, Seattle University, USA
Rebecca Jen-Hui Wang, Lehigh University, USA

Paper #4: Conversational Receptiveness: Improving Engagement with Opposing Views

Mike Yeomans, Imperial College, UK
Julia Minson, Harvard Kennedy School, USA
Hanne Collins, Harvard Business School, USA
Frances Chen, University of British Columbia, Canada
Francesca Gino, Harvard Business School, USA

SESSION OVERVIEW

Consumers produce written content for themselves or other consumers every day. They write reviews, enter search queries, and create information on websites like Wikipedia. Doing this, people use words alone or in combination with visuals to express their opinions or goals. Past research shows that the words people use can reveal important aspects of their social and psychological worlds (Pennebaker, Mehl, and Niederhoffer 2003). With advances in computer technology, text analysis allows researchers to reliably and quickly gain insights into what people say. In this session, we examine how people choose the words they use as a function of their *supplementary use of visuals* and their *goals,* and examine novel consequences of verbal-visual communication. Jointly, these presentations uncover insights about antecedents and consequences of consumers' word choices as they move through their decision journey, contribute to discussion forums, and write recommendations for others. Papers in this session ask: Do consumers express themselves differently when they use emoji (presentation1) or pictures (presentation2) together with text? Do consumers' internal goals impact their word choice when they create search queries (presentation3) or generate Wikipedia entries (presentation4)? Jointly, these papers examine novel factors that affect consumers' word choices when using different ways to express themselves and their subsequent decision.

Moore, Das, and Mukhopadhyay distinguish how people use emojis to complement or substitute text when responding to others' posts. They find when people respond to posts with mixed emotions, the emoji predominantly used by previous posters drives their own emoji choice and felt emotions. Further, the emotional contagion from such an anchor emoji increases the likelihood of using both text and emoji when responding.

Ceylan and Diehl examine whether people use photos to complement or substitute text when communicating their experiences. They find that photos complement text the more people focus on visual aspects of the experience. Internal factors (i.e., caring about visual aspects) or external factors (i.e., choosing photos ahead of text) heighten visual focus in consumers' writing and increase the likelihood of sharing a photo.

Humphreys, Isaac, and Wang examine how people's transactional (vs. informational) goals impact their word choice in online search queries. They find that people use more concrete words when they are in a concrete mindset. Further, consumers respond more favorably to search engine results and ad content whose language matches their construal level.

Yeomans et al. explores how words indicating receptiveness to opposing opinions can affect readers' perceptions, engagement, and willingness to cooperate. While using receptiveness words fosters trust and cooperation, this effect is often underappreciated by writers who do not anticipated the positive consequences of receptiveness.

Taken together, these presentations identify the antecedents and consequences of consumers' word choices by adopting novel methodologies in a variety of consumption settings. All papers are at an advanced stage, employing a range of methodologies and contexts. None of these papers has been previously presented at ACR. We expect this session will generate significant interest among researchers studying word of mouth, online sharing, natural language processing, and social media.

Emotional Echo Chambers: Observed Emoji Clarify Individuals' Emotions and Responses to Social Media Posts

EXTENDED ABSTRACT

Imagine an individual browsing on Facebook—a daily activity for more than 1.5 billion people (Facebook 2019). This individual sees a friend's post expressing mixed emotions about their grandmother's passing. She notes that others have already responded to the post, some with a sad emoji, and some with a love emoji. How are her feelings and responses to the post shaped by others' prior responses? We find that if others have responded to the post with predominantly sad (love) emoji, the individual in question—and subsequent others—will feel sadder (happier), will be more likely to respond to the post, and will be more likely to respond with a sad (love) emoji. This process may create "emotional echo chambers," contributing to the polarization of opinion and emotion on social media (Toubiana and Zietsma 2017).

Emoji are icons used to convey emotion (e.g., ☺; Oxford English Dictionary 2018), and are a form of textual paralanguage (TPL), which expresses audible, tactile, or visual elements of face-to-face communication in text (Luangrath, Peck, and Barger 2017). In 2016, in addition to the like emoji, Facebook began offering love, haha, wow, sad, and angry emoji reactions to posts. In the subsequent twelve months, these emoji were used 800 million times per day (Cohen 2017). Further, nearly half of Americans (48.9%) use emoji on social media or in text messages (Pilon 2015), and over half of Instagram posts contain emoji (Morrison 2017).

Despite their popularity, it is unclear how use of—or exposure to—emoji affects consumers. Thus, we examine how social media users are impacted by "anchor emoji"—others' prior emoji responses to a post. In doing so, we identify the potential for anchor emoji to

create emotional echo chambers—a substantive issue for consumers, firms, and policy makers. Further, we investigate emoji as a unique type of TPL, which can be used independent of text. Finally, we contribute to theory on emotional contagion. Recent work has established that emoji can lead to contagion (Smith and Rose 2019). The online context allows us to build on this work by: 1) exploring contagion arising from multiple, anonymous emoji; 2) investigating contagion from mixed emotions; 3) testing a new source of contagion: others' emoji responses to a post, rather the post's content. Our results establish anchor emoji as a novel form of unintended and indirect contagion.

We predict that consumers will use the distribution of anchor emoji in response to a given social media post as an input to their own responses. Hence, the same post may generate different emotional and emoji responses from consumers, depending on the distribution of anchor emoji. We suggest that anchor emoji (e.g., sad vs. love) clarify consumers' emotions in response to mixed emotional content (e.g., sad and happy), resulting in felt emotions and emoji choices that correspond with the anchor emoji. A field data sample of 100 posts (with ~200,000 emoji reactions) from CNN's Facebook page supported this conjecture: the first emoji response to a post significantly predicted subsequent emoji reactions.

Study 1 provided a causal test of this notion. Participants (N = 389; MTurk) imagined viewing a friend's mixed emotional Facebook post about their grandmother's passing (i.e., happy and sad; Williams and Aaker 2002). We manipulated the anchor emoji that appeared with the post. Participants saw no anchor emoji (all emoji were zero), one heart anchor emoji (all others zero), or one sad anchor emoji (all others zero). They indicated which of the six emoji they would choose if they were to respond to their friend's post, and reported their feelings on 14 emotion items. Anchor emoji condition predicted participants' chosen emoji: those in the sad (love) anchor condition were more likely to select a sad (love) emoji. Further, participants in the love (sad) anchor emoji conditions felt more (less) positive and less (more) negative emotion than those in the control condition. Felt emotion mediated the relationship between anchor emoji condition and emoji choice. A supplementary study (1A) replicated these effects and demonstrated that anchor emoji impacted not only emoji choice, but participants' overall likelihood of responding.

Using the same mixed emotional post as Study 1, Study 2 aimed to replicate these effects using multiple anchor emoji (N = 311; undergraduates). In the sad (love) anchor emoji condition, participants saw a like emoji and a sad (love) emoji with the number 107, indicating that 107 others had responded to the post, some with like reactions and some with sad (love) reactions. The control condition showed no anchor emoji. This study also manipulated the order in which participants chose an emoji and reported felt emotion, to confirm that choices were driven by felt emotion (and not vice versa). We found that regardless of order, participants in the sad (love) anchor emoji condition were more likely to choose a sad (love) emoji, relative to the control condition and to the other anchor emoji condition. Felt emotion showed corresponding effects, and mediated participants' emoji choices.

Study 3 (N = 484; MTurk) explored the relationship between emoji and text responses. We tested whether emoji responses supplement or replace commenting on a post (Luangrath et al. 2017). Our prediction was that the emotional contagion from anchor emoji would increase the likelihood of responding with both. Using a different mixed emotional post (a dog dying), we manipulated anchor emoji condition (control, sad) and whether participants were: 1) forced to choose either an emoji or a comment as a response; or 2) free to choose either response, or both. We found that participants in

the free choice condition who were exposed to a sad anchor emoji felt the most negative emotion, and were the most likely to select both an emoji and a comment as a response. This suggests that when anchor emoji are present, observers' felt emotions mirror the anchor, and that emoji and text responses supplement one another.

To sum, consumers' emotional responses to mixed emotional posts are clarified by anchor emoji, leading them to make corresponding emoji choices and potentially creating "emotional echo chambers".

Is a Photo Worth a 1000 Words? The Usage of Images and Text to Express One's Opinions

EXTENDED ABSTRACT

People have more ways than ever to share and communicate thoughts and experiences to other people. In particular, camera-enabled phones have created the ability to easily share experiences not just verbally but also visually. Hence our research asks: How do people use visual and verbal information when communicating their experiences? Specifically, we examine whether people use pictures to *complement* or *substitute* text. Lay belief may suggest that "a picture is worth 1000 words" and hence that pictures may *substitute* text. Alternatively, people may want to "show and tell", in which case pictures may *complement* text (and vice versa). In this project, we investigate how and why people combine these different forms of expression.

Study 1 examines the relationship between text and pictures in the context of online reviews. We examined whether greater focus on visual aspects of the experience would increase or decrease the usage of photos in two large restaurant review datasets (from Yelp! and TripAdvisor). We found that people were more likely to post a photo when they provided greater *visual* detail (measured by the number of words from the "see" category in LIWC) in both the Yelp! ($\beta = 0.11$, $t = 44.5$, $p < .001$) and TripAdvisor ($\beta = 0.05$, $t = 15.9$, $p < .001$) datasets. This relationship also occurred for the number of photos included (Yelp!: $\beta = 0.06$, $t = 27.7$, $p < .001$; TripAdvisor: $\beta = 0.03$, $t = 15.3$, $p < .001$) and held for expert and non-expert reviewers and controlling for word-count (excluding see words) as well as restaurant-specific factors. These analyses suggest that reviewers use pictures to *complement* words when they focus more on visual aspects of the experience.

In **study 2**, we manipulated the number of see words in a product review and tested whether greater focus on visual aspects heightens photo use. This study followed a three-group design. We recruited 598 participants (41.2% female; mean$_{age}$ = 35.8) on MTurk (preregistration: osf.io/jd23r/). Participants imagined they had written a review of a computer mouse and read "their" 140 words- review. Participants in the no-see words condition read a review that included no words from LIWC's "see" category. In the low-see [high-see] words condition "see" words constituted 10% [30%] of the review. Participants indicated whether they would consider adding a photo when posting this review (Yes = 1, No = 0), our independent variable. In line with the correlational data, a greater percentage of participants in the high-see words condition (86%) indicated that they would include a photo compared to the no-see words condition (75%), $t(598) = 3.09$, $p = .002$. Participants in the low-see words condition were directionally but not statistically significantly more likely to include a photo with their review (82%) compared the no-see words condition (75%), $t(598)=1.4$, $p=.16$. This study provides causal evidence that using more visually-focused words heightens photo sharing.

Studies 1 and 2 suggest a complementary relationship between text and photos. In study 3, we manipulated people's focus within an experience. We recruited 400 respondents on MTurk (41.2% female; meanage = 35.8) but excluded 66 people due to non-compliance with instructions (preregistration: https://osf.io/472xy). Participants imagined writing an email to a friend about their positive experience at a restaurant. Participants first identified 3-5 elements that positively influenced their experience that either related to the look of the food and the design of the restaurant (visual-focus condition) or to the staff and service (human-focus condition). Subsequently, all participants wrote an email to their friend focusing on these elements and then indicated whether they would consider adding a photo to this email (Yes = 1, No = 0). Importantly, participants were more likely to share a photo in the visual-focus (63%) than the human-focus condition (46%), z=3.1, p=.002, again pointing to a complementary relationship.

One aspect inherent to the real-world data but also the lab studies is the order in which text versus pictures are produced: text is written first, then photos are added. This structure may have contributed to the observed complementary relationship which may not exist if photos are selected first. In study 4, we manipulated the order of writing (text-first vs. picture-first) and altered whether text and pictures were produced on the same page or different pages. We recruited 466 participants on MTurk (preregistration: https://osf.io/hmfzc). Procedures followed those of study 3 except that participants indicated 3-5 elements of their choice that impacted their experience positively. In the text-first condition, participants first wrote an email to their friend and subsequently picked a photo of that restaurant (available on Yelp!) to include in their email. In the picture-first condition, these steps were reversed. In the different pages condition, these steps were requested on separate pages, in the same page condition they were requested on one page. We measured participants' focus by their usage of "see" category words. Participants themselves also indicated to what extent they focused on the look of the food and design elements when writing the email. Participants used more see words in the picture-first (M=0.73) than the text-first condition (M=0.65, t(466)=1.83, p=.06), suggesting again a complementary relationship. They also used more see words when text and picture were presented on the same (M=0.77) than on different pages (M=0.61, t(466)=2.14, p=.03). Self-reported measures of visual focus parallel these findings.

Taken together, we find that people use photos complementary to text in communicating their experiences. This is particularly true when they focus on visual aspects of an experience, either due to an internal or external focus. While much research has examined how purely verbal communications are perceived by readers, our findings shed light on an important but unexplored area, namely how both visual and verbal information are used jointly by communicators.

Construal Matching in Online Search: Applying Text Analysis to Illuminate the Consumer Decision Journey

EXTENDED ABSTRACT

This research incorporates Construal Level Theory (Liberman and Trope 1998; Trope, Liberman, and Wakslak 2007) and text analysis (e.g., Humphreys and Wang 2017; Berger et al. 2020) in order to improve outcomes in online search. We propose that as consumers move through the decision journey, they adopt different goals that can be detected through text analysis of their search queries. We hypothesize that consumers with informational [transactional] goals are likely to generate search queries that exhibit different levels of mental construal, or mindsets, i.e., abstract [concrete]. We further posit a fluency-driven matching effect in online search such that consumers respond more favorably to search engine results and ad content containing language that matches their mindset.

In the pilot study, we analyzed a data set of 24,039 search queries. We calculated a concreteness score for each search query in our database using the concreteness dictionary developed by Paetzold and Specia (2016). Our analysis established that, contrary to conventional wisdom, substantial variation exists in the abstractness/concreteness of language used by consumers when performing an online search.

Study 1 is a survey in which university students (N = 369) reflected on the last query they made using a search engine. We found that participants with a transactional goal executed queries that were more concrete (less abstract) than participants with an informational goal. Furthermore, we obtained correlational evidence that participants at an earlier stage of the decision journey (i.e., informational goals) are relatively less likely to visit e-commerce websites and corporate websites than consumers at a later stage (i.e., transactional goals).

Study 2 tests our proposition that construal matching between consumers' stage in the decision journey and the concreteness of the language in a search result will increase their engagement. In this 2 (journey stage: informational vs. transactional) x 2 (search results: abstract vs. concrete) between-participants design, we informed 490 MTurkers that they were repainting their living room. The language used in the description of their journey stage or in the search results was either abstract or concrete. Results confirmed our prediction that participants were more likely to choose a search result whose concreteness matched with the consumer journey stage.

Study 3 assesses how construal level varies for multiple stages of the decision journey. Recruited by a market research firm, 357 U.S. participants were informed that they were considering purchasing a laptop computer, and that consumers tend to progress through three sequential stages – information, comparison, transaction – when making a purchase decision. We assigned the participants to one of the three stages, asked them to execute an online search, and showed them advertisements whose language varied in concreteness. We found that participants in the transactional stage executed searches that were more concrete (less abstract) and preferred more concrete results than participants in the other two stages.

Study 4 explores how the construal matching effect influences consumers' perceived progression through the decision journey. In a 2x2 design, 427 MTurkers were informed that they wanted to learn more about grilling (informational stage) or that they needed to choose a charcoal grill (transactional stage). Then, after being shown a list of either abstract or concrete results, they were asked to indicate the amount of progress they would make on their decision journey if they visited these websites. Participants in the informational stage reported that they would make greater progress when they encountered abstract search results as opposed to concrete search results. However, participants in the transactional stage reported that they would make greater progress when they encountered concrete search results.

Finally, in a field experiment with over 128,000 ad impressions, we investigated actual click behavior in a real-world context. We bid on a set of abstract and concrete keywords that appeared in search queries for a particular product category. We created two versions of an online advertisement that were written using either abstract or concrete language. The field study corroborated the construal matching effect; click-through rates were higher when the language of the search query matched the concreteness of language in the advertisement.

We make three contributions to research on search and consumer journey. First, we demonstrate the influence of construal level in online search and show that firms can increase engagement by matching their content to consumers' mindsets. Second, we illustrate the important substantive consequences of matching construal for improving the search experience and making search advertising more cost- and time-efficient. This work outlines a scalable method for firms to identify consumers' search goals in text and facilitate their progression through the consumer journey. Finally, we highlight the contextual and changing nature of the decision journey. By outlining a straightforward and implementable process by which consumers' mindsets can be reliably categorized based on their own search queries, we add to the burgeoning literature in marketing that shows how text analysis can provide nuanced insight into consumer needs and goals. Digital marketers can leverage this newfound knowledge to serve content that corresponds with consumers' construal level, resulting in greater, customized consumer engagement at a lower cost to advertisers.

Conversational Receptiveness: Improving Engagement with Opposing Views

EXTENDED ABSTRACT

Disagreement is a fundamental feature of social life, in civic spaces, in professional organizations, and in personal relationships at home. Opposing viewpoints are often inevitable in the pursuit of more important organizational and interpersonal goals. Engagement with diverse perspectives can also help us increase the accuracy of our own belief. However, disagreement can also give rise to biased processing, negative inferences, and conflict. While engagement with opposing viewpoints can be beneficial, its effects will be tempered by the contents of those interactions (see Bail et al. 2019; Paluck, Green and Green 2018). Here we examine whether "conversational receptiveness" can foster co-operative goals during disagreement and prevent conversational conflict spirals.

In this research we conduct four studies, and all data, analysis code, stimuli, and preregistrations from each study are available (anonymously) at https://bit.ly/2QwyiuL. In Study 1 we instructed 1,102 participants to write responses to statements written by people with whom they disagree, on one of two controversial issues. A separate group of 1,322 participants read responses from people with opposing viewpoints, and evaluated how receptive the writer had been. We parsed the text of the responses into features from the politeness R package (Yeomans, Kantor and Tingley 2018), and we trained a supervised machine learning algorithm (Friedman, Hastie and Tibshirani 2010) to build a receptiveness detection model that was generalizable (for datasets from other domains) and interpretable (to design interventions). This model was just as accurate (pairwise accuracy = 66.8%; p<.001), as any one human rater (65.2%; p<.001). The model focuses on the structural, domain-general elements of the language (hedges, acknowledgment, negation, reasoning), and the model's accuracy was unaffected when it was trained and tested on different topics (65.2%; p<.001). In Studies 2 and 3, we apply the model in conversations from organizational contexts where disagreement naturally arises.

In Study 2, we collected conversations between 238 senior local government officials in an executive education program, who were paired up to discuss controversial policy topics (using a negative assortative matching algorithm to ensure they all disagreed with their partner). After the conversation, participants rated their own and their partner's receptiveness. Partner-rated receptiveness was associated with a range of positive interpersonal benefits, like trust in judgment and willingness to work together (r=.289, p<.001). Furthermore, the receptiveness model from Study 1 predicted these positive interpersonal outcomes (r=.232, p<.001), and also showed that partners' receptiveness converges over time, indicating that one of the benefits of receptiveness is that it is returned in kind (r=.335, p<.001). However, people could not predict how receptive their partner would rate them (r=.048, ns). Our language model held their own speech to a different standard than their partner's speech, focusing more on formality (titles, gratitude, etc.) than demonstrations of listening.

In Study 3 we extend this result to conversations within globally-distributed organizations where disagreement naturally arises, and where people are free talk about many different topics, with many different people. In Study 3A we examine receptiveness among 3,303 students in policy-themed massive open online courses at HarvardX. We collect ideology measures and compare them to the contents of the class discussion forums. We find that on average, students were less receptive to students they disagreed with (r= .099, p < .05). However, the receptiveness of students' posts predicted the receptiveness of the replies they received from other students who disagreed with them (r= .226; p<.001). This suggests that receptiveness is often, and individual choices to be more receptive can foster a more receptive dialogue going forward. In Study 3B, we measure receptiveness during the editorial process of correcting Wikipedia articles. We borrowed a dataset of talk page threads, in which 585 threads ending in personal attacks were each matched to similar thread without an attack (Zhang et al., 2018). We found that editors who were less receptive were more likely to be attacked themselves (59.9%; p<.001).

Study 4 was similar to Study 1 except that some writers were first taught a "recipe for receptiveness", which was developed as a 100-word summary that can be cheaply deployed as a nudge during conversation. Opponents who read the responses from writer who saw the recipe thought they were more trustworthy and persuasive than writers who responded naturally. However, writers did not always predict this effect, and expressed surprising hesitation to be receptive in the future.

Overall, our results suggest that receptiveness is measurable and has meaningful interpersonal consequences but can be under-utilized in part because speakers can misjudge their own receptiveness. Our results also highlight an under-discussed element of recent efforts to improve civic discourse: The linguistic behavior that people exhibit in conversation can powerfully affect their partners' perceptions, engagement, and willingness to cooperate.

REFERENCES

Bail, C., Argyle, L., Brown, T., Bumpus, J., Chen, H., Fallin Hunzaker, M., . . . Volfovsky, A. (2018). Exposure to opposing views on social media can increase political polarization. *Proceedings of the National Academy of Sciences of the United States of America, 115*(37), 9216-9221.

Berger, Jonah, Ashlee Humphreys, Stephan Ludwig, Wendy W. Moe, Oded Netzer, and David A. Schweidel (2020), "Uniting the Tribes: Using Text for Marketing Insight," *Journal of Marketing*, 84 (1), 1-25.

Cohen, David (2017), "Facebook's emoji reactions are now one year old, and they have been used 300 billion times." Retrieved August 5, 2018 from: https://www.adweek.com/digital/facebook-reactions-one-year-old-300-billion/. Facebook.com (2019), "Q4 2019 Results." Retrieved February 27, 2020 from: https://s21.q4cdn.com/399680738/files/doc_financials/2019/q4/Q4-2019-Earnings-Presentation-final.pdf.

Friedman, J., Hastie, T., and Tibshirani, R. (2010). Regularization paths for generalized linear models via coordinate descent. Journal of statistical software, 33(1), 1.

Humphreys, Ashlee, and Rebecca Jen-Hui Wang (2017), "Automated Text Analysis for Consumer Research," *Journal of Consumer Research*, 44 (6), 1274-306.

Liberman, Nira, and Yaacov Trope (1998), "The Role of Feasibility and Desirability Considerations in Near and Distant Future Decisions: A Test of Temporal Construal Theory," *Journal of Personality and Social Psychology*, 75 (1), 5-18.

Luangrath, Andrea Webb, Joann Peck, and Victor A. Barger (2017), "Textual paralanguage and its implications for marketing communications," *Journal of Consumer Psychology*, 27(1), 98-107.

Ma, Jingjing, and Neal J. Roese (2014), "The Maximizing Mind-set," *Journal of Consumer Research*, 41 (1), 71-92.

Morrison, Kimberlee (2017), "Emojis Lead to Higher Engagement on Instagram." Retrieved September 27, 2018 from: https://www.adweek.com/digital/emojis-lead-to-higher-engagement-on-instagram-report/.

Paetzold, Gustavo, and Lucia Specia (2016), "Inferring Psycholinguistic Properties of Words," In *Proceedings of the 2016 Conference of the North American Chapter of the Association for Computational Linguistics: Human Language Technologies*, pp. 435-440.

Paluck, E. L., Green, S. A., and Green, D. P. (2018). The contact hypothesis re-evaluated. *Behavioural Public Policy*, 1-30.

Pilon, Anne (2015), "Emoji Survey: Users Want New Rolling Eye Face Most." Retrieved September 27, 2018 from: https://aytm.com/blog/emoji-survey/.

Smith, Leah and Randall Rose (2019). Service with a smiley face: Emojional contagion in digitally mediated relationships. *International Journal of Research in Marketing*.

Toubiana, Madeline, and Charlene Zietsma (2017), "The message is on the wall? Emotions, social media and the dynamics of institutional complexity," *Academy of Management Journal,* 60 (3), 922-953.

Trope, Yaacov, Nira Liberman, and Cheryl Wakslak (2007), "Construal Levels and Psychological Distance: Effects on Representation, Prediction, Evaluation, and Behavior," *Journal of Consumer Psychology*, 17 (2), 83-95.

Williams, Patti, and Jennifer L. Aaker (2002), "Can mixed emotions peacefully coexist?," *Journal of Consumer Research*, 28(4), 636-649.

Yeomans, M., Kantor, A., and Tingley, D. (2018). The politeness package: Detecting politeness in natural language. R Journal, 10(2).

Zhang, J., Chang, J., Danescu-Niculescu-Mizil, C., Dixon, L., Hua, Y., Taraborelli, D., and Thain, N. (2018). Conversations gone awry: Detecting early signs of conversational failure. In *Proceedings of the 56th Annual Meeting of the Association for Computational Linguistics, 1,* 1350-1361.

Price, Purchases, and Beyond: A Multidimensional Perspective

Chair: Manissa P. Gunadi, ESADE, Univ. Ramon Llul, Spain

Paper #1: Choice Bracketing and Consumer Choice under Uncertainty

Liat Hadar, Tel Aviv University, Israel

Shai Danziger, Tel Aviv University, Israel, and the University of Sydney, Australia

Vicki Morwitz, Columbia University, USA

Paper #2: The Impact of Historic Price Information on Purchase Deferral

Manissa P. Gunadi, ESADE, Univ. Ramon Llul, Spain

Ioannis Evangelidis, ESADE, Univ. Ramon Llul, Spain

Paper #3: The Negative and Positive Consequences of Placing Products Next to Promoted Products

Christina Kan, University of Connecticut, USA

Donald Lichtenstein, University of Colorado Boulder, USA

Chris Janiszewski, University of Florida, USA

Yan (Lucy) Liu, Texas A&M University, USA

Paper #4: An Examination of Consumers' Long-term Social Preferences Under Elective Pricing

Minah H. Jung, New York University, USA

Xiao Liu, New York University, USA

Leif D. Nelson, University of California, Berkeley, USA

SESSION OVERVIEW

Price can arguably be considered one of the most important attributes for consumers' purchase decisions. Importantly, besides actual prices, consumer price perceptions play a crucial role in impacting purchase decisions (Zeithaml 1988; Gupta 1988; Monroe 2003; Krishna et al. 2002). This session was put together with the aim of deepening our understanding of how consumers' decisions and behaviors are influenced by factors related to pricing. Each paper will approach this from a different theoretical angle—making the session as a whole highly relevant and appealing to a wide range of consumer researchers. Importantly, on top of using data from behavioral experiments, the papers also present evidence drawn from incentive-compatible paradigms or field studies, large-scale panel data, and secondary data from various industries. We contend that this contributes to the overall robustness and eventual generalizability of our collective findings.

The first two papers focus on how purchase decisions are guided by how consumers make use of price information. When engaging in purchases, consumers can rely on narrow or broad bracketing. **Morwitz, Hadar,** and **Danziger** document conditions under which choice is likely to be guided by average price perceptions versus predictions of specific future prices, and how these perceptions and predictions impact purchase for consumers of frequency or depth pricing retailers.

Next, **Gunadi** and **Evangelidis** evaluate how consumers' purchase decisions are influenced by historic price information. They focus on the interaction between frequency and direction of past price changes on purchase decisions for a given product.

In the third paper, we turn to examine whether the purchase of a specific product could be influenced by price promotional information for another product. **Kan, Lichtenstein, Janiszewski** and **Liu** document the deal proximity effect, and find that this crucially depends on substitutability of the respective products.

We round out the session with a longitudinal assessment of how consumers behave under a consumer elective pricing scheme

'pay-what-you-want.' Using a large-scale panel dataset, **Jung, Liu,** and **Nelson** found that consumers voluntarily contribute a positive amount, but that this contribution gradually declines over time.

Collectively, this session strives to answer two broad questions. Firstly, how are consumer purchase decisions influenced by price information, be it past prices, aggregate price perceptions, or prices of other, related products? Secondly, how do consumers behave under specific pricing schemes and strategies? The papers arguably show the multidimensionality of pricing, and how diverse research on this topic can be. While price plays a key role in the consumers' decision-making process, at the same time, it is also an important instrument that retailers have managerial control over. Accordingly, we believe these papers—which are wide-ranging but complementary in nature—offer important theoretical and practical insights. Whether companies are choosing to use an elective pricing scheme, or to incorporate price promotional deals, or to convey price changes, or to opt for depth or frequency pricing strategies—this session highlights how they could all have substantial impact on consumers' purchasing behavior.

Choice Bracketing and Consumer Choice under Uncertainty

EXTENDED ABSTRACT

Consumers' inclination to use narrow bracketing, that is, to consider choices independently of other similar choices, or broad bracketing, that is, to consider multiple, similar choices jointly, may systematically influence choice. For example, consumers may choose between two retailers based on an isolated assessment regarding which retailer will be cheaper on a particular purchase or based on an aggregate assessment of which retailer will be cheaper on average, across multiple purchases. These choices may differ because the retailer more likely to be cheaper on a particular purchase is not necessarily the one that will be cheaper on average. We examine the effect of choice bracketing on preference for retailers using frequency (i.e., offering many small discounts) versus depth pricing strategies (i.e., offering fewer, but larger discounts).

Consumers generally buy more often at frequency retailers than at depth retailers because they rely on trial-by-trial predictions of which retailer will be cheaper on the next shopping trip, rather than on their beliefs regarding which retailer is cheaper on average (Danziger, Hadar, and Morwitz 2014). We examine conditions under which choice is likely to be guided by average price perceptions. We find that consumer reward programs that reward multiple purchases or set minimum purchase requirements encourage broad bracketing, prompt reliance on average price judgments and preference for retailers who consumers believe offer a lower price on average, whether it is the depth or frequency retailer.

Participants in our studies were incentivized to minimize overall costs when making multiple choices between two options. Choices were made without knowing the options' prices in advance. In study 1, 120 students made 21 daily choices between two fictitious coffee shops and received an incentive-compatible payoff. Unbeknownst to participants, one coffee shop used frequency pricing while the other used depth pricing. We manipulated, between-subjects, which coffee shop was cheaper on average. After participants completed 20 choices between the two coffee shops the bracketing manipulation was introduced. Participants in the *narrow bracketing* condition received

10 coupons offering a 10% discount on the price of coffee. Each coupon could be redeemed at either coffee shop; participants in the *broad bracketing* condition received one coupon offering a 10% discount on the price of coffee, for *one* of the coffee shops, valid for the next 10 purchases. They indicated which coffee shops' coupon they wanted and received the discount only if they chose to buy at this shop. Supporting our hypothesis, we found a Bracketing by Cheaper distribution interaction effect ($\chi^2(1)$=4.95; *p*=.026): participants were more likely to shop at the cheaper shop in the broad bracketing condition ($\chi^2(1)$=1.9, b=1.4, *p*=.057), but not in the narrow bracketing condition ($\chi^2(1)$=-1.3, b=-.97, *p*=.184).

Study 2 (N=202) examines the effect of choice bracketing on the propensity to choose the option consumers *judge* as cheaper on average. Broad bracketing is prompted by having participants made multiple choices before receiving any feedback (while in the narrow bracketing condition feedback is provided following every choice; Read, Loewenstein, and Rabin 1999). Actual average prices were the same across the depth and the everyday low price (EDLP) retailers. The Bracketing by judged average price difference interaction was significant ($\chi^2(1)$=5.09; *p*=.024): in the broad bracketing condition the cheaper the judged average price of the depth grocer, relative to the EDLP grocer, the higher the choice likelihood of the depth grocer (B =.34; 95% CI=.05,.64). In the narrow bracketing conditon, however, average price difference did not predict choice (B= .004; 95% CI=-.01,.02).

Study 3 replicated this effect with non-dichotomous distributions of time. Participants (N=201) made repeated choices between two roads and were instructed to minimize overall commute time. One road was associated with a frequency time distribution and the other with a constantly short time distribution. In the narrow bracketing condition participants received 10 vouchers to a fast lane that reduces the commute time by up to five minutes; participants in the broad bracketing condition chose a single voucher for the fast lane, valid for the next 10 trips, for one of the roads. We, again, found a Bracketing condition by judged average time difference interaction (B=.008; 95% CI=.002,.01; *p*=.015): in the broad bracketing condition, the lower the judged average time of the frequency road, relative to the constant road, the higher the choice proportion of the frequency road (B =.012; 95% CI=.008,.017; *p*<.0001). In the narrow bracketing conditon, however, the judged average time difference did not predict choice (B=.004; 95% CI=-.001,.009; *p*=.082).

In Study 4 (N=400), holding reward magnitude constant, participants in the narrow bracketing condition were rewarded for individual choices whereas participants in the broad bracketing condition were rewarded only if they completed a fixed number of purchases at a given retailer. We manipulated which option was cheaper on average. Our hypothesis was supported by a moderated mediation analysis (PROCESS model 14; Hayes 2013) in which the independent variable was the Cheaper Retailer, the mediator was judged average price difference, the dependent variable was Depth choices, and the moderator was Bracketing. We found a significant Bracketing by judged average price difference interaction (B=.03, 95% CI=.01,.05; *p*=.008) and a significant moderated mediation effect (B=.05, 95% CI=.01,.11): average price difference mediated the effect of Cheaper price on choice in the broad bracketing condition (B=.04, 95% CI=.01,.07), such that the the judged average price of the depth retailer relative to the frequency retailer was lower when the depth grocer was cheaper than when the frequency grocer was cheaper. In addition, the lower the average price of the depth grocer was judged to be (relative to the frequency retailer), the more the depth grocer was chosen. In contrast, in the narrow bracketing condi-

tion, the judged average price difference did not mediate the effect of Cheaper price on choice on choice (B=-.02, 95% CI=-.06,.02).

Our results suggest that companies whose products or services are perceived as relatively cheaper on average should offer reward programs that trigger broad bracketing, for example, by rewarding multiple purchases. In contrast, companies whose products or services are perceived as relatively expensive on average are better off rewarding individual purchases.

The Impact of Historic Price Information on Purchase Deferral

EXTENDED ABSTRACT

In current retail settings, prices of goods in the market change frequently over time and consumers now have increasing access to historical prices. We examine how frequency and direction of past price changes influence consumers' decision to buy later versus now. We advance an expectation-based framework—proposing that frequency of price changes impacts the expectations people form about future price changes. We set forth two key predictions. For price decreases, we predict that consumers would be more likely to defer purchase upon observing a higher frequency of past decreases in price. For price increases, consumers would be less likely to defer upon seeing a higher frequency of past increases.

Research shows that consumers tend to expect a sequence of events to represent alternations instead of runs (Tversky and Kahneman 1974). Upon observing a series of identical outcomes, consumers may believe an alternative outcome would be due. However, in the price changes context, we predict that consumers may be more likely to expect the same change (decrease or increase) as previously observed to repeat in the future (Gilovich et al. 1985; Carlson and Shu 2007). We posit that these expectations will be stronger, the *more* changes in the same direction consumers have previously encountered. Specifically, for price decreases, consumers will hold stronger beliefs that the price will decrease further in the future, upon observing relatively higher frequency of decreases in price. Similarly, for price increases, consumers will hold stronger beliefs that the price will increase further, upon observing higher frequency of increases. In turn, these expectations that consumers form about future price changes will affect their decision to make or defer purchase. Consumers should be more (less) likely to defer purchase, the more they believe that the price of the product they consider purchasing will decrease (increase) in the future.

We found collective support for our predictions in eight preregistered experiments (N=5933) and three studies using secondary data (N=3537). In most of the studies, we employed a 2 (direction of price change: decrease vs. increase) by 2 (frequency of change: low vs. high) between-participants design. Participants were asked to imagine that they were buying a specific product, and were provided with historic price information (in numeric form) based on the experimental condition. We manipulated frequency of change by altering how many changes in the ticket price were communicated to the participants. In the low frequency condition, there was one change in price. In the high frequency condition, there were four changes. Importantly, the final price and the absolute magnitude of change were held constant across conditions. Our dependent variable was participants' decision to buy the product now or later.

Study 1a established the expected interaction between frequency and direction of change on purchase deferral in the context of flight tickets. As predicted, when price decreased, participants were more likely to defer purchase when the frequency of price changes was high (27.4%), compared to low (10%), Waldχ^2 = 18.50, *p*<.001.

When price increased, participants were less likely to defer purchase when the frequency of price changes was high (26.4%) versus low (46.3%), Waldχ^2 = 16.87, p<.001. We replicated this pattern of results when holding the amount of information constant across low/high frequency conditions (Study 1b) and when price information was presented visually in graphs (Study 1c).

Study 2 tested our expectations-based account. Consistent with our theoretical framework, we found that controlling for the magnitude of change, frequency strengthens expectations about future price changes. Consumers hold stronger expectations that prices will decrease further in the future (F(1,598) = 46.84, p<.001), and are more likely to defer purchase when the frequency of price decreases is high versus low. Conversely, consumers hold stronger expectations that prices will increase further in the future, and are less likely to defer purchase when the frequency of price increases is high versus low F(1,598) = 31.12, p<.001, (interaction F(1,598) = 77.16, p<.001). Further, a conditional process analysis showed that expectations mediated the effect of frequency on deferral both when price decreased and increased (index of moderated mediation = -2.77, SE=.42, $99\%LLCI$=-3.94, $ULCI$=-1.82).

Subsequent studies test potential moderators. Studies 3a and 3b document the role of monotonicity. The presence of an inconsistent change—a change that goes in the opposite direction, compared to previous changes—attenuated the impact of frequency on purchase deferral. In these studies, we had low frequency, high frequency monotonic, and high frequency nonmonotonic conditions. In Study 3a, when prices were decreasing, participants in the high frequency monotonic condition were less likely to defer the purchase (29.6%) compared to their counterparts in the low frequency condition (60%), Waldχ^2 = 36.48, p<.001. Importantly, this result was eliminated when changes were not monotonic (high nonmonotonic = 64.2%, Waldχ^2 = .74, p=.389). We replicated these findings for price increases (Study 3b).

Study 4 showed that the impact of frequency on purchase deferral is stronger when the magnitude of the change in price is relatively larger. We added a new factor, magnitude of change (small vs. large) to our usual 2x2 design. The three-way interaction (direction, frequency, and magnitude) on deferral was marginally significant (Waldχ2 = 2.77, p=.096). Importantly, the interaction between our direction and frequency factors was stronger when the magnitude of the change was large (Waldχ^2 = 46.10, p<.001) versus small (Waldχ^2 = 16.22, p<.001).

Study 5 adds to the existing body of evidence for our effect by replicating our findings (interaction: Waldχ^2 = 6.01, p=.014) in a setting where decisions are incentivized and consequential for participants.

Lastly, to complement the previous studies which were conducted in controlled experimental settings, Studies 6a-c document our basic effects using data from online cryptocurrency, housing market, and automobile transactions.

In sum, we found that in the case of price decreases, participants were more likely to defer purchase upon observing a relatively higher frequency of changes. On the contrary, in the context of price increases, participants were less likely to defer purchase upon observing a relatively higher frequency of changes. These effects are explained by variations in consumers' expectations about future prices.

The Negative and Positive Consequences of Placing Products Next to Promoted Products

EXTENDED ABSTRACT

Consumers often select from a variety of competing products in multi-product displays. Some products might be discounted while others are regular price, and products are positioned at various locations within the display. Do price deals differentially impact demand for other products depending on their location within a display?

We find evidence for a deal proximity effect that differs depending on product substitutability. When the proximal and distal items are *strong substitutes* for the promoted item, a price promotion *decreases* the sales of proximal products relative to distal products: *a negative proximity effect*. We surmise that this occurs because the promoted product attracts attention that then spills over to the proximal product. Because both products are strong substitutes, they enter the same consideration set. The reduced price on the promoted product results in the promoted product being more attractive, leading to sales losses for the proximal product.

However, when the proximal and distal items are *weak substitutes* for the promoted item, the promoted product *increases* the sales of proximal products relative to distal products: *a positive proximity effect*. Because the proximal product is a weak substitute for the promoted product, it is unlikely to enter the same consideration set as the promoted product and thus, the reduced price on the promoted item is not a relevant referent for the proximal product. However, the proximal product still benefits from the increased attention, which positively impacts its sales.

Our first study explored whether grocery store managers would intuit the proposed pattern of effects. Grocery store managers were recruited by Qualtrics to participate in this study. They were shown a planogram from a yogurt shelf and told that a product was being promoted at a price discount. They were first asked to estimate the impact of this promotion on the percentage change in sales of four other products on the shelf in a 2 (Proximity to discounted product: proximal v. distal) x 2 (Substitutability: strong substitute v. weak substitute) design. Results indicate managers predict that a price promotion has a significantly stronger impact on stronger substitutes than weaker substitutes, but do not anticipate that price promotion effects differ by proximity or the interaction of proximity by substitutability.

Study 2 analyzes a secondary dataset of yogurt sales obtained from a retail grocer. The dataset provided information on each yogurt's sales, regular price and whether it was being promoted at a discounted price. We use the grocer's planogram to determine how far apart each yogurt is located from one another. We also ran a pretest on mTurk to determine perceived substitutability between yogurts based on various product attributes. A fixed effects analysis reveals that cross price promotion effects differ significantly depending on substitutability, distance within the planogram and their interaction. For highly substitutable products, a sales promotion had a negative cross price promotion effect that diminished as the distance between the two products increased. For weakly substitutable products, a sales promotion had a positive cross price promotion effect that diminished as the distance between the two products increased.

Studies 3a and 3b were designed to address limitations due to the correlational nature of the study 2 dataset. We ran two field studies at a campus bookstore in which we manipulated the proximity of products to a discounted product within a display. In study 3a, we used two different product categories to serve as weak substitutes for one another; plush toy keychains and car decals. We observe a positive deal proximity effect: when a plush toy keychain (car emblem)

is promoted at a discounted price, the proximally located car emblem (plush toy keychain) sells significantly more than the distally located car emblem (plush toy keychain). In study 3b, we used five product category replicates (energy drinks, keychains, lanyards, socks, and trail mix), each with its own display, to test for a negative proximity effect. For each product category, one product was chosen to be the discounted product, and two products were chosen to be strong substitutes for the discounted product. Collapsing across product replicates, a test of proportions showed that the choice share of the proximal product was significantly lower than the choice share of the distal product.

Our next study used two different operationalizations of product substitutability to provide further evidence that the effects result because of differences in perceived substitutability. We used a simulated internet shopping experience with participants on mTurk (n = 559). The two substitutability operationalizations were goal-based substitutability and product attribute-based substitutability. These conditions were run across eight product category replicates (cookies, chocolate covered snacks, savory snacks, candies, jams, chocolate bars, sodas and soaps) in a repeated measures latin-square design. We find evidence for a negative deal proximity effect when substitutability is highest, a null effect when substitutability is medium and a positive deal proximity effect when substitutability is low.

Across five studies, we observe evidence for a negative deal proximity effect when substitutability is high and a positive deal proximity effect when substitutability is low. This pattern of effects is novel to marketing practitioners and can offer actionable insights; retailers can use product proximity to actively manage the consideration sets and purchases of consumers.

These results contribute to literature on 1) price promotions (e.g., Blattberg and Wisniewski 1989, Rooderkerk, Van Heerde, and Bijmolt 2013) by offering shelf proximity as an important moderator of cross price promotion effects, 2) consideration sets (e.g., Nedungadi 1990, Shocker et al., 1991) by providing a proximity-based explanation for influences on brand co-occurrence in the same versus different consideration sets, and hence contexts in which brands are more/less likely to directly compete, and 3) retail shelf optimization (e.g., Corstjens and Doyle 1981, Eisend 2014) by offering insight into how to organize shelves so that multiple brands (e.g., promoted brand, weak substitute proximal brand) might benefit most from the promotional activity of a single brand.

An Examination of Consumers' Long-term Social Preferences Under Elective Pricing

EXTENDED ABSTRACT

Standard economic models assume that people maximize material self-interests, ignoring any concern for others. Accordingly, consumers want to pay as little as possible and tend to seek for deals and discounts to exploit in marketplaces. Yet, people also give money to charities or volunteer their time to help others. People care about fairness and reciprocity even at the expense of their own material self-interests (Andreoni and Miller 2002, Charness and Rabin 2005, Rabin 1993).

Consumer elective pricing applies in any transaction in which buyers can decide their own prices for the goods and services that sellers offer. Consumer elective pricing has been shown to be a valuable tool for studying social preferences in real market contexts. It has been well documented that even when consumers are allowed to be maximally selfish, most of them choose not to be (Kim et al. 2009, Mak et al. 2010, Gneezy et al. 2010, Jung et al. 2014, 2017).

The extant research offered important insights into how consumers determined how much to pay under elective pricing, but much less known about the stability of consumers' social preferences. Most studies that document consumers' decisions under elective pricing used the data that typically involved either single purchases or on aggregated data across time. This limitation is notable because it leaves open the possibility that apparently strong social preferences might actually be fleeting. A few studies looked at consumers' repeated purchases under elective pricing but showed mixed results on their long-term behavior. Some found that consumers' payments increased over time (Kim et al. 2010), whereas the others documented a decreasing pattern of payments over time (Levitt 2006; Riener and Traxler 2012). Although these papers provided new insights into the long-term dynamics of consumers' social preferences, their data lacked a critical feature-they could not observe individual-level social preferences over time. A few studies that recorded individual-level payments considered behavior in relatively short duration. Our goal is to examine the stability of consumers' long-term social preferences in a market exchange environment by addressing the key weaknesses of the previous research.

We analyze panel data from an online media retailer that sells bundles of electronic books (eBooks) written by independent authors. The data set includes 163,551 transactions from 57,196 customers, from the company's launch on August, 6th, 2012 to June, 26th, 2017. Our data contains the individual-level transactions for the sales of 114 bundles of eBooks, which contain a total of 1,147 books, written by 748 independent authors.

Given the firm's pricing features, we use consumer elective contribution as a proxy measure of customers' social preferences. We define consumer elective contribution to be how much more consumers pay than the minimum or bonus price for a specific bundle that they purchase. The notion is that the entirety of this marginal contribution is offered without any additional direct benefit to the customer.

Consumers' elective contribution decreases with each subsequent purchase; falling from an average initial elective contribution of over $2.50 to about $1.00 by the 25th purchase. More important, however, is that even by the 25th purchase, customers are still meaningfully contributing well beyond the bonus or minimum price. The pattern is similar when we look at consumers' elective contribution as percentage of the price paid. We looked at the sub-sample of 2,634 customers who purchased more than 10 bundles and find that customers decrease their elective contribution with each subsequent purchase. The results are consistent when we control for the bonus price and multiple product quality factors variations across the bundles.

We observe that frequent buyers indeed contribute less than infrequent buyers over time. Customers who only bought one bundle contributed an average elective contribution of $2.66, whereas consumers who bought two bundles contributed an average elective contribution of $2.29. When a consumer buys more than 30 bundles, the average elective contribution decreases to $1.26, less than half of the level of elective contribution of those who bought only once. The average level of elective contribution and purchase frequency are negatively correlated such that frequent buyers contribute less than infrequent buyers.

Consumers with increasing elective contribution exit significantly earlier than those with decreasing elective contribution. Therefore, the declining pattern of customers' elective contribution seems to be due to attrition of a certain segment. Customer exit is consequential for the firm. As we previously reported, frequent buyers start with a smaller elective contribution and their contributions

decrease over time, but they also stay with the company for a longer duration. Although customers who contribute increasingly pay more per bundle, because they leave the company earlier, they contribute only an average cumulative elective contribution of $6.55. Alternatively, the customers who contribute decreasingly pay less per bundle, but offer substantially more cumulative elective contribution to the company.

In sum, most customers voluntarily contribute a positive amount with their first purchases and continue to do so over subsequent purchases. Furthermore, although on average, customers always pay more than they have to, their voluntary payments slowly decline with each subsequent purchases. Lastly, we further identify customer heterogeneity in the stability of their elective contributions over time. We observe that generous customers are less likely to be loyal to the firm and therefore make fewer purchases over time. For a firm that leverages customers' social preferences for its revenue, customers who pay relatively less, yet loyal, contribute more to the firm in the long run than customers with larger initial contributions but less stable.

REFERENCES

Andreoni, James, and John Miller (2002), "Giving According to GARP: An Experimental Test of the Consistency of Preferences for Altruism," *Econometrica*, 70 (2), 737-53.

Blattberg, Robert C. and Kenneth J. Wisniewski (1989), "Price-Induced Patterns of Competition," *Marketing Science*, 8 (Fall), 291-309.

Carlson, Kurt A., and Suzanne B. Shu (2007), "The Rule of Three: How the Third Event Signals the Emergence of a Streak," *Organizational Behavior and Human Decision Processes*, 104 (1), 113-21.

Charness, Gary, and Matthew Rabin (2004), "Expressed Preferences and Behavior in Experimental Games", *Available at SSRN 369402*.

Corstjens, Marcel and Peter Doyle (1981), "A Model for Optimizing Retail Space Allocations," *Management Science*, 27 (7), 822-33.

Danziger, Shai, Liat Hadar, and Vicki Morwitz (2014), "Retailer Pricing and Consumer Choice under Price Uncertainty," *Journal of Consumer Research*, 41, 761-74.

Eisend, Martin (2014), "Shelf Space Elasticity: A Meta-analysis," Journal of Retailing, 90 (June), 168-81.

Gilovich, Thomas, Robert Vallone, and Amos Tversky (1985), "The Hot Hand in Basketball: On the Misperception of Random Sequences," *Cognitive Psychology*, 17 (3), 295-314.

Gneezy, Ayelet, Uri Gneezy, Leif D. Nelson, and Amber Brown (2010), "Shared Social Responsibility: A Field Experiment in Pay-What-You-Want Pricing and Charitable Giving," *Science*, 329 (5989), 325-27.

Gupta, Sunil (1988), "Impact of Sales Promotions on When, What, and How Much to Buy," *Journal of Marketing Research*, 25 (4), 342-55.

Hayes, Andrew F. (2013), *Introduction to Mediation, Moderation, and Conditional Process Analysis*, New York: Guilford.

Jung, Minah H., Leif D. Nelson, Ayelet Gneezy, and Uri Gneezy (2014), "Paying More When Paying for Others," *Journal of Personality and Social Psychology*, 107 (3), 414-31.

Jung, Minah H., Leif D. Nelson, Uri Gneezy, and Ayelet Gneezy (2017), "Signaling Virtue: Charitable Behavior Under Consumer Elective Pricing," *Marketing Science*, 36 (2), 187-94.

Kim, Ju-Young, Martin Natter, and Martin Spann (2009) "Pay What You Want: A New Participative Pricing Mechanism," *Journal of Marketing*, 73 (1), 44-58.

_____ (2010), "Kish: Where Customers Pay as They Wish," *Review of Marketing Science*, 8 (2).

Krishna, Aradhna, Richard Briesch, Donald R. Lehmann, and Hong Yuan (2002), "A Meta-analysis of the Impact of Price Presentation on Perceived Savings," *Journal of Retailing*, 78 (2), 101-18.

Levitt, Steven D. (2006), "White-collar Crime Writ Small: A Case Study of Bagels, Donuts, and the Honor System," *American Economic Review*, 96 (2), 290-94.

Mak, Vincent, Rami Zwick, and Akshay R. Rao (2010), "Pay What You Want as a Profitable Pricing Strategy: Theory and Experimental Evidence," University of Cambridge, Cambridge, UK.

Monroe, Kent B. (2003), Pricing: Making Profitable Decisions, 3rd ed., Boston: McGraw-Hill/Irwin.

Nedungadi, Prakash (1990), "Recall and Consumer Consideration Sets: Influencing Choice Without Altering Brand Evaluations," *Journal of Consumer Research,* 17 (3), 263-76.

Rabin, Matthew (1993), "Incorporating Fairness into Game Theory and Economics," The *American Economic Review*, 1281-1302.

Read, Daniel, George Loewenstein, and Matthew Rabin (1999), "Choice Bracketing," *Journal of Risk and Uncertainty*, 19 (1-3), 171-97.

Riener, Gerhard, and Christian Traxler (2012) "Norms, Moods, and Free Lunch: Longitudinal Evidence on Payments from a Pay-What-You-Want Restaurant," *The Journal of Socio-Economics*, 41 (4), 476-83.

Rooderkerk, Robert P., Harald J. van Heerde, and Tammo H.A. Bijmolt (2013), "Optimizing Retail Assortments," Marketing Science 32 (5), 699-715.

Shocker, Allan D., Moshe Ben-Akiva, Bruno Boccara, and Prakash Nedungadi, (1991). "Consideration Set Influences on Consumer Decision-Making and Choice: Issues, Models, and Suggestions," *Marketing Letters*, 2 (3), 181-97.

Tversky, Amos, and Daniel Kahneman (1974), "Judgment under Uncertainty: Heuristics and Biases," *Science*, 185 (4157), 1124-31.

Zeithaml, Valerie (1988), "Consumer Perceptions of Price, Quality, and Value: A Means-End Model and Synthesis of Evidence," *Journal of Marketing*, 52 (3), 2-22.

Consuming Extraordinary Experiences: Personal Transformationin the Antistructural Realm

Chairs: Chris Hackley, University of London - Royal Holloway, UK
Rajesh Nanarpuzha, Indian Institute of Management Udaipur, India

Paper #1: Dissecting Consumption: The Temple Festival as an Extraordinary Experience

Rajesh Nanarpuzha, Indian Institute of Management Udaipur, India

Sridhar Samu, Great Lakes Institute of Management, India

Prakash Satyavageeswaran, Indian Institute of Management Udaipur, India

Jossin Shaji, Indian Institute of Management Udaipur, India

Paper #2: The Extraordinary Experience of Death and Rebirth in a Thai Temple Ritual

Rungpaka Amy Hackley, Birkbeck College, University of London, UK

Chris Hackley, University of London - Royal Holloway, UK

Paper #3: Bodily Experiences and Self-transformation

Jannsen Santana, ESCP Europe, France

Olivier Badot, ESCP Europe, France

Paper #4: Personal Transformation Through Extraordinary Experiences

Isadora Matsuda Sanchez de Rojas, EAESP-FGV, Brazil

Benjamin Rosenthal, EAESP-FGV, Brazil

SESSION OVERVIEW

Extraordinary experiences as consumption phenomena remain a fascinating area of academic research (Beverland, Lindgreen, and Vanhamme 2012; Caru & Cova, 2006; Lanier Jr., Clinton, & Rader, 2015; Turner and Bruner 1986). Within marketing, multiple perspectives have been adopted to look at extraordinary experiences (Arnould & Price, 1993; Belk & Costa, 1998; Kozinets, 2002; Tumbat and Belk 2011). Even as extraordinary experiences have been explored in diverse contexts (Tumbat and Belk 2011), these studies have been largely restricted to the consumption sphere in the United States and other developed markets (Arnould & Price, 1993; Belk & Costa, 1998, Kozinets, 2002). Even as this stream of research has provided seminal insights about consumer behavior in the consumption of extraordinary experiences, it has left open the opportunity to explore this phenomenon using differing consumer cultural perspectives. In this special session, we aim to explore diverse facets of extraordinary experiences from hitherto under-explored cultural perspectives, with the broad aim of theoretically and empirically extending consumer research on extraordinary experiences. In doing so, we consider diverse empirical contexts, different methodological approaches to studying extraordinary experiences, and disparate *types* of extraordinary experiences.

In paper 1, we consider the context of a single temple festival in India, and examine how socio-historical institutions shape consumption. The study takes a naturalistic ethnographic approach to explore the *Nemmara-Vallangi vela*, a temple festival in Kerala, India. In paper 2, we consider a specific Buddhist ritual that occurs at the intersection of spirituality and consumption- the Thai Theravada Buddhist Death Ritual for the Living. The theorization seeks to extend Victor Turner's idea of liminoid consumption into the spiritual sphere. Paper 3 entails a multi-sited sensory ethnography of four different pilgrimages in Europe (Lourdes – France, Camino de Santiago – Spain) and Latin America (Juazeiro do Norte and Belém do Pará

– Brazil). The study investigates how the extraordinary experience of pilgrimage is experienced as a transformative sensory phenomenon. Finally, paper 4 takes a Turnerian approach to the theorization of solo travelling. Sixteen solo travelers are interviewed in order to generate insight into the personally transformative extraordinary experiences they sought and gained in the anti-structural realm of adventurous solo travel.

The papers have in common a focus on consumer experiences that can be deemed extraordinary in the dual sense that they are a) far from quotidian or routine and b) there is an expectation that undertaking these experiences will yield benefits of a spiritual and/or transformative character. Each paper discusses extraordinary experiences that go beyond the realm of everyday life (Bhattacharjee and Mogilner, 2014) and hold the potentiality of a personal change and renewal, even bringing joy (Arnould and Price, 1993, p. 25) and magic (Schouten and McAlexander, 1995).

In this session we explore three main research questions:

1. In what ways can extraordinary consumer experiences be empirically and theoretically extended/re-framed, particularly in the area of personally transformative experiences?
2. What is the role of socio-historical institutions and rituals in creating extraordinary experiences?
3. How does consumer participation affect extraordinary experiences?

Dissecting Consumption: The Temple Festival as an Extraordinary Experience

EXTENDED ABSTRACT

The consumption of extraordinary experiences has been studied as service encounters (Arnould and Price 1993), as a contrast to the consumption of ordinary experiences (Bhattacharjee and Mogilner 2014), as a means of consumer emancipation (Kozinets 2002), and as socially constructed fabrications (Tumbat and Belk 2011). This is representative of the different lenses through which extraordinary experiences have been conceptualized and examined in consumer research. However, a unifying thread connecting these research endeavors is an assumption of experiences being consumed by an *archetypal* consumer, unshackled by the social context. Even as research in the consumer domain has looked at consumer motivations, the role of social institutions in shaping consumption experiences has been overlooked. This is in line with Askegaard & Linnet's (2011, p. 381) contention that what is missing in Consumer Culture Theory (CCT) research is the lack of a 'context of context'.

In this paper, we investigate the impact of social institutions in the consumption of an extraordinary experience. In doing so, we attempt to answer the following broad research question

1. How is consumption of an extraordinary experience shaped by the social institutions of gender, social class, and caste?

To investigate this, we conducted a naturalistic inquiry of the *Nemmara-Vallangi vela*, a temple festival in Kerala, India. Planned as a multi-year participant observation of the week-long temple festival, we have completed the first round of data collection and analysis. A total of 25 ethnographic interviews of festival participants have been conducted. We have complemented this with still photographs

and videos of the festival. In keeping with the tenets of constant comparison (Glaser and Strauss 1967), data collection, analysis and informant selection were done iteratively.

We have chosen the Nemmara-Vallanghy *vela* (temple festival) primarily for the information richness that it offers. This annual festival is ostensibly fashioned as a competition between two adjacent villages (Nenmara and Vallanghy, in Palakkad district, Kerala state, India) that share a common temple. Aspects of ritual rivalry as discussed by Tarabout (1993) is prevalent in Nenmara-Vallanghy *vela.* Held annually, seemingly for the residents of the two villages, the temple festival is a major tourist attraction, bringing in thousands of visitors. Complexity in the context is evidenced in the disparity in consumption experiences, which we focus on.

Our findings suggest that the impact of diverse socio-historical forces at play in shaping consumption experiences is clearly visible in the Nemmara-Vallanghy *vela*. Visitors to the *vela* travel long distances to attend and consume the festival. People of Nenmara and Vallangy travel home in a process somewhat similar to Thanksgiving in the USA or Christmas in some other countries. They bring their families (spouse/children) so that they can share the history of the festival and can initiate them into the different activities. A mosaic of different castes takes up specific roles, performing mandated rituals during the festival. One dominant caste (The Nair community) monopolizes the organization of festivities for one of the competing villages (Nemmara) while a loose federation of members from different castes takes up organizing activities for the other competing village (Vallanghy). Consumption of the festival is also gendered, with women taking up traditional household roles, and also occupying 'safe space' vantage points while consuming the festivities. Men, on the other hand, 'perform' the festivities, and consume them, by taking center-stage. Though ostensibly egalitarian in consumption, economic status hierarchies also play a role in festival consumption. The best elephants and the best music ensembles are bid for, and perform for the village with the higher financial capability. Festival rituals are also broken down and chunks are sold to the highest bidders. For example, the house from which the main festival procession begins is decided based on a bidding process. It is therefore, the consumption of the overall festival or specific events in the festival that we investigate in this study in the context of the role played by social institutions including gender, social class, and caste.

Askegaard & Linnet (2011) argue that consumer research is largely characterized by a focus on the lived experiences of consumers (Thompson, Locander, & Pollio, 1989) without adequate focus on "macro-social explanatory frameworks." In this paper, we heed the call by Askegaard & Linnet (2011) and investigate consumption within the context of experiencing a temple festival in Kerala. We study this context through the different social institutional lenses of gender, caste, and social class. We find evidence for consumption shaped by the contextual socio-historical development of these social institutions, and for intersectionality at the individual consumer level. Our findings point to the fallacy of considering an *archetypal* consumer of extraordinary experiences and motivate us to look at differing consumption experiences of the same extraordinary experience, driven by larger socio-historical forces.

The Extraordinary Experience of Death and Rebirth in a Thai Temple Ritual

EXTENDED ABSTRACT

The ritual is visually striking, within the dramatic and beautiful setting of the temple with its giant golden Buddha statues, the huge ceremonial gong and the robed monks. The researchers are observ-

ing from within the temple, taking occasional photographs, the lead researcher translating and reflexively understanding the observed events in the light of her own personal life experience of being a Thai Buddhist since birth. The devotees gathered in the temple are invited by the monks to lie down in a row of neatly arranged coffins. Their palms are pressed together holding flowers, a candle and three incense sticks. The monks' mesmeric chanting of the funeral ritual chant *Ānisong Sīa Sop: "The Blessings of Disposing of Corpses"* interspersed with the striking of the resonant ceremonial gong adds to the sense of religious gravitas of the occasion. In spite of the similarities between this ritual and genuine death rituals in the temple, the death in this ritual, is symbolic. The coffins and their occupants are covered with a shroud. When the chanting is finished, the shroud is removed and the devotee rises from the coffin. The literal translation of *Norn-Loeng-Sa-Dor-Cro* is 'laying down in a coffin you can get rid of bad luck'. Devotees believe that the ritual will cleanse their soul by tricking bad spirits into thinking they have died, and hence the bad spirit will leave them alone. Through the symbolic rebirth, the devotee can start afresh with a new identity shorn of the negative karma of their old identity. As a consequence, their fortune in this life will improve.

In Thai Theravada Buddhism, religious doctrine and practice is interwoven with folk beliefs and practices, and the realm of death is interwoven with that of the living. Spirits, ghosts and ancestors are a vivid presence in material life, for good or for ill. Monks are often asked to intercede between the spirit world and the material world to help devotees, in exchange for gifts of goods, food or money that are donated to the temple. For example, monks might convey propitious lottery numbers for those devotees hoping for a lottery win to improve their circumstance in life, or the monks might be asked to intercede for an ancestor to improve the ancestor's lot in the next life. This, in turn, would bring merit to the devotee who commissioned the intervention, which could benefit them both spiritually, and materially.

The Thai Death Ritual for the Living requires some translation for Western audiences. Firstly, the notion of death in the East differs from the Western notion of death as a finality and end point (Tumbat and Belk, 2011: Bonsu and Belk, 2003). In Buddhism, there is a vivid sense of the continuity of life and death. Life on earth itself, then, is a liminal state (Turner, 1969) in the sense that it is but one of the Wheels of Life. In the Death Ritual for the Living, the liminality of this state, the sense of life being an unfolding state of potentiality, is rendered especially vivid through the intercession of the monks who mediate between this life and the next. Whilst the continuity of life and death is a reality in many practices of Thai Buddhist daily life, such as the belief in ghosts and the presence of a spirit house in most dwellings and business premises, there is still a need for frequent formal ritual intercessions mediated by monks in order to connect with the spiritual world for particular reasons and on significant occasions. Some rituals, such as this one, are exceptional in that they fall outside the usual rites of passage or calendrical rites in the religious life of Thai Buddhists and, instead, fall broadly within the realm of commissioned intercessions. That is, they are consumer experiences that are paid for by the devotees and undertaken for specific reasons of advancement or benefit in the material world.

In this project we extend Turner's (1969) ideas on the liminal phase of ritual process to a death ritual in order to draw out new theorizations of extraordinary consumer experiences (Arnould and Price, 2003). For Turner (1969), liminal experience was confined to compulsory rites, while he characterized consumer experiences as liminoid (Turner, 1974: 1982) rather than liminal. Liminoid experiences are freely entered into in a spirit of playfulness- they are not

trivial, but neither are they permanent. Just as consumer experiences can be disposed and repeated, so too can devotees of the Death Ritual for the Living repeat the experience many times if they choose. "The liminoid is more like a commodity- indeed, often is a commodity, which one selects and pays for, than the liminal" (Turner, 1982 p.55). Hence, Turner (1982) explicitly linked liminoid experience to consumer experience. The simulation of death and rebirth in this case also offers opportunities for cross-cultural insights into the profoundly different understanding of spirituality, death and eschatology that obtains in the Judeao-Islamic-Christian West, and in the Buddhist and Hindu influenced East. In their moments in the coffin, the devotees subsist in a state between life and death, and it is the liminal character of this state that opens up the potentiality of a new life, a new spiritual identity and new possible futures both as a human being, and subsequently as a being on a different Wheel of Life.

We frame this ritual as an extraordinary consumption experience because it is consumed as a commercial transaction and transports the consumer into the realm of the extraordinary. The case illustrates a liminal dimension that we suggest is latent in many extraordinary consumer experiences but foregrounded in spiritual consumer experiences. The theorization also challenges the use of Turner's ideas in consumer research.

Bodily Experiences and Self-transformation

EXTENDED ABSTRACT

Many people come to Lourdes facing difficulties. They are going through very difficult situations in life. However, in Lourdes they learn their lesson. They return home transformed. (Michael, Lourdes)

Consumer's senses have been investigated from the provider's view in consumer research and psychology, such as in the concept of sensory marketing, defined as marketing that engages the consumers' senses and affects their behaviors (Hultén, 2011; Krishna, 2011; 2012). In consumer culture, incipient line of research has also been dedicated to understanding the role of body and senses in experiences (Scott & Uncles, 2018), such as through the connection with nature (Canniford & Shankar, 2013), dancing (Hewer & Hamilton, 2010), impacted by time (Woermann & Rokka, 2015), or submitted to pain (Scott, Cayla, & Cova, 2017; Cova & Cova, 2019). Yet there is still space to understand how consumers live extraordinary experiences and how they enable consumer transformations and well-being. We believe that it can be better explained when showing that the body sensoriality (Kirmayer, 2003; Roux & Belk, 2018; Vom Lehn, 2006) is shaped by the place (Castilhos, Dolbec, & Veresiu, 2017) and other materials (Miller, 2005), especially during pilgrimage experiences.

How do consumers live pilgrimage experiences seeking self-transformation? This question guided the design of a multi-sited sensory ethnography approach (Pink, 2015) conducted in four different pilgrimages in Europe (Lourdes – France, Camino de Santiago – Spain) and Latin America (Juazeiro do Norte and Belém do Pará – Brazil). Sensory ethnography is an emplaced ethnography devoted to understanding an experience by addressing the relationships between bodies, minds, and the materiality and sensoriality of the environment (Pink, 2015). We employed three main techniques of data collection, which were (i) interviews, (ii) participant observations, and (iii) visual data. We carried out data analysis by coding each interview, looking for cultural categories and individual and collective interpretations mainly related to the concepts of embodiment, place and materiality (Spiggle, 1994).

Our findings demonstrate the recurrent mentions to self-transformations in participants' speech and practices not only in Lourdes, but at the four pilgrimage contexts. Pilgrims reported different types of transformations they've been through. They can address their transformations to religious and non-religious causes, such as:

To achieve their aimed transformations, pilgrims engage themselves in bodily enactments mainly related to (i) the *place,* and (ii) using *the materials* around. People going to these experiences feel a connection with the very ground of the pilgrimage site and the consuming interactions between their bodies and the place enables well-being and self-transformations as expressed in the following quote:

I think that the very ground of the pilgrimage site reveals a power that can help people to find their healing. And that is the reason people come to these religious sites. (Fatima, Lourdes)

Individuals engage their bodies in enactments involving materials, such as in the words of Lara explaining how the doing of the Camino de Santiago and the difficulties involved at carrying a 11 kg backpack paradoxically helps her to leave behind the emotional weight that she was carrying so far.

"I had around 11kg in my backpack. When you're walking with this material weight you are letting behind the emotional weight you were carrying with you before arriving here" (Lara, Camino de Santiago)

Religious sites mobilize about 380 million people per year around the world, which represents a market of around 400 USD million (UNWTO, 2018). These results are interesting for the comprehension of the patterns of consumption of such religions and experiences and how they are connected to well-being and self-transformation.

Personal Transformation Through Extraordinary Experiences

EXTENDED ABSTRACT

Extraordinary experiences are characterized as uncommon, infrequent, emotionally intense (Tumbat and Belk 2011; Arnould and Price 1993; Scott, Cayla, and Cova 2017), providing a sense of community (Arnould and Price 1993; Celsi, Rose and Leigh 1993), with identity manifestation being the result of belonging (Arnould and Price 1993). Extraordinary experiences go beyond the realm of everyday life (Bhattacharjee and Mogilner 2014), bringing a sense of newness, originality, and freshness, often changing the individual through "…personal integration, personal control, awareness of power, joy and valuing…" (Arnould and Price 1993, p. 25), sometimes even entering into the realm of the spiritual, the magical and supernatural (Fernandes and Lastovicka 2011; Schouten and McAlexander 1995).

Extraordinary experiences allow participants to create a new identity facet (Celsi et al. 1993), to "escape from the rationality, rules, and stresses of everyday life" (Tumbat and Belk 2011, p. 44), to temporarily invert one's social order by engaging in new social groups with a certain degree of homogeneity (Schouten and McAlexander 1995; Kozinets 2002).

Often, the kind of impact and transformation that extraordinary experiences provide is portrayed by researchers in a specific time-space, located within the experience per se. As illustrated by one of Tumbat and Belk's (2011) alpinists "I think it [the money] would only be worth it if I get to the top. I've had a really good time, but [reaching the summit is] the only reason I'm actually here" (p. 53).

Also, we know that it is through post-fact narratives that individuals make sense of their experience, for instance for those that are physically intensive and immersive (Scott et al., 2017). Traveling to off-track places often leads to self-accomplishment and personal development (Zinelabidine et al. 2018).

While some researchers have provided some extended effects of extraordinary experiences, such as learning new skills (Arnould and Price 1993; Celsi et al. 1993), personal growth and renewal (Arnould and Price 1993), personal development (Zinelabidine et al. 2018), and identity expansion (Arnould and Price 1993; Celsi et al. 1993), there is still a lack of studies that investigate the process that leads to the enduring consequences of engaging with extraordinary experiences. In this research, we expand the literature on the extraordinary experience by investigating its transformational effects, specifically by theorizing how it can act as a rite of passage (Rook 1985; Schouten 1991), and as symbolic marks of a permanent status change (Rook 1985). The research question we ask here is how can extraordinary experiences transform individuals?

Methodologically, we investigated the solo travel extraordinary experience, which we define here as traveling alone for some time (although the meaning of the experience is more important than its temporal length) and engaging with meaningful situations that transform the individual in significant ways. Travel has long been considered in the tourism literature as a rite of passage with transformative capacities (Grabowski et al. 2017; Decrop et al. 2018). The first author conducted in-depth interviews (Kvale 2008) with sixteen informants who have passed through meaningful experiences while traveling alone outside of their original country (Brazil), so they could describe their motivations, the most significant situations, their feelings, reflections, meanings and the outcomes of the solo travel experience. Data analysis was first conducted in an inductive manner (Spiggle 1994), coding for the situations, reflections, learnings, and transformations while and after the solo travel. After that, we used conceptual elements of rites of passage (Rook 1985; Schouten 1991) to consolidate our theoretical analysis of the transformational aspects of the solo travel experience.

Our findings indicate that the main motivation to engage in a solo travel experience is the desire to temporarily depart from the social structure in which one is immersed and to live functional and extraordinary experiences in a new place. The lived experience of solo travel is marked by performance experiences and stochastic experiences (Lanier and Rader 2015), which constitute an important source of reflection and transformation. Our informants learned and reflected upon ordinary functional instances of the solo travel, such as taking care of one's clothes, housing matters, transport, money, without any support, and getting immersed in new cultures, and upon stochastic (non-functional) experiences. The condition of being solo frequently contributed to the reflexive element of the experience, as it allowed time and space to think and reflect, even when establishing new and occasional social ties. Traveling solo is an experience rich in stochastic situations, such as walking in the city, seeing something interesting on the streets, getting to know someone new and forming unplanned ties, which leads to unplanned situations, visiting extraordinary nature places, and learning about rituals and practices of other cultures. The condition of having no previous social ties and space knowledge in the new places also contributes to a constant state of situation-awareness, immersion, and self-reflection.

In short, solo travel allows the experience of learning - acquiring knowledge and skills, playing with possible selves, questioning one's former values and practices, developing new goals and life models, planning how one wants to be and to live. We contribute to the literature by theorizing the process of personal transformation through extraordinary experiences using the lenses of rites of passage, with separation from social roles and status, transition into new roles, and incorporation of new selves, roles and status (Schouten 1991) marking the lives of our informants.

REFERENCES

Arnould, E. J., & Price, L. L. (1993). River magic: Extraordinary experience and the extended service encounter. *Journal of Consumer Research*, *20*(1), 24-45.

Askegaard, S., & Linnet, J. T. (2011). Towards an epistemology of consumer culture theory: Phenomenology and the context of context. *Marketing Theory*, *11*(4), 381-404.

Beverland, M. B., Lindgreen, A., & Vanhamme, J. (Eds.). (2012). *Memorable Customer Experiences: A Research Anthology*. Gower Publishing, Ltd..

Bhattacharjee, A., & Mogilner, C. (2014). Happiness from ordinary and extraordinary experiences. *Journal of Consumer Research*, *41*(1), 1-17.

Belk, R. W., & Costa, J. A. (1998). The mountain man myth: A contemporary consuming fantasy. *Journal of consumer research*, *25*(3), 218-240.

Bonsu, S.K., Belk, R.W. (2003) Do Not Go Cheaply into That Good Night: Death-Ritual Consumption in Asante, Ghana, *Journal of Consumer Research*, 30(1), 41–55.

Carù, A., & Cova, B. (2006). How to facilitate immersion in a consumption experience: Appropriation operations and service elements. *Journal of Consumer Behaviour: An International Research Review*, *5*(1), 4-14.

Canniford, R. & Shankar, A. (2013). "Purifying Practices: How Consumers Assemble Romantic Experiences of Nature," Journal of Consumer Research, 39(5), 1051–69.

Celsi, R. L., Rose, R. L., & Leigh, T. W. (1993). An exploration of high-risk leisure consumption through skydiving. *Journal of consumer research*, *20*(1), 1-23.

Cova, V., & Cova, B. (2019). Pain, suffering and the consumption of spirituality: a toe story. Journal of Marketing Management, 35(5-6), 565-585.

Decrop, A., Del Chiappa, G., Mallargé, J., & Zidda, P. (2018). "Couchsurfing has made me a better person and the world a better place": the transformative power of collaborative tourism experiences. *Journal of Travel & Tourism Marketing*, *35*(1), 57-72.

Fernandez, K. V., & Lastovicka, J. L. (2011). Making magic: Fetishes in contemporary consumption. *Journal of Consumer Research*, *38*(2), 278-299.

Glaser, B. G., & Strauss, A. L. (1967), *The Discovery of Grounded Theory*, Chicago: Aldine.

Grabowski, S., Wearing, S., Lyons, K., Tarrant, M., & Landon, A. (2017). A rite of passage? Exploring youth transformation and global citizenry in the study abroad experience. *Tourism Recreation Research*, *42*(2), 139-149.

Hewer, P., & Hamilton, K. (2010). On emotions and salsa: Some thoughts on dancing to rethink consumers. Journal of Consumer Behaviour: An International Research Review, 9(2), 113-125.

Hultén, B. (2011). Sensory marketing: the multi-sensory brand-experience concept. European Business Review, 23(3), 256-273.

Kirmayer, L.J. (2003). "Reflections on embodiment", in Jr, J.M.W. (Ed.), Social and Cultural Lives of Immune Systems, Routledge, London, pp. 282-302

Kozinets, R. V. (2002). Can consumers escape the market? Emancipatory illuminations from burning man. *Journal of Consumer research*, *29*(1), 20-38.

Krishna, A. (2012). An integrative review of sensory marketing: Engaging the senses to affect perception, judgment and behavior. Journal of Consumer Psychology, 22(3), 332-351.

Krishna, A. (Ed.). (2011). Sensory marketing: Research on the sensuality of products. Routledge.

Kvale, S. (2008), *Doing Interviews*. London: Sage.

Lanier Jr, C. D., & Rader, C. S. (2015). Consumption experience: An expanded view. *Marketing Theory*, *15*(4), 487-508.

Miller, D. (2005). *Materiality*. Duke University Press.

Pink, S. (2015). *Doing sensory ethnography.* Sage.

Rook, D. W. (1985). The ritual dimension of consumer behavior. *Journal of consumer research*, *12*(3), 251-264.

Roux, D., & Belk, R. (2018). The Body as (Another) Place: Producing Embodied Heterotopias Through Tattooing. Journal of Consumer Research.

Schouten, J. W. (1991). Selves in transition: Symbolic consumption in personal rites of passage and identity reconstruction. *Journal of consumer research*, *17*(4), 412-425.

Schouten, J. W., & McAlexander, J. H. (1995). Subcultures of consumption: An ethnography of the new bikers. *Journal of consumer research*, *22*(1), 43-61.

Scott, R. O., & Uncles, M. D. (2018). Bringing sensory anthropology to consumer research. European Journal of Marketing.

Scott, R., Cayla, J., & Cova, B. (2017). Selling pain to the saturated self. Journal of Consumer Research, 44(1), 22-43.

Tarabout, G. (1993). Ritual Rivalry in Kerala. In H. Brückner, L. Lutze, & A. Malik, *Flags of fame: Studies in South Asian folk culture* (pp. 81-108). New Delhi: Manohar.

Thompson, C. J., Locander, W. B., & Pollio, H. R. (1989). Putting consumer experience back into consumer research: The philosophy and method of existential-phenomenology. *Journal of consumer research*, *16*(2), 133-146.

Tumbat, G., & Belk, R. W. (2011). Marketplace tensions in extraordinary experiences. *Journal of Consumer Research*, *38*(1), 42-61.

Turner, V. (1969) *The Ritual Process: Structure and Anti-Structure*, Transaction Publishers,   Rutgers- the state university, New Jersey.

Turner, V. (1974). Liminal to liminoid, in play, flow, and ritual: An essay in comparative symbology. *Rice Institute Pamphlet-Rice University Studies*, *60*(3), 53-92.

Turner, V. (1982) *From Ritual to Theatre- The Human Seriousness of Play*. New York, PAJ Publications.

Turner, V. W., & Bruner, E. M. (Eds.) (1986). *The Anthropology of Experience*. Urbana: University of Illinois Press.

United Nations World Tourism Organization (UNWTO). (2018). UNWTO Global Tourism Dashboard. Retrieved from https://www.unwto.org/global-and-regional-tourism-performance

Vom Lehn, D. (2006). Embodying experience: a video-based examination of visitors' conduct and interaction in museums. *European Journal of Marketing*, 40 (11/12), 1340-1359.

Woermann, N., & Rokka, J. (2015). Timeflow: How consumption practices shape consumers' temporal experiences. *Journal of Consumer Research*, 41(6), 1486-1508.

Zinelabidine, B. B. G., Touzani, L., Dahmane, N. B., & Touzani, M. (2018). How off-track tourists create their own event: a customer-dominant logic perspective. *Qualitative Market Research: An International Journal., 21* (4), 549-66.

Cognitive Influences on Consumption Experiences

Chairs: Adrian Ward, University of Texas at Austin, USA
Tito L. H. Grillo, University of Texas at Austin, USA

Paper #1: The "Next" Effect
Ed O'Brien, University of Chicago, USA

Paper #2: Unintentional Inception: Why Unintentionality Increases Quality Perceptions of Artistic Products
Alexander Goldklank Fulmer, Yale University, USA
Taly Reich, Yale University, USA

Paper #3: The Effect of Google-Induced Confidence on Consumption Experiences
Tito L. H. Grillo, University of Texas at Austin, USA
Cristiane Pizzutti, UFRGS, Brazil
Adrian Ward, University of Texas at Austin, USA

Paper #4: Glimpse into the Future Experience: When is Virtual Reality Sampling Beneficial?
Helen Chun, Cornell University, USA
Eunsoo Baek, Hong Kong Polytechic University, China
Deborah MacInnis, University of Southern California, USA

SESSION OVERVIEW

As we meet this year in Paris, a center of the Enlightenment and birthplace of new paradigms to thinking and knowing about the world, the setting seems particularly appropriate for discussing consumer knowledge. Consumer research has extensively studied how knowledge affects decision processes. However, little research has examined how knowledge shapes experiences. The current papers contribute to a nascent area of research addressing this important gap. These papers provide insight into the question of, "How can differences in consumer knowledge — in terms of both knowledge itself and the way in which knowledge is acquired — influence evaluations and enjoyment of consumption experiences?" The research in this session is relevant not just to academics, but also to marketers seeking to enhance consumer experiences by delivering the right information, in the right format.

First, **O'Brien** draws attention to the consequences of learning about the development of an upgraded version of a product. He finds that knowing that an improved version of the product will be available in the future affects consumers' subjective experience with the product in the present. The key finding is that merely knowing this fact has a negative effect on the enjoyment of the experience with the current product.

Fulmer and Reich also explore how perceptions of the same stimulus change as function of what consumers know about it. However, instead of examining the effect of knowledge about the future of the product, they look at the effect of knowledge about its inception. In the context of arts consumption, they find that the perceived quality of the same artistic product improves when consumers learn that its creation was an unintentional (as opposed to intentional) effort.

The third paper starts exploring the notion that cognitive influences on experiences arise not only from what consumers know, but also from how they obtain information. **Grillo, Pizzutti, and Ward** test the idea that accessing information about a product category through Google search (compared to the same information without online search) can subjectively enhance subsequent experiences with products of that category. This effect stems from decision confidence boosts induced by Google-based access to information.

The fourth paper shifts focus from a currently prevalent source of product-related knowledge (Google), to explore an emerging option — virtual reality (VR). **Chun, Baek, and MacInnis** look at a context where knowledge acquisition and consumption experience merge into a single event: product sampling. VR-based sampling experiences facilitate the mental simulation and conjuring of stories about the consumption of sensory-rich experiential products (e.g., luxury hotels), thus increasing behavioral intentions toward them.

This session demonstrates how complementary facets of cognition – content (i.e., what individuals know) and formation (i.e., how they obtain knowledge) – influence consumers' experiences. Moreover, the session takes a timely perspective on the topic. It takes into account that product information (e.g., their history [Fulmer and Reich] and their future [O'Brien]) is increasingly accessible, how consumers tend to access it (Grillo, Pizzutti, and Ward), and the tendency of evolving technologies to provide yet new forms of product knowledge acquisition (Chun, Baek, MacInnis).

The "Next" Effect

EXTENDED ABSTRACT

Imagine you are toying with a fun new gadget for the first time. Assuming things work as intended, experiencing a fun stimulus you have never experienced before should be highly enjoyable. Yet, consider one small tweak: You learn beforehand that an even *better* version is in the works. Despite still proceeding to play with the same gadget, and despite nothing objectively changing within it, the current research explores whether mere expectations of a more enjoyable future (e.g., upcoming versions of a technology) might *undermine* one's experience of an enjoyable present (e.g., a current version)—despite that present experience being brand new for you.

Why? Existing research might suggest the opposite: Better future versions of a good should, if anything, foster more *positive* impressions of targets subordinately associated with that good (e.g., assimilation effects: Bless & Schwarz, 2010). This idea is echoed by broader research on positive expectancies (e.g., studies highlighting benefits of dispositional optimism: Carver & Scheier, 2014). However, the current research advances these literatures by considering the additional possibility of inference-based effects. Indeed, assessing novel goods can be difficult. People reduce ambiguity by drawing inferences from other available cues, which can shape their consumption experience (Lee, Frederick, & Ariely, 2006). Put in current terms, one salient inference people likely draw from learning of future improvement is that there must have been something to improve *upon* (Grice, 1975)—but this need not be true, particularly in today's world of strategic change (e.g., planned obsolescence: Gershoff, Kivetz, & Keinan, 2011). Thus, despite being able to draw on one's bottom-up experience to inform one's judgment, bottom-up experiences may be tainted: Mere knowledge of a better future may prompt people to shift their attention to present problems warranting the change. Improvement may be self-fulfilling: Merely knowing a better future is coming may make the present worse (e.g., by prompting people to search for, and alas find, more "bugs").

Three preregistered experiments tested this hypothesis. In Experiment 1, 806 participants played "Art Time," a novel art-making game. All participants played the same game, dated from the same time, but we manipulated knowledge of upcoming versions: Some

participants first viewed a flyer for "Art Time: October 2016 release," then played "Art Time: October 2016 release" (control); others viewed a visually-identical flyer for "Art Time 2" announcing updates to the original, then played "Art Time: October 2016 release" (better-future); still others viewed a visually-identical flyer for "Paint Wars 2" announcing updates to an unrelated stimulus, then played "Art Time: October 2016 release" (unrelated-future). This latter condition isolates inference-based mechanisms (rather than *any* positive future spoiling the present, the future and present may need to be linked). After, all participants rated their enjoyment (dependent variable) and bugs noticed (proposed mechanism). The same game was less enjoyable ($p < .001$), and buggier ($p < .001$), when participants were merely aware of a better future (indirect effect via buggyness: $b = 0.42$, 95% $CI = [0.28, 0.56]$). Unrelated improvement, however, affected neither enjoyment nor buggyness (contrasts vs. control: $ps \geq .273$).

Experiment 2 replicated these effects using a different stimulus. 309 participants played the same novel virtual-reality "blaster" game. Better-future participants enjoyed the game less, and found it buggier, compared to control ($ps \leq .011$; mediation, $b = 0.32$, 95% $CI = [0.18, 0.52]$). We also tested boundaries: Other participants were informed of a better future version, but additionally evaluated a "Blast From The Past!" booklet reminding them of older blaster-game technology. The effect was attenuated with converse reminders of the past, by reducing perceived bugs (contrast versus control: $p = .206$, $d = 0.18$).

Experiment 3 replicated these effects using a third stimulus, and tested consequences. 487 participants tested the same novel 360-degree technology by which viewers can rotate the camera at any angle while a video plays. Better-future participants again reported a less enjoyable, and buggier, experience ($ps \leq .005$; mediation, $b = 0.25$, 95% $CI = [0.17, 0.36]$). Moreover, all participants were informed they had to re-experience the same technology, but could buy out of this task. Better-future participants wagered double to opt out ($p = .014$). Their "tainted" experience—for which they were willing to pay a real cost to avoid repeating—was purely a product of their beliefs.

These experiments reveal a perverse effect of positive future expectations: The same stimulus is less enjoyable merely when participants believe a better future version is in the works. This occurs because knowledge of better future is, in effect, self-fulfilling: It spurs people to discover more problems in the present that must have needed fixing.

These findings highlight the need for more research on how future circumstances serve as a standard for present circumstances (for a review, see Strahan & Wilson, 2006). We bridge these ideas with yet-disconnected literatures on expectancy effects, suggesting new insights into when and why, exactly, positive expectations can backfire. As reviewed by Lee et al. (2006), labels affect experiences: Drinking a "vinegar" beer makes the same beer taste worse; eating a "fatty" dessert makes the same dessert taste more decadent; and so on. However, past findings typically stop at the moment of choice. As Lee et al. (2006) note: "A third question concerns how specific perceptual, attentional, and cognitive mechanisms mediate the effect of expectations on experience" (p. 1057). To this point, we provide finer-grained evidence for *why* expectations change preferences: Mere awareness of a better future changes attention and prompts people to actively search for flaws.

Finally, future research should extend beyond technology. People with positive views of their future *self* may make wiser plans (Hershfield, 2011), but also discover more flaws in their present self and thus feel less happy at any one moment. Surrounded by so much

improvement across so many domains (Pinker, 2018), our findings hint at a vicious cycle: Ever-newer offerings are not necessarily ever-better, yet people may fail to learn from experience if their experience is psychologically tainted at each fresh start. Mere awareness of a better future often may risk spoiling an otherwise satisfying present.

Unintentional Inception: Why Unintentionality Increases Quality Perceptions of Artistic Products

EXTENDED ABSTRACT

Artistic product creation can be fundamentally intended or unintended from its outset. Presumably, this should not influence how the products are evaluated by consumers since their objective qualities are identical. However, research has documented a powerful influence of intentionality behind actions in shaping consumer preference and perceptions. The current research explores how quality perceptions of artistic products can be influenced by the intentionality involved in their inception; in other words, whether the product was originally intended by the creator. We suggest that because knowledge of unintentional product creation elicits heightened counterfactual thought about how the product may have never been created at all, consumers place a quality premium on unintentionally created artistic products.

Prior literature largely indicates that intention in creation can heighten quality perceptions of a finished product. Intention and perceptions of effort are psychologically linked (Caruso, Waytz, and Epley 2010; Heider 1958; Malle 2010; Malle and Knobe 1997), and perceptions of effort have been shown to heighten quality perceptions of artistic products such as effortfully created paintings and poems (Cho and Schwarz 2008; Kruger et al. 2004). This influence of perceived effort in product creation on perceptions of quality, and the association between intention and effort (Caruso et al. 2010; Heider 1958; Malle 2010; Malle and Knobe 1997), suggests that consumers may place a quality premium on intentionally created artistic products over unintentionally created artistic products.

Despite work showcasing such positive influences of intentionality and effort on quality perceptions, unintentionality has been shown to heighten consumer preference for products in certain contexts. Newman and Bloom (2012) demonstrated that near duplicates of paintings were considered more valuable when they resembled an original piece of artwork by mere coincidence compared to an intentional attempt to copy. Furthermore, when consumers perceive a company as intentionally creating an environmentally friendly product, they are less interested in purchasing it due to a belief that the company devoted resources away from other product attributes to make it environmentally friendly (Newman, Gorlin, and Dhar 2014). Especially relevant to the current research, Reich, Kupor, and Smith (2017) demonstrate that consumers prefer hedonic products resulting from a mistake in the creation process to otherwise identical products made intentionally. We build upon these lines of research by demonstrating that mere unintentionality in an artistic product's inception heightens quality perceptions of the final product.

We base our theorizing on the well-documented "intentionality bias", according to which people have a tendency to assume that actions are intentional (Bègue et al. 2010; Rosset 2008; Rosset and Rottman 2014; Spunt, Meyer, and Lieberman 2015). Because unintentional actions diverge from this assumption, and events considered unusual have been shown to inspire counterfactual thought (Kahneman and Miller 1986), we propose that unintentional creation inspires greater counterfactual thought than intentional creation. Research has demonstrated a variety of ways in which counterfactual

thinking can benefit perception (Kray et al. 2010; Teigen and Glad 2011). For example, Kray et al. (2010) demonstrate that counterfactual thinking can actually increase the perceived meaningfulness of one's own life experiences by leading to greater recognition of positive life events and perceptions that these events were fated. Further, research by Medvec, Madey, and Gilovich (1995) indicates that counterfactuals can change the perception of objective qualities of an outcome. Medvec et al. (1995) found that bronze medalists in the Olympics were judged as looking happier than silver medalists because the counterfactual of not having won a medal at all was more salient to bronze medalists, heightening perceptions of their outcome above those of the objectively superior silver medalists'. Similarly, we predict consumers will perceive an unintentionally created artistic product as higher quality than an otherwise identical intentionally created product because the counterfactual of an unintentionally created product never having been created should be especially salient to them.

Four studies examined the quality premium offered to unintentionally created artistic products in contexts in which consumers actually experienced the products. Our first study demonstrated that consumers perceive an unintentionally created poem's quality as superior to that of an otherwise identical intentionally created poem. Our second study demonstrated the robustness of the effect of unintentional artistic creation on heightened quality perceptions, extending it to the domain of visual art. Our third study identified that heightened quality perceptions of unintentionally created artistic products are mediated by increased counterfactual thinking about how a product's creation might never have occurred at all. Further, it ruled out an alternative explanation that this phenomenon is driven by a magical belief in divine intervention playing a role in unintentionally created artistic products. Through a process by moderation design in which participants evaluated a marketing slogan, our fourth study showed that quality perceptions of intentionally created artistic products rise to the level of quality perceptions of unintentionally created artistic products when consumers are encouraged to consider how an intentionally created product might never have been created at all.

This research is the first to reveal a quality premium given to unintentionally created artistic products, identifying greater counterfactual thought about how such products might never have been created at all as a hereto unrecognized antecedent of consumer quality perceptions. Consequently, it builds on previous work on benefits of unintentionality in product creation (Newman and Bloom 2012; Newman et al. 2014; Reich et al. 2017) by illustrating in multiple artistic domains that mere unintentionality in the inception of an artistic product's creation colors how the quality of the product is perceived.

These results could benefit artists by making them aware of what information they should include and emphasize about the creation of their artwork in advertisements in order to heighten perceptions of their artwork's quality. Additionally, organizations based around the appreciation of artwork such as museums could benefit from emphasizing unintentionality in the inception of their artworks' creation wherever possible. By positively coloring customers' perceptions of artistic products, museums and marketing managers could heighten foot traffic and increase purchases of artistic products.

The Effect of Google-Induced Confidence on Consumption Experiences

EXTENDED ABSTRACT

People increasingly turn to the Internet for information on virtually every topic. In consumer research, scholars have primarily focused on how the unparalleled access to information provided by the Internet carries consequences for decision processes or decisions themselves (e.g., Bhargave, Mantonakis, & White, 2016; Lynch & Ariely, 2015). The current research shifts this focus to explore consequences to consumption *experiences*. Specifically, we propose that confidence stemming from online search exerts a positive top-down influence on chosen consumption experiences, thereby enhancing subjective evaluations of objectively identical stimuli.

Our hypothesis builds on and contributes to two distinct streams of prior research: one examining the metacognitive errors induced by online search, and a second investigating the impact of expectations on experiences. A growing body of research finds that people misattribute online search results to their own memories; as a consequence, search tools like Google may inflate people's confidence in their own cognitive skills (Ward, 2013; Wegner & Ward, 2013). We extend this research by suggesting that when online search is used to access information related to a product category (such as when consumers prepare for upcoming decisions or experiences), this phenomenon causes consumers to be more confident in their own decision-making abilities. We further suggest that Google-induced confidence can exert a positive top-down influence on evaluations of chosen options. Prior research on top-down effects shows that expectation-inducing factors can cause subjective experiences with the same objective stimuli to conform to the expectation (e.g., Lee, Frederick, & Ariely, 2006). This type of effect is typically observed in response to information from an external source (e.g., telling someone that movie will be funny, or that a beer has been spiked with a weird ingredient). We extend this line of research by arguing that confidence in one's own decision skills functions as an internal source of positive expectations. Thus, factors that affect confidence — including Google-induced metacognitive errors — may improve subjective experiences by creating self-fulfilling expectations regarding the quality of chosen options.

Briefly, we propose that Internet search improves subjective experiences through a process mediated by confidence in decision skills. Study 1 (N = 465, MTurk) tested the first part of this process. Participants were randomly assigned to complete a cinema-related trivia challenge (sample question, "What was the first fully computer-animated movie ever?") using Google vs. not using Google. In the Google condition, they verified their answers using Google; in the no Google condition, they received the same answers their counterparts would find on Google but without engaging in online search. Following this manipulation, we measured participants' confidence in their abilities to choose movies using a validated scale of confidence in consideration-set formation skills (Bearden, Hardesty, & Rose, 2001 – sample item: "I am confident about my ability to recognize options worth considering when deciding to watch a movie"). We found that online search increased confidence in decision abilities, M = 5.59 vs. M = 5.29, $t(461) = 3.17$, $p = .002$.

Study 2 (N = 306, MTurk) tested the overarching hypothesis that online search enhances subjective experiences. After completing the same Google manipulation used in Study 1, participants chose a short film to watch as part of the study. Three options were provided, all of which were pretested to match on perceived quality. Film-choice was not different across conditions, $\chi^2(2) = 1.53$, $p = .466$, indicating that choices were not influenced by the manipula-

tion. After watching the film of their choice, participants were asked how much they enjoyed the film they watched. Despite the fact that participants in both conditions watched the same films, those who used Google reported greater film enjoyment, M = 5.22 vs. M = 4.83, $t(304) = 2.17$, $p = .031$.

Study 3 (N = 329, MTurk) connects the results of studies 1 and 2. After completing the trivia challenge (same as in the previous studies) and before choosing the film, we measured participants' confidence in decision skills by asking them "how confident are you that you will be able to identify and choose the best film available among the options provided?" (0 = *Not confident at all*, 100 = *100% confident*). They then watched the film of their choice and reported film enjoyment. Confidence in decision skills mediated the Google effect on enjoyment, $b = 0.17$, 95% bootstrap (10,000 simulations) CI = [0.05, 0.36].

In Study 4 (N = 499, MTurk), we further examined the role of confidence in decision skills using moderation. Theoretically, confidence in one's ability to choose should only enhance experiences that one chooses. We therefore added a "choice" manipulation to our study design. For participants in the *choice* condition, the study design replicated that of Study 2. Participants in the *no-choice* condition, however, were randomly assigned to a short film (instead of choosing one). If the increased enjoyment in studies 2 and 3 stemmed from self-fulfilling expectations regarding one's ability to choose the best option, the subjective experience of participants in the *no-choice* condition — who do not have a chance to employ their decision-making abilities — should not be affected by online search. We found a significant Google × Choice interaction, $b = 0.51$, $t(494) = 1.97$, $p = .049$ (controlling for participants' general liking of short films). When participants chose the film, Google increased film enjoyment M = 5.26 vs. M = 4.82, $t(494) = 2.41$, $p = .016$. However, when participants watched a random film, Google did not predict enjoyment, M = 4.91 vs. M = 4.97, $t(494) = 0.35$, $p = .723$.

The current studies illuminate a process where Internet search boosts decision-making confidence and, thus, ignites a self-fulfilling prophecy that results in improved subjective experiences. Marketers may benefit from this phenomenon by developing marketing communication that encourages consumers to learn about products through Internet search. However, we acknowledge that to better understand how Google-induced confidence can be explored in marketing practice and how it affects consumers' lives, future research should study the interplay of this boosted confidence with other "real world" factors – e.g., distractions, stress – that might inhibit/intensify its effects.

Glimpse into the Future Experience: When is Virtual Reality Sampling Beneficial?

EXTENDED ABSTRACT

Rapid adoption of virtual technologies is opening up new opportunities, enabling consumers to experience products and destinations and acquire information in an immersive manner. Although an increasing number of companies are designing immersive VR contents to engage consumers across various touchpoints of customer journey, they do so without clear understanding of when and how VR technology would actually benefit consumer experience and exert its intended positive effect. Given the technological investment and financial costs required for creating and distributing the immersive marketing content, companies need to be better informed about both the theoretical underpinnings of VR technology from the consumer psychology perspective and its practical implications.

Building on prior research on dynamic presentations inducing greater mental involvement (Roggeveen et al. 2015) and this, in turn, further increasing elaboration (e.g., Keller and McGill 1994), we propose that sampling a future experience through VR (vs. static images) enhances consumers' involvement with the mediated environment and the extent to which consumers conjure up stories about the future experiences. These imagined stories are likely to entail conscious representations of the self-experiencing future consumption situations (Walter et al. 2007), positively influencing behavioral intentions toward them. Importantly, we further propose a more nuanced view of the effect of VR—the extent to which the effect of VR is maximized vs. undermined (i.e., boundary conditions of VR effectiveness) depends on sensory richness of the target experience, individual differences in imagery vividness, and the perspective-taking prompted during the sampling process. We conducted four empirical studies across various experiential contexts (retail, hotel stay, tour) to test these ideas.

A pilot study (N = 108) utilizing a retail content (NYC Nike flagship store in New York City) found that, compared to 360-degree tour and static photo images, VR significantly increased mental involvement (but no difference between 360-degree tour and static photo images), subsequently enhancing future store visit intentions. Building on the initial pilot results, Study 1 (N = 188) investigated the role of sensory richness embedded in the experience by utilizing the content marketing materials posted on Youtube by actual hotel companies. With a 2 (sensory richness: luxury vs. economy-plus hotel experience) x 2 (medium: VR vs. photo images) between-subject design, we found that compared to photo images, sampling an experience through VR heightened mental involvement only for the sensory rich experience (i.e., luxury hotel tour). No difference was found between the two medium conditions when the target experience lacked high sensory richness (i.e., economy-plus hotel tour), rendering no advantage of VR over a more traditional medium of browsing static photo images. We further found support for an indirect serial mediation whereby mental involvement and the ability to imagine future consumption stories sequentially mediated the effect of VR on behavioral intentions only when the experience was high on (vs. lacked) sensory richness.

Study 2 (N = 188) further demonstrates that the extent to which VR enhances consumers' mental involvement and the ability to conjure up stories about the future consumption experience depends on individual differences in imagery vividness (VVIQ; Marks 1973). If VR boosts consumers' mental involvement of the experience and elaboration on future consumption events, this facilitative effect of VR should be more pronounced for individuals with low imagery vividness. By providing a sampling experience of a gondola ride in Venice, Italy, we found that the enhancing effect of VR occurred for those who are low on imagery vividness, but not for those who are high on imagery vividness. Those who are high on imagery vividness demonstrated a high level of mental involvement and the ability to imagine consumption stories on their own even with static photos.

Study 3 (N = 225) demonstrates that the perspective-taking adopted during the experience also matters in maximizing the effect of VR. We worked with a media content production company to create the content that took predominantly a first-person vs. third-person perspective, filming a zipline local activity in Maui, Hawaii for the study stimuli. We found that the immersive content that took more of a first-person perspective (i.e., experiencer), as opposed to a third-person perspective (i.e., observer), facilitates the mental involvement and conjuring up of future consumption stories, influencing behavioral intentions.

Across all three main studies, we find support for an indirect effect whereby mental involvement and the ability to evoke future consumption stories sequentially mediate the effect of VR on behavioral intentions. Taken together, VR's facilitating effect is limited when the target experience lacks sensory richness, when consumers taking a virtual tour are high in imagery vividness, and when the third-person perspective is promoted in the sampled experience. These findings not only provide insights into the mechanism through which the facilitative effect of VR manifests but also provides practical implications for designing marketing content for the maximal effect.

REFERENCES

Bless, H., & Schwarz, N. (2010). Mental construal and the emergence of assimilation and contrast effects: The inclusion/exclusion model. In M. P. Zanna (Ed.), *Advances in Experimental Social Psychology*, Vol. 42. (pp. 319–373). San Diego, CA: Elsevier Academic Press.

Bearden, W., Hardesty, D., & Rose, R. (2001). Consumer Self-Confidence: Refinements in Conceptualization and Measurement. *Journal of Consumer Research*, 28(1), 121-134.

Bègue, Laurent, Brad J. Bushman, Peter R. Giancola, Baptiste Subra, and Evelyn Rosset (2010), "There is No Such Thing as an Accident, Especially When People are Drunk," *Personality and Social Psychology Bulletin*, 36 (10), 1301-04.

Bhargave, R., Mantonakis, A., & White, K. (2016). The Cue-of-the-Cloud Effect: When Reminders of Online Information Availability Increase Purchase Intentions and Choice. *Journal of Marketing Research*, 53(5), 699-711.

Caruso, Eugene M., Adam Waytz, and Nicholas Epley (2010), "The Intentional Mind and the Hot Hand: Perceiving Intentions Makes Streaks Seem Likely to Continue," *Cognition*, 116 (1), 149-53.

Carver, C. S., & Scheier, M. F. (2014). Dispositional optimism. *Trends in Cognitive Sciences*, 18, 293-299.

Cho, Hyejeung, and Norbert Schwarz (2008), "Of Great Art and Untalented Artists: Effort Information and the Flexible Construction of Judgmental Heuristics," *Journal of Consumer Psychology*, 18 (3), 205–11.

Ersner-Hershfield, Hal, Adam D. Galinsky, Laura J. Kray, and Brayden G. King (2010), "Company, Country, Connections: Counterfactual Origins Increase Organizational Commitment, Patriotism, and Social Investment," *Psychological Science*, 21 (10), 1479-86.

Gershoff, A. D., Kivetz, R., & Keinan, A. (2012). Consumer response to versioning: How brands' production methods affect perceptions of unfairness. *Journal of Consumer Research*, 39, 382-398.

Grice, H. P. (1975). Logic and conversation. In P. Cole and J. L. Morgan (Eds.), *Syntax and Semantics 3: Speech Acts*. New York, NY: Academic Press.

Heider, Fritz (1958). *The Psychology of Interpersonal Relations*, New York: Wiley.

Hershfield, H. E. (2011). Future self-continuity: How conceptions of the future self transforms intertemporal choice. *Annals of the New York Academy of Sciences*, 1235, 30-43.

Kahneman, Daniel, and Dale T. Miller (1986), "Norm Theory: Comparing Reality to its Alternatives," *Psychological Review*, 93 (2), 136-53.

Keller, Punam Anand, and Ann L. McGill (1994), "Differences in the relative influence of product attributes under alternative processing conditions: Attribute importance versus attribute ease of imagability," *Journal of Consumer Psychology*, 3 (1), 29-49.

Kray, Laura J., Linda G. George, Katie A. Liljenquist, Adam D. Galinsky, Philip E. Tetlock, and Neal J. Roese (2010), "From What Might Have Been to What Must Have Been: Counterfactual Thinking Creates Meaning," *Journal of Personality and Social Psychology*, 98 (1), 106–18.

Kruger, Justin, Derrick Wirtz, Leaf Van Boven, and T. William Altermatt (2004), "The Effort Heuristic," *Journal of Experimental Social Psychology*, 40 (1), 91-8.

Lee, L., Frederick, S., & Ariely, D. (2006). Try it, you'll like it: The influence of expectation, consumption, and revelation on preferences for beer. *Psychological Science*, 17, 1054-1058.

Lynch, J., & Ariely, D. (2015). Wine Online: Search Costs and Competition on Price, Quality, and Distribution. *Marketing Science*, 19(1), 83-103.

Malle, Bertram F. (2010), Intentional Action in Folk Psychology, *A Companion to the Philosophy of Action*, 357-65

Malle, Bertram F., and Joshua Knobe (1997), "The Folk Concept of Intentionality," *Journal of Experimental Social Psychology*, 33 (2), 101-21.

Marks, David F. (1973), "Visual imagery differences in the recall of pictures," *British journal of Psychology*, 64 (1), 17-24.

Medvec, Victoria Husted, Scott F. Madey, and Thomas Gilovich (1995), "When Less is More: Counterfactual Thinking and Satisfaction Among Olympic Medalists," *Journal of Personality and Social Psychology*, 69 (4), 603-10.

Newman, George E., and Paul Bloom (2012), "Art and Authenticity: The Importance of Originals in Judgments of Value," *Journal of Experimental Psychology: General*, 141 (3), 558-69.

Newman, George E., Margarita Gorlin, and Ravi Dhar (2014), "When Going Green Backfires: How Firm Intentions Shape the Evaluation of Socially Beneficial Product Enhancements," *Journal of Consumer Research*, 41 (3), 823-39.

Pinker, S. (2018). *Enlightenment Now: The Case for Reason, Science, Humanism, and Progress*. New York, NY: Viking Press.

Reich, Taly, Daniella M. Kupor, and Rosanna K. Smith (2017), "Made by Mistake: When Mistakes Increase Product Preference," *Journal of Consumer Research*, 44 (5), 1085-103.

Roggeveen, Anne L., Dhruv Grewal, Claudia Townsend, and Ram Krishnan (2015), "The impact of dynamic presentation format on consumer preferences for hedonic products and services," *Journal of Marketing*, 79 (6), 34-49.

Rosset, Evelyn (2008), "It's No Accident: Our Bias for Intentional Explanations," *Cognition*, 108 (3), 771-80.

Rosset, Evelyn, and Joshua Rottman (2014), "The Big 'Whoops!' in the Study of Intentional Behavior: An Appeal for a New Framework in Understanding Human Actions," *Journal of Cognition and Culture*, 14 (1-2), 27-39.

Spunt, Robert P., Meghan L. Meyer, and Matthew D. Lieberman (2015), "The Default Mode of Human Brain Function Primes the Intentional Stance," *Journal of Cognitive Neuroscience*, 27 (6), 1116-124.

Strahan, E. J., & Wilson, A. E. (2006). Temporal comparisons, identity, and motivation: The relation between past, present, and possible future selves. In C. Dunkel & J. Kerpelman (Eds.), *Possible selves: Theory, research, and applications* (pp. 1-15). New York, NY: Nova Science Publishers.

Teigen, Karl Halvor, and Kristin A. Glad (2011), "'It Could have been Much Worse': From Travelers' Accounts of Two Natural Disasters," *Scandinavian Journal of Hospitality and Tourism*, 11 (3), 237-49.

Walters, Gabrielle, Beverley Sparks, and Carmel Herington, (2007), "The effectiveness of print advertising stimuli in evoking elaborate consumption visions for potential travelers," *Journal of Travel Research*, 46 (1), 24-34.

Ward, A. (2013). *One with the Cloud: Why People Mistake the Internet's Knowledge for Their Own*. Unpublished Dissertation. Hardvard University.

Wegner, D. M., & Ward, A. F. (2013). How Google is Changing Your Brain. *Scientific American*, 309(6), 58-61.

Experiences vs. Material Goods: What Drives Consumers to Perceive Experiences and Material Goods Differently?

Chair: Pureum Kim, University of Arizona, USA

Paper #1: The Bidirectionality of Experiences and Happiness: Happiness Leads People to Perceive Purchases as More Experiential than Material

Hyewon Oh, University of Illinois at Urbana Champaign, USA
Joseph K. Goodman, The Ohio State University, USA
Incheol Choi, Seoul National University, South Korea

Paper #2: Happiness from Unique Purchases

Charlene K. Chu, Chapman University, USA
Suzanne B. Shu, University of California, Los Angeles, USA

Paper #3: Distance Matters: What Information do People Want When Making Experiential and Material Purchases?

Iñigo Gallo, IESE Business School, Spain
Tom Gilovich, Cornell University, USA

Paper #4: Why Are Reviews of Experiential Purchases Less Credible?

Pureum Kim, University of Arizona, USA
Anastasiya Pocheptsova Ghosh, University of Arizona, USA
Martin Reimann, University of Arizona, USA

SESSION OVERVIEW

Consumers often prefer to acquire life experiences over material goods, because they derive greater happiness from such purchases (Van Boven and Gilovich 2003). Much of the follow-up work on this notion of experiential consumption has focused on demonstrating that experiential consumption contributes to better post-consumption outcomes and consumer preferences (Van Boven and Gilovich 2003). However, less is known about the mechanisms that drive consumers to perceive experiential and material purchases differently and how such differences affect consumer behavior. In this session, we address this gap in the literature, by examining the following questions: what are the antecedents and drivers of previously identified "experiential advantage?" And how do consumers seek and express information related to experiential vs. material goods? As we demonstrate, the questions investigated are important for many marketing stakeholders, including consumers and managers.

The first two papers of the session explore the antecedence of the "experiential advantage." In the first paper, Oh, Goodman, and Choi demonstrate that the causal direction of the experiential advantage can be reversed by manipulating consumers' happiness: happier consumers perceive their purchases as experiential. Further, they find that the effect of happiness on experiential perception is eliminated when consumers evaluate the purchase with a concrete mindset. In the second paper, Chu and Shu identify uniqueness of purchase as one of the driving forces of the "experiential advantage." They show that consumers find experiential purchase to be more self-defining and promote a greater sense of personal uniqueness.

The next two papers turn to how the differences in perceiving experiential and material purchases affect consumer behavior. In the third paper, Gallo and Gilovich investigate which information sources consumers are more likely to rely on depending on whether the purchase is material or experiential. They find that when evaluating experiential purchases, consumers rely more on reviews from those who have a closer social connection, but for material purchases, consumers are more likely to rely on reviews from aggregate online reviews. In the fourth paper, Kim, Ghosh, and Reimann examine how consumers express their consumption stories for experiential and material goods. The authors demonstrate that consumers adopt a more confident tone and use more emotional words when writing online reviews about experiential purchases.

The four papers in this special session extend our knowledge of the drivers of "experiential advantage" and the consequences of the differences between experiential and material goods for consumer behavior, such as acquiring and writing online reviews. Considering the increasing consumer demand in acquiring life experiences, we expect that this session will be of interest to a wide range of consumer researchers, particularly those examining experiential consumption, word of mouth, and consumer well-being.

The Bidirectionality of Experiences and Happiness: Happiness Leads People to Perceive Purchases as More Experiential than Material

EXTENDED ABSTRACT

How consumers perceive the nature of purchases has significant impact on how they react to product appeals, and ultimately their purchase decisions. One dimensions of purchases that prior research has identified is material versus experiential (Gilovich, Kumar, and Jampol 2015). In particular, prior research has demonstrated that consumers derive more satisfaction and happiness when they consume experiences compared to material goods (Nicolao, Irwin, and Goodman 2009; Van Boven and Gilovich 2003), suggesting that consumers should be spending more of their discretionary income on experiences instead of material goods to increase happiness (Dunn, Gilbert, and Wilson 2011). In this research, we investigate whether part of this puzzle may be backwards: Instead of experiences leading to more happiness, could happiness lead to more experiences? In other words, do happy consumers view their purchases as more experiential and less material?

Many relationships in psychology are bidirectional (e.g., power, choice, and control, Inesi et al. 2011) and related research hints at the possibility that happy people may view their purchases more experientially. Positive affect facilitates cognitive flexibility (Isen 1987) and broadens thought-action repertoires (Fredrickson 1998; Fredrickson and Branigan 2005) such that it broadens the range of potential actions people are prepared to do. Given that experiences are "doing" and thinking about what to do rather than to have (Van Boven and Gilovich 2003) and that there is the association between positive affect and broadened thoughts toward action, we expect that happy participants (both measured and manipulated) will perceive their purchases as more experiential than material compared to those less happy. Further, to examine our process, we test whether manipulating one's mental representation would moderate the effect of happiness on experiential perceptions. Specifically, we expect that the effect of happiness will be attenuated when a concrete mental representation is induced.

Studies 1 and 2 test our main hypothesis with chronic happiness, examining whether consumers high on subjective well-being (SWB) perceive purchases as more experiential (vs. material) than those low on SWB. Study 1 examined consumers' own purchases using the experience sampling (Csikszentmihalyi and Larson 1987). We measured SWB by creating an index based on satisfaction with

life and PANAS and messaging participants five times a day by a smartphone notification for 7 days. Participants also identified their most important purchase for the day and rated how experiential or material they perceived their purchase (sliding scale 0 =*definitely material* to 100 = *definitely experiential*). An HLM model (controlling for demographics and the purchase category), found a positive relationship between SWB and experiential-material perceptions (γ = 0.23, t(206) = 1.99, p = .048). In other words, the happier the respondent was, the more experiential he or she perceived their purchases.

Study 2 examined purchases made by others. Participants rated 37 different purchase items [varying from more tangible (e.g., wallet), less tangible (e.g., a movie ticket), and were ambiguous (e.g., television)] in terms of the extent to which each purchase was experiential or material on a 9-point scale (1=*definitely material*, 5=*equally material and experiential*, 9=*definitely experiential*; counterbalanced). Consistent with study 1, there was a positive relationship between SWB and material-experiential rating (r = .24, p = .001). In other words, the happier participants were, the more experiential they thought a purchase was in general.

Study 3 provides causal evidence by manipulating positive (happy), negative (sad), and neutral (control) affect. Participants first wrote about three recent events (either happy, sad, or neutral, depending on condition) in their life in a very detailed manner. Then participants rated 14 purchases as more experiential or more material. As expected, happy participants perceived purchases as more experiential (M = 4.87) compared to those in the sad (M = 4.56; t(356) = 2.31, p = .022) and control conditions (M = 4.58; t(356) = 2.15, p = .032). No difference was found between the control and sad conditions (p = .87).

Study 4a tested our mechanism by manipulating mental representation in a 2(affect: happy vs. neutral) × 2(representation: concrete vs. abstract) between subjects design. In the first part, 287 participants listed three ways of spending with the goal of advancing their happiness and enjoyment in life ($10-$1,000). In the second part, participants wrote about either a happy event or an event from yesterday (depending on condition). The concrete condition focused on the 'how' aspect of the event, whereas those in the abstract condition focused on the 'why' aspect (Vallacher and Wegner 1987). Results showed the predicted affect by mindset interaction F(1,283) = 5.67, p = .018). In the abstract condition, happy participants still rated their purchase more experientially (M = 5.89) than control (M = 4.91; t(283) = 3.02, p = .003). In the concrete condition, however, the impact of happiness on experiential perceptions was eliminated. There was no difference in experiential perception between the happy (M = 4.95) and control condition (M = 5.05; t(283) = 0.31, p = .75). Study 4b measured subjective well-being (instead of manipulating happiness) and replicated this interaction, providing further evidence of this process.

In sum, these results suggest that happy consumers view their purchases as more experiential than their less happy counterparts. By examining the other side of experiential advantage, the current findings help consumer researchers better understand the potential bidirectionality between happiness and experiential purchases. While this research does not rule out an experiential advantage (i.e., that experiential purchases can lead consumers to feel more happiness), it does show that the reverse is true too: Happiness can lead consumers to feel that their purchases are more experiential. Further, the results have important implications for how marketers may need to adjust their appeals based on consumers' perceptions of a purchase.

Happiness from Unique Purchases

EXTENDED ABSTRACT

Consumer research to date in the area of subjective well-being has focused on the experiential advantage, the finding that people derive greater enduring happiness from discretionary spending on experiences than material purchases (Nicolao, Irwin, and Goodman 2009; Van Boven and Gilovich 2003). While a number of reasons underlying the experiential advantage have been proposed and examined, little work has been done on how the uniqueness of experiential purchases may be contributing to this sense of happiness.

According to (Maslow, 1954), uniqueness is foundational to and even definitional of self-actualization, the highest level of human need fulfillment at which individuals realize their full potential. Recent research further suggests that believing oneself to be unique is positively associated with subjective well-being. Individuals with a higher sense of personal uniqueness demonstrate higher levels of optimism, hope, and resilience, as well as greater life satisfaction (Şimşek and Yalınçetin 2010). As possessions and experiences come to be incorporated into our extended self (Belk 1988), our purchases may also contribute to our sense of uniqueness and therefore enhance our subjective well-being. Despite the richness in the marketing literature documenting the pursuit of uniqueness through consumption, there is little on the subject directly examining the link between unique consumption and happiness.

In this research, we directly examine the role of uniqueness in the experiential advantage. In a series of five studies, we show that more unique purchases lead to greater happiness. Situating our investigation within the existing literature on the experiential advantage, we directly examine whether experiential purchases are thought of as more unique than material purchases and whether the greater uniqueness of experiential purchases compared to material purchases contributes to the experiential advantage. An exploration into potential explanations for why people derive greater happiness from unique purchases reveals that more unique purchases are also more self-defining and contribute to a greater sense of personal uniqueness.

Study 1 confirmed that experiences are generally regarded as more unique than material purchases; 50 participants in MTurk were given brief definitions of material and experiential purchases, described as in Van Boven and Gilovich (2003). They were then asked to briefly describe a recent purchase of $100 or more and made with the intention of advancing happiness and enjoyment, a prompt also adapted from the initial study. Compared to material purchases, experiential purchases were rated as significantly more unique (M=5.26 vs. M=3.83, t=2.751, p=.008), but not significantly more important (M=5.68 vs. M=4.83, t=1.892, p=.065) or more expensive (M=$426.53 vs. M=$451.54, t=.117, p=.907).

Studies 2 and 3 replicate and extend the original investigation by Van Boven and Gilovich (2003) on the experiential advantage, and demonstrate that the greater uniqueness of experiences mediates greater happiness from spending on experiences compared to material goods. In Study 2 (n=100), we survey individuals about either experiential or material purchases and find a significant indirect effect for the mediating role of uniqueness on experiential goods' perceived contribution to happiness (indirect effect=.1803, standard error=.1076, 95% CI [.0161, .4441]). Study 3 (n=500) further tests the mechanism by examining the role of uniqueness in driving self-definition; we find in a serial mediation that the indirect effect of purchase type on happiness in life is significant through uniqueness increasing self-definition (indirect effect=.1288, SE=.0396, 95% CI [.0609, .2147]).

Finally, in Studies 4 and 5, we look at how this relationship between uniqueness and self-definition helps to explain why spending on experiences affords greater happiness than spending on material objects. In study 4, we explicitly manipulate the uniqueness of the purchase reported by participants to further examine whether purchase uniqueness drives purchase happiness. A sample of 424 MTurkers were instructed to describe a recent material or experiential purchase that was unique or similar to other purchases. We find that experiential purchases produce greater happiness in life compared to material purchases when the purchases are not unique (M=7.25 vs. M=6.64; t=2.510, p=.013), but that this experiential advantage disappears when purchases are unique (M=7.41 vs. M=7.19, t=.967, p=.335). Replicating Study 3, self-definition mediates the effect of purchase uniqueness on happiness in life. Study 5 (n=215) uses a different study design in which participants described any recent purchase, and we find that the indirect effect of experiential purchase type on happiness in life is significant through personal uniqueness increasing self-definition (indirect effect=.0272, SE=.0119, 95% CI [.0074, .0538]).

Taken together, our results show that the benefits of experiential purchases on happiness come primarily through the fact that experiential purchases are regarded as more unique than material purchases, and this uniqueness increases self-definition, which in turn leads to higher happiness. These findings connect previously disparate streams of research on happiness and subjective well-being in psychology and consumer research and provide new insights into the role of uniqueness in consumer behavior.

Distance Matters: What Information do People Want When Making Experiential and Material Purchases?

EXTENDED ABSTRACT

When consumers consider making an experiential purchase, do they resort to more or less word of mouth, compared to when they consider making a material purchase? There is previous research in support for both. On the one hand, the evaluation of experiential purchases (EP) – such as trips, restaurants, and gym memberships – is more uncertain than the evaluation of material purchases (MP)– such as computers, clothes, and jewelry – and this uncertainty is frequently solved by turning to other consumers who have already undergone that experience (Nelson 1970). Nevertheless, there is also evidence that people rely *less* on consumer reviews when making EP than when making material purchases (Dai et al. 2020), because they believe that assessments of experiences are based less on the purchase's objective quality, which makes other consumers' reviews less helpful. This apparent contradiction is important to resolve given the ever-increasing volume of experiential consumption in consumers' lives, and the increasing use of customer reviews in consumers' decision-making.

We distinguish two different types of customer reviews. One type, accessible online (e.g., Amazon, Yelp, TripAdvisor), offers the assessments of a large number of unknown others. The other involves WOM assessments from a smaller number of well-known others (friends, family members). The former is likely to be seen as especially informative about what a potential purchase is like "objectively" because it is thought to reflect the wisdom of crowds. In contrast, WOM recommendations from close others are likely to be seen as more informative about how a potential purchase would be evaluated by us subjectively—what we're likely to think of it. We predict that when evaluating EP, consumers will rely more on reviews from sources that are closer to the self, such as WOM from friends and family members. Past research has shown that people consider their

EP to be more of a reflection of their true self than their MP (Carter & Gilovich, 2012), and so they should be more interested in consulting information sources that can take into account their idiosyncratic preferences. In contrast, when evaluating MP, consumers will rely more on information sources that are seen as more objective, such as aggregate online reviews or the opinions of experts.

In Study 1, participants considered the 26 Amazon categories from Dai et al. 2020. Half of them rated how useful they would find Amazon reviews when making a decision about a purchase in that category; the other half rated how useful they would find the opinions of close others in making such a decision. As expected, we replicate Dai et al.'s result for the Amazon reviews (i.e., they are rated as less helpful for more experiential categories) but find the opposite pattern for information from close friends and family (i.e., such information is seen as more helpful for more experiential categories).

In Study 2, participants read a scenario in which they were encouraged to imagine they were considering making a number of purchases (12 in total, half material and half experiential) and that they were looking for advice. They had access to two sources of information: (a) standard on-line summary reviews by previous customers, and (b) a new smartphone app that solicits input from people in your own social network who have had experience with the purchase in question. For each of the purchases, participants were asked to choose which of the two sources of information they would like to consult. As expected, participants chose to access input from people in their social network significantly more frequently when considering the six EP than when considering the six MP.

In Study 3, participants read the same scenario from Study 2. They were asked to imagine that, before making a decision, they could get advice from someone experienced with the item: "Suppose there are 12 people you can consult. Six of these people are not people who are close to you, but everyone would agree that they are very similar to you. The other six people are the opposite: They are people who are close to you, but you wouldn't say that you and they are very similar." To encourage participants to consider each purchase and source of advice individually, we limited to six the number of times they could use either source. In line with our theory, participants preferred to receive input from close others (as opposed to similar others) significantly more often when considering the six EP than when considering the six MP.

In study 4, participants were reminded that "before making any kind of purchase, we frequently access one or several sources of information." They were asked to rate the extent to which they would use each of four sources for 12 possible purchases: WOM from close others, online summary reviews by previous customers, expert reviews, and purchase description provided by the seller. As expected, participants claimed to use WOM coming from close others more often for EP than for MP. On the other hand, participants claimed the opposite regarding the use of the other three information sources: they claimed to use online reviews, information from experts, and product description coming from the seller more often for MP than for EP.

In Study 5, participants were asked to consider the purchase of each of four goods (two material, two experiential). Either a friend or an expert (varying between subjects) randomly endorsed each product. Consistent with our hypothesis, participants had better attitudes towards experiential goods endorsed by a friend (versus those endorsed by an expert), and towards MP endorsed by an expert (versus those endorsed by a friend). Study 6 confirmed this same result at the attribute level. One same purchase (smartphone) was described through its two most important attributes, one experiential, one material (established at a pretest): user friendliness, and the

ratio of screen size versus phone weight. We had four conditions, depending on whether each attribute was endorsed by an expert or a friend. The phone that was rated higher was the one for which an expert endorsed the material attribute, and a friend endorsed the experiential attribute.

Why Are Reviews of Experiential Purchases Less Credible?

EXTENDED ABSTRACT

Consumers derive more happiness from spending money on acquiring experiences than material purchases (Van Boven and Gilovich 2003). Greater happiness with experiences is often attributed to additional utility from memories of the experiences and ability talk to others about them (Kumar and Gilovich 2015; Zauberman, Ratner, and Kim 2009). Indeed, experiences have a greater conversational value as compared to material purchases (Bastos and Brucks 2017). We examine how consumers write about their consumption experiences on online review platforms.

When consumers write reviews, their goal is to share their consumption experience online to persuade others by providing helpful information (Berger 2014). However, recent research demonstrate that consumer reviews are often discounted, especially the reviews that might appear more extreme in tone and emotions because they are unexpected and considered relatively unhelpful due to subjectivity (Dai et al. 2020; Rocklage and Fazio 2020). Thus, if the review writers are aware of readers' discounting, they should be using less emotional words and extreme tone. Instead, we predict that for experiential purchases, review writers do exactly the opposite. This happens because consumers tend to view their experience more positively (Van Boven and Gilovich 2003), and they tend to use more positive emotional words as the valence of the experience increases (Rocklage and Fazio 2020). Further, when consumers focus on emotion in justifying their choice, they believe their choice reflects their true selves (Carter and Gilovich 2012) and are more confident about their choice (Maglio and Reich 2019).

Study 1 established initial evidence that consumers write online reviews for material and experiential purchases differently. Two hundred most recent online reviews for dining experience from ten most popular local restaurants for Yelp and ten more popular utilitarian products for Amazon were collected. These reviews served a proxy for experiential and material purchases, respectfully. They were analyzed with Linguistic Inquiry and Word Count (LIWC, Pennebaker et al. 2015) and Evaluative Lexicon (EL, Rocklage and Fazio 2015). Clout variable (degree of confidence) from LIWC and Extremity variable (extent of positive emotion) from EL were selected to assess differences in writing style. We found that compared to reviews on Amazon, consumers adopt a more confident tone for reviews on Yelp ($M_{material} = 41.15$ vs. $M_{experience} = 60.39$; $F(1, 199) = 19.89$, $p < .001$), controlling for actual review valence (number of stars) and length of review. There was no difference in use of positive emotional words, when controlling for length and valence of review ($p = .274$).

In the next set of studies, we replicate the effect and further attempt to change consumers' writing style by either drawing attention to discounting of reviews by readers (studies 2-3) or by incentivizing them to write more convincing reviews (studies 4-5). Study 2 used a 2 (purchase: experiential vs. material) x 2 (discounting message: present vs. none) between-subjects design. Participants were asked to write a short review about their latest dining (material) purchase. In the discount condition, participants were reminded that reviews are often discounted. Replicating Study 1, participants used a more confident tone when writing about their dining experiences vs. utili-

tarian purchase ($M_{material} = 29.08$ vs. $M_{experience} = 59.05$; $F(1, 220) = 94.50$, $p < .001$) and used more positive emotional words ($M_{material} = 2.80$ vs. $M_{experience} = 2.98$; $F(1, 213) = 10.70$, $p = .001$). We found no significant effect of discounting or interactions on either of the variables.

Study 3 used a 2 (purchase: experiential vs. material) x 2 (think about the readers: before vs. after) between-subjects design. Participants were instructed to write the review about their recent dining experience (vs. kitchen appliance purchase) of the same price, either before or after answering questions about how other consumers would evaluate their reviews. Again, participants wrote about their dining experience in a more confident tone ($M_{material} = 29.92$ vs. $M_{experience} = 54.44$; $F(1, 299) = 74.97$, $p < .001$) and used more positive emotional words ($M_{experience} = 2.92$ vs. $M_{material} = 2.64$; $F(1, 299) = 22.28$, $p < .001$) compared to kitchen appliances. Out of three measures of how others would evaluate their reviews (usefulness, reliance, and objective quality), participants in the experiential condition expected objective quality to be perceived lower, when participants answered questions before as compared to after writing the review ($M_{before} = 6.86$ vs. $M_{after} = 7.28$; $F(1, 299) = 4.44$, $p = .036$).

Incentives are often employed to encourage consumers to take a more professional approach to write more helpful online reviews (Stephen et al. 2012). Thus, studies 4 and 5 tested monetary and status incentives, respectively, as a moderator, to see if incentives could influence consumers to change their writing style. Both studies had a 2 (purchase: experiential vs. material) x 2 (incentives: yes vs. no) between-subjects design. Participants in the incentive condition were told that they would receive a $50 gift card and an Elite (Vine) status for monetary and status incentives, respectively. For monetary incentives, we replicate the effect of purchase type on confidence in tone ($M_{material} = 33.05$ vs. $M_{experience} = 51.13$; $F(1, 274) = 43.15$, $p < .001$) and positive emotions ($M_{material} = 2.80$ vs. $M_{experience} = 2.97$; $F(1, 273) = 10.47$, $p = .001$), but we found no effect of incentives on these variables or the interaction ($ps > .2$). The results were the same for status incentive (confidence in tone: $M_{material} = 29.18$ vs. $M_{experience} = 51.83$; $F(1, 167) = 46.27$, $p < .001$; positive emotions: $M_{material} = 2.78$ vs. $M_{experience} = 2.99$; $F(1, 160) = 8.14$, $p = .005$). Again, there was no effect of incentives on these variables or the interaction ($ps > .14$).

Our findings contribute to the literature in two ways. First, we add to the literature on how differences in consumers' processing of the experiential and material consumption manifest in consequential behavior, such as writing reviews. Second, our findings give insights to the marketers on developing strategies to guide consumers to write reviews that are less likely to be discounted by the readers.

REFERENCES

Bastos, Wilson and Merrie Brucks (2017), "How and Why Conversational Value Leads to Happiness for Experiential and Material Purchases," *Journal of Consumer Research*, 44(3), 598–612.

Belk, Russell W. (1988), "Possessions and the Extended Self," *Journal of Consumer Research*, 15(2), 139–68.

Berger, Jonah (2014), "Word of Mouth and Interpersonal Communication: A Review and Directions for Future Research," *Journal of Consumer Psychology*, 24(4), 586–607.

Carter, Travis J. and Thomas Gilovich (2012), "I Am What I Do, Not What I Have: The Differential Centrality of Experiential and Material Purchases to the Self," *Journal of Personality and Social Psychology*, 102(6), 1304–17.

Csikszentmihalyi, Mihaly and Reed Larson (1987), "Validity and Reliability of the Experience-Sampling Method," *The Journal of Nervous and Mental Disease*, 175 (9), 526–36.

Dai, Hengchen, Cindy Chan, and Cassie Mogilner (2020), "People Rely Less on Consumer Reviews for Experiential than Material Purchases," *Journal of Consumer Research*, 46(6), 1052–75.

Dunn, Elizabeth W., Daniel T. Gilbert, and Timothy D. Wilson (2011), "If Money Doesn't Make You Happy, Then You Probably Aren't Spending It Right," *Journal of Consumer Psychology*, 21 (2), 115–25.

Fredrickson, Barbara L. (1998), "What Good are Positive Emotions?" *Review of General Psychology*, 2 (3), 300–19.

Gilovich, Thomas, Amit Kumar, and Lily Jampol (2015), "A Wonderful Life: Experiential Consumption and the Pursuit of Happiness," *Journal of Consumer Psychology*, 25 (1), 152–65.

Inesi, M. Ena, Simona Botti, David Dubois, Derek D. Rucker, and Adam D. Galinsky (2011), "Power and Choice: Their Dynamic Interplay in Quenching the Thirst for Personal Control," *Psychological Science*, 22 (8), 1042–8.

Kumar, Amit and Thomas Gilovich (2015), "Some 'Thing' to Talk About? Differential Story Utility From Experiential and Material Purchases," *Personality and Social Psychology Bulletin*, 41(10), 1320–31.

Maglio, Sam J. and Taly Reich (2019), "Feeling Certain: Gut Choice, the True Self, and Attitude Certainty," *Emotion*, 19(5), 876–88.

Maslow, Abraham H. (1954), "Motivation and Personality Harper and Row," *New York, NY*.

Nelson, Phillip (1970), "Information and Consumer Behavior," *Journal of Political Economy*, 78(2), 311–29.

Nicolao, Leonardo, Julie R. Irwin, and Joseph K. Goodman (2009), "Happiness for Sale: Do Experiential Purchases Make Consumers Happier than Material Purchases?," *Journal of Consumer Research*, 36(2), 188–98.

Pennebaker, James W., Roger J. Booth, Ryan L. Boyd, and Martha E. Francis (2015), Linguistic Inquiry and Word Count: LIWC2015, Austin, TX: Pennebaker Conglomerates, www. LIWC.net.

Rocklage, Matthew D. and Russell H. Fazio (2020), "The Enhancing Versus Backfiring Effects of Positive Emotion in Consumer Reviews," *Journal of Marketing Research*, 0022243719892594.

Rocklage, Matthew D. and Russell H. Fazio (2015), "The Evaluative Lexicon: Adjective Use as a Means of Assessing and Distinguishing Attitude Valence, Extremity, and Emotionality," *Journal of Experimental Social Psychology*, 56, 214–27.

Schwarz, Norbert and Gerald L. Clore (1983), "Mood, Misattribution, and Judgments of Well-Being: Informative and Directive Functions of Affective States," *Journal of Personality and Social Psychology*, 45 (5), 513–23.

Şimşek, Ömer Faruk and Berna Yalınçetin (2010), "I Feel Unique, Therefore I Am: The Development and Preliminary Validation of the Personal Sense of Uniqueness (PSU) Scale," *Personality and Individual Differences*, 49(6), 576–81.

Stephen, Andrew T., Yakov Bart, Christilene du Plessis, and Dilney Gonçalves (2012), "Does Paying for Online Product Reviews Pay Off? The Effects of Monetary Incentives on Consumers' Product Evaluations," Vancouver, Canada: University of Pittsburgh, http://d-scholarship-dev.library.pitt.edu/18124/.

Vallacher, Robin R. and Daniel M. Wegner (1987), "What Do People Think They're Doing? Action Identification and Human Behavior," *Psychological Review*, 94 (1), 3–15.

Van Boven, Leaf and Thomas Gilovich (2003), "To Do or to Have? That Is the Question," *Journal of Personality and Social Psychology*, 85(6), 1193–1202.

Zauberman, Gal, Rebecca K. Ratner, and B. Kyu Kim (2009), "Memories as Assets: Strategic Memory Protection in Choice over Time," *Journal of Consumer Research*, 35(5), 715–28.

Small Actions, Big Difference: Consumer Research for A Better World

Chairs: Aparna Labroo, Northwestern University, USA

Shilpa Madan, Virginia Tech, USA

Paper #1: Subjective Age and the Greater Good

Jen H. Park, Stanford University, USA

Szu-chi Huang, Stanford University, USA

Daniella Kupor, Boston University, USA

Paper #2: Finding "I" in Activism: Seeking Agency after Personal Goal Failures

Sarena Su, Northwestern University, USA

Aparna Labroo, Northwestern University, USA

Paper #3: Does Appearance Reveal Character? Lay Theories of Physiognomy Influence Consumers' Willingness to Buy Imperfect Produce

Shilpa Madan, Virginia Tech, USA

Krishna Savani, Nanyang Technological University, Singapore

Gita V. Johar, Columbia University, USA

Paper #4: When Products are People: The Impact of Anthropomorphism on Recycling

Alisa Wu, Columbia University, USA

Maayan Malter, Columbia University, USA

Gita V. Johar, Columbia University, USA

SESSION OVERVIEW

Marketing, with its deep understanding of consumers, has the unique ability to improve their lives and make this world a better place. How can we, as consumer researchers, encourage people to *make a difference*? Tied together by this unifying theme, the four papers in this session showcase novel theoretical insights to promote an array of pro-social and pro-environmental behaviors such as conserving energy and recycling, reducing food waste, advocating for social and environmental causes, and helping strangers in need. Consistent with the conference theme *"Rendezvous,"* this session is a melting pot of diverse theories, approaches, and methods (including field and/or behavioral data across all papers) to illuminate how consumer research can contribute to the greater good of the society. The session features insights that are of strong interest to a broad set of stakeholders — including policy makers, businesses, not for profit organizations, communities, and consumers.

The first two papers present novel theoretical insights to increase pro-social/environmental behaviors and advocacy. Park, Huang, and Kupor set the stage by leveraging consumers' subjective age to encourage donations of time and money to charitable and environmental causes, across lab and field studies. They find that increasing people's subjective age, i.e., feeling older, enhances voluntary behavior by heightening felt responsibility for others. Su and Labroo uncover a novel antecedent for consumer activism, i.e., advocacy for critical social issues such as discriminatory gender, race, or environmental policies. Drawing from goal theory, they suggest that personal goal failures undermine consumers' agency, leading them to engage in activist behaviors by affiliating with likeminded others thereby restoring personal agency.

While the first two papers tackle broad social and environmental issues from a consumer perspective, the next two papers focus on specific pro-environmental actions of "reduce, [reuse] and recycle" by focusing on product characteristics. Madan, Savani, and Johar take a novel approach to understand consumers' aversion to ugly produce —their lay theories about physiognomy, i.e., the idea that people's appearance can reveal their character. Building on person-

perception and over-generalization literatures, they suggest theoretically rich and practically useful interventions to persuade consumers to buy ugly produce, thereby reducing food waste. Wu, Malter, and Johar suggest that product anthropomorphism may be a low-cost way to encourage consumers to recycle their possessions. They suggest increased empathy for human like products as the underlying mechanism while identifying important boundary conditions under which anthropomorphism backfires as an effective way to encourage recycling.

As social, environmental, political, and demographic changes transform and disrupt the way consumers think about and live their lives, these insights aspire to promote actions that enhance the long-term well-being of humankind and the environment. In this session, we aspire to encourage a lively discussion on the ways in which the field of consumer research can come together to provide theory driven, practically sound solutions for the most pressing concerns of the twenty first century.

Subjective Age and the Greater Good

EXTENDED ABSTRACT

Charitable organizations often struggle to solicit sufficient contributions to aid people in need. Substantial research reveals that increasing people's felt responsibility towards others can boost their prosocial contributions (e.g., Michel 2007; Wilson and Musick, 1997). We uncover a new driver that can increase consumers' felt responsibility towards others in need and increase their prosocial contributions as a result.

The perception that older (vs. younger) adults have greater responsibility for aiding society at large originates from a rich array of sources, including cultural narratives, public communications (Gheaus 2016), and normative pressures (e.g., Browning 1975; McAdams and Aubin, 1992). Drawing from this perception, we hypothesize that when consumers encounter cues that make them feel subjectively older, their felt responsibility for contributing to the greater good of society increases, which in turn heightens their contributions.

Studies 1A-1C found that objectively younger reference points increased consumers' subjective age. Participants in Study 1A were randomly assigned to a *Younger Cue* condition (imagined interacting with a younger individual), an *Older Cue* condition (imagined interacting with an older individual), or a *Baseline* condition (did not complete this interaction task). Participants then indicated how old they felt on a 100-point scale (1: *extremely young*; 100: *extremely old*). Analysis revealed that participants in the *Younger Cue* condition felt older ($M = 49.74$, $SD = 22.98$) than participants in both the *Older Cue* condition ($M = 38.90$, $SD = 24.44$; $p = .001$) and the *Baseline* condition ($M = 39.19$, $SD = 18.94$; $p = .001$), the latter of which did not differ ($p = .93$). Studies 1B-1C replicated this phenomenon across two additional interventions of subjective age: considering one's younger or older self (Study 1B) and viewing the ages of younger or older others (Study 1C).

Study 2 found that increasing consumers' subjective age increased their aid to strangers in need. Participants were randomly assigned to a *Younger Cue* (i.e., *Feel Older*) condition, an *Older Cue* condition, or a *Baseline* condition; these conditions were manipulated as in Study 1A. Then, all participants viewed an advertisement soliciting donations to aid the blind and indicated their willingness to

contribute to this cause on a 1-7 scale. Analysis revealed that condition impacted prosocial intentions ($F(2, 297) = 7.22$, $p = .001$): Participants in the *Younger Cue* (i.e., *Feel Older*) condition were more willing to support the cause ($M = 6.04$, $SD = 2.04$) than were participants in the *Older Cue* condition ($M = 4.98$, $SD = 2.31$; $p = .001$) and the *Baseline* condition ($M = 5.05$, $SD = 2.24$; $p = .002$); the latter two conditions did not differ ($p = .83$). This effect persisted when controlling for participants' chronological age, and participants' chronological age did not predict their prosocial behavior.

Studies 3-4 tested our prediction that feeling older increases contributions by heightening felt responsibility for others and ruled out an alternative account of perception of time left. Participants were randomly assigned to one of the three conditions described in Study 2 and indicated their willingness to volunteer their time for a pro-environmental cause on a 1-7 scale. Then, they completed a six-item scale assessing their felt responsibility for others' welfare (e.g., "I feel responsible for future generations"; Morselli and Passini, 2015; $\alpha = .90$) and a ten-item scale capturing their perception of the amount of time remaining (e.g., "I have the sense time is running out"; Carstensen and Lang, 1997; $\alpha = .71$). Participants in the *Younger Cue* (i.e., *Feel Older*) condition were more willing to contribute to the prosocial cause ($M = 4.56$, $SD = 1.77$) than those in the *Older Cue* condition ($M = 3.76$, $SD = 1.73$; $p = .001$) and the *Baseline* condition ($M = 3.83$, $SD = 1.72$; $p = .003$); the latter two conditions did not differ ($p = .78$). This result persisted when controlling for participants' chronological age ($b = .80$, $SE = .25$, $t(294) = 3.25$, $p = .001$), which did not predict prosocial behavior ($b = .03$, $SE = .03$, $t(294) = 1.24$, $p = .22$). Importantly, a mediation analysis revealed that felt responsibility mediated the effect of subjective age on prosocial behavior (95% CI: .1022 to .4149); a separate mediation analysis showed that time perception mediated the effect of chronological age on prosocial behavior (95% CI: -.0105 to -.0002). In other words, feeling *subjectively* older increased intentions to act for the greater good by heightening felt responsibility for others; in contrast, being *chronologically* older was associated with reduced perceived time remaining, which in turn was associated with reduced prosocial behavior. Using a similar design, Study 4 found that this phenomenon persisted regardless of whether subjective age was shifted through an *inter*personal or *intra*personal age cue.

Studies 5-6 examined that—because older subjective age increases prosocial behavior by increasing felt responsibility for distant others—older subjective age increases giving to *distant* others but not to *close* others. Specifically, Study 6 tested this phenomenon in the field. We organized a thank-you card event on campus and invited campus visitors to give thanks to their family members (i.e., close others) and/or university staff (i.e., distant others) by writing thank-you cards. Participants' subjective age was manipulated by varying the average age information about prior participants. As expected, and consistent with Study 5, subjective age condition did not impact the number of cards written to *close* others ($M_{Younger\ Cue} = .73$, $SD_{Younger\ Cue} = .97$; $M_{Older\ Cue} = .82$, $SD_{Older\ Cue} = .96$; $p = .58$), but participants wrote more cards to *distant* others when they felt older ($M_{Younger\ Cue} = 1.08$, $SD_{Younger\ Cue} = 1.30$; $M_{Older\ Cue} = .62$, $SD_{Older\ Cue} = .87$; $p = .01$). These results persisted when controlling for participants' chronological age.

In sum, we find that increasing people's subjective age heightens their prosocial contributions through increased felt responsibility for others. Our findings provide a novel insight into how a classic demographic variable (i.e., chronological age) can become a malleable construct (i.e., subjective age), which can be leveraged to nudge people toward actions that aid others in need.

Finding "I" in Activism: Seeking Agency after Personal Goal Failures

EXTENDED ABSTRACT

Activism is on the rise—and firms increasingly are not immune to activist action, as evidenced by a multitude of protests against brands including Chick Fil A, Uber, McDonalds, Starbucks, etc. for discriminatory gender, wage, or religious/racial policies. Activism typically arises in response to societal failures and injustice, and as a way for people to join likeminded others to bring about changes for the communal good. Activists are often seen as not directly benefitting from the change they bring about, and when they do benefit from the change, the change is assumed to benefit the greater good and community at large more. Indeed, engaging in activism is considered risky. To overcome these personal costs, activists are assumed to have a high degree of communal orientation and a concern for social justice (Hoffman 1989; Omoto, Snyder, and Hackett 2010). Research shows consumers are driven by their prosocial motivations to engage in activism, address social-political failures, and advance the welfare of disadvantaged groups in society (Horberg, Oveis, and Keltner 2011; Johnson 2009). While there is no doubt that prosocial orientations influence people's willingness to engage in activism, we shed light on a novel antecedent that is not prosocial, but instead potentially selfish, in nature: we demonstrate that perceived personal goal failures can also increase activism.

Consumers who face personal goal failures typically look to understand the causes of their failures. The causes could pertain to internal factors, things the consumer did or did not do, or to external factors that contributed to the failure (Heider 1958). Consumers are known to spontaneously make external attributions for their failures to protect their sense of self (Jellison and Green 1981; Jones and Harris 1967). For instance, drivers causing an accident are more likely to report a light suddenly turned than to admit they were driving too fast; students performing poorly are more likely to say the professor was a tough grader or the course was too difficult than to admit they did not try enough or seek assistance in time. We posit that making external attributions could make consumers infer a lack of external support, and they therefore have less personal agency—the ability to take action, be effective, influence their own life—because of others. As a result, they may seek to affiliate with like-minded others, as a way to reestablish their personal agency. Activism, by offering the opportunity to affiliate with like-minded others, could be seen by consumers as a way to garner personal agency. As a result, consumers who consider their personal failures may experience heightened need to affiliate with likeminded others to reestablish personal agency, which will increase engagement in activism, especially activism that could offer a higher boost to personal agency.

Across six studies, we show support for our hypotheses that failure to progress on one's goal leads to an increase in activism. In study 1, we examined the relationship between perceived failure on career goals and political activism using real-world data from a large cross-national survey (23 countries; N = 44,387). We show that expectations of unemployment in the next 12 months correlate positively with participation in public demonstrations ($b = .05$, SE = .02, $z = 2.00$, $p = .046$) and online political activism ($b = .08$, SE = .02, $z = 5.11$, $p < .001$), controlling for income, and for communal reasons for engaging in activism, including mistrust in the system, political orientation, etc. Study 2 (N = 182) established the causal link between personal goal failure and political activism using experimental methods, providing evidence that regardless of goal type, consumers who considered chronic or situational goal failures ($M = 2.31$, SD = .76) showed higher intentions of engaging in political activism ($M =$

2.03, SD = .87; *p* = .030) . Directing their thoughts to goal success reduced this tendency. In study 3, we replicated these findings in a field study run at an Auto Expo and at an upmarket cafeteria (N = 205). Consumers who considered failures to own a preferred car (*M* = .060, SD = .072) were more willing to engage in animal rights activism (*M* = - .15, SD = .073; *p* = .047). Notably, animal rights activism cannot address their lack of a preferred vehicle but engaging in such activism can afford affiliation with likeminded others and therefore a perception of reestablishing personal agency. Study 4 then demonstrated, as we predicted, that this effect only arises when people make external attributions for their goal failure, thus establishing external (vs. internal) attribution as an important boundary condition for our effect (N = 302, *p* = .017). In study 5, we examined our full process model: the mediating role of need for affiliation with like-minded others and a resulting need to reestablish one's agency through activism after the experience of personal goal failures, but only when activism can reestablish their agency (N = 299, *p* < .001). Lastly, study 6 explored the consequences of engaging in activism (N = 400).

Using multiple methods—observational data, experimental study, field settings—different personal goals (career, any listed spontaneously, affording luxury cars)—different causes (political activism, environmental activism, animal rights, free college for all)—across different populations (low-income MTurkers, middle/high-income executives, European respondents from 23 countries)—we showed a robust link between perceived failures to progress on personal goals and activism. Importantly, our hypotheses held even when controlling for a variety of factors that prior literatures suggest having an influence on activist intent—communal motives, political ideology, objective income, highest level of education, subjective experience of frustration, and general trust in the political system. Thus, while prosocial motivations and concerns for a just society certainly matter, as previously shown, we show that the desire to advance one's personal goals is also an important pathway to activism independent of prosocial influences. We therefore contribute to the current literature on activism by providing new insights into the importance of perceived personal goal failures in prompting people to engage in activism as a way to enhance their personal agency. (1000 words)

Reducing Food Waste: Lay Theories of Physiognomy Shape Willingness to Buy Imperfect Produce

EXTENDED ABSTRACT

The global population is projected to touch 9 billion by 2050 making minimizing food waste critical to preventing large scale food insecurity. Food that gets rejected due to atypical or imperfect appearance contributes up to 40% of total food waste. In this research, we identify a novel lay theory that influences consumers' willingness to buy imperfect produce. We find that the more consumers believe in the idea of *physiognomy*, or that people's outer appearance reveals their inner character, the less likely they are to buy imperfect produce.

Across cultures, people have believed that a person's face is the window to their soul, a reflection of what lies beneath the surface. People unfailingly infer others' personality, intelligence, social skills, and mental health from their appearances in split seconds (Berry and Brownlow 1989; Willis and Todorov 2006). These judgments, such as inferring personality traits from appearance, are surprisingly robust and reliable (Berry and Wero 1993). The lay belief that people's outer appearance reveals their inner character suggests that what is on the outside is an accurate indicator of what lies on the inside. We argue that consumers tend to overgeneralize and apply this lay belief regarding people to judging produce with atypical appearance.

Six studies provide evidence for this idea, rule out several alternative explanations, test boundary conditions, and propose multiple interventions for retailers to persuade consumers to buy imperfect produce.

Study 1 manipulated the appearance reveals character lay theory and found that reading an article explaining that people's appearance can reveal their character lowered consumers' willingness to pay for imperfect produce ($WTP_{AppearanceRevealsCharacter}$=3.51, SD = 1.43, $WTP_{AppearanceDoesNOTRevealCharacter}$=3.96, SD=1.66, *t*(211)=2.08, *p*=.038). The inference of lower quality (poor taste, texture, and nutrition) mediated the effect (*B*=-.19, *SE*=.091, *95%CI* [-.38, -.026]. This inference of poor quality was the only significant mediator even after including several other explanations such as poor self-perception, self-esteem, disgust, and difficulty to use as competing mediators in the mediation model.

Study 2 replicated the above effect by measuring consumers' appearance reveals character lay theory and adding a typical produce control condition. We found a significant indirect effect of the lay theory on willingness to buy imperfect produce through the perception that imperfect produce might be poor in taste, texture, and nutrition (*B*=-.18, *SE*=.09, *95% CI* [-.37, -.02]) while ruling out additional concerns that imperfect produce is not natural or is genetically modified.

Given our hypothesis that over-generalization from people to produce drives this effect, Study 3 tested the idea that if consumers were made aware that over-generalizing from people to produce is illogical and irrational behavior, they would be less likely to use this lay theory to judge imperfect produce. We measured the lay theory as in Study 2 and randomly assigned participants either to an intervention condition (where they read a short paragraph about how illogical it is to perceive human like attributes in objects) or the control condition (where they read a short paragraph about memory). The interaction between lay theory and condition was significant (*B*=-1.084, *SE*=.51, *t*(143)=2.13,*p*=.035). In the control condition, the more participants believed that individuals' appearance reveals their character, the less willing they were to buy imperfect produce (*B*=-.95, *SE* = .42, *t*(71)=2.28, *p*=.026). More importantly, in the intervention condition, their lay theory was not related to their willingness to buy imperfect produce (*B*=.13, *SE*=.301, *t*(72)=.2, *p*=.66).

Studies 4 and 5 tested if explicit anthropomorphization (a communication strategy used by ugly produce startups), improves or reduces consumers' willingness to purchase ugly produce. We found that in this context, anthropomorphization backfires. Specifically, consumers who believed that appearance reveals character (+1 SD) were not swayed by anthropomorphized depictions of imperfect fruits and vegetables. However, consumers who believe that appearance does not reveal character became less likely to buy imperfect produce when it was anthropomorphized indicating that although these consumers did not infer poor quality from atypical looks, anthropomorphization shifted these participants' attention to the produce's weird looks and reduced willingness to buy (Wen Wan et al. 2017).

Finally, two field studies on Facebook™ tested another actionable intervention to persuade consumers to consider imperfect produce—by decoupling appearance from taste, texture, and nutrition by creating an appealing and healthy-looking soup from imperfect produce. In discussion with an ugly produce start-up, we sought to test if the intervention was effective at both increasing engagement (likes, comments, and shares) and link clicks (to go to an external website to learn more about imperfect produce). Studies 7 and 8

(*N*=34,602) found that the intervention ad was significantly more effective in generating active engagement among the target audience (152.9% more engagement) and also more persuasive in leading them to go to the website to learn more (38.2% more clicks) at a significantly lower cost.

The findings identify a novel lay belief that influences consumers' willingness to buy imperfect produce and multiple strategies for mitigating this bias. This research leverages a unique theoretical perspective, at the intersection of lay theories, over-generalization, and anthropomorphism, to create interventions that contribute to the emerging, and critically important stream of work on food waste.

When Products are People: The Impact of Anthropomorphism on Recycling

EXTENDED ABSTRACT

US consumers discard most materials (76%) after using them only once (White, MacDonnell and Dahl, 2011); thus, recycling behavior is a critical step to creating a sustainable environment. This research investigates a specific type of product characteristic, anthropomorphism, and its effect on recycling. Anthropomorphism is guided by the same social cognitive mechanisms that enable people to think about the minds of other people (Epley, 2018). We argue that when it comes to disposal decisions (trashing vs. recycling), people feel like they are discarding a person when they have to dispose a humanlike product. Because they feel empathy for this human-like product, they will be more likely to recycle it in order to avoid hurting it. However, if recycling requires consumers to disassemble the product into different parts (e.g., plastic, paper, metal), it feels like dismembering "a person" and thus consumers will be more likely to trash the product as a whole to avoid hurting it.

Anthropomorphism can be operationalized by making a product look humanlike (*perceptual*) or by giving the product a first-person humanlike voice (*conceptual*). We believe that consumers will only perceive the product to *feel* humanlike (not just *look* humanlike) for conceptual anthropomorphism thus inducing empathy toward the product. Therefore, only conceptual anthropomorphism should increase recycling.

To test our hypotheses, we conducted four studies. A pretest examined various types of manipulations of anthropomorphism to identify which manipulations consistently increase recycling. Experiment 1 tested our proposed main effect in a lab study with a real behavioral dependent measure of recycling. Experiments 2 and 3 explored our proposed interaction effect between anthropomorphism and disassembling on recycling.

Pretest. We designed 22 pairs of product pictures, with one option anthropomorphized and the other non-anthropomorphized. We manipulated perceptual and conceptual anthropomorphism - the perceptual-anthropomorphism condition displayed products with visual humanlike features (face or body shape), whereas the conceptual-anthropomorphism condition displayed products with the same humanlike physical features accompanied by a first-person perspective description. Participants were randomly provided with one of the pictures in each pair. Then participants were asked to drag and drop each object into one of the two bins – trash or recycling. Results showed that conceptual anthropomorphism consistently increased recycling behavior more than perceptual anthropomorphism (). Since conceptual anthropomorphism worked better in the pretest, we used it in the following experiments.

Experiment 1. We tested the hypothesis that anthropomorphism increases recycling. Participants were told that a newly opened local bakery wanted customers to evaluate their cookies. Upon arriving

in the lab, participants were randomly assigned to two conditions – anthropomorphism condition or the control condition. In both conditions, participants were given the same cookie to taste. Anthropomorphism was manipulated through an instruction sheet. In the anthropomorphism (vs. control) condition, participants read the instruction using first-person (vs. third-person) voice. After reading the instructions and tasting the cookie, participants answered several questions including the aesthetic feature, the sweetness, and their liking of the cookie. Before they left the lab, participants were told that since the bakery is new, everything should be kept confidential, so they needed to discard the experimental materials before leaving the lab. There were two bins by the door, trash and recycling. Participants disposed of the instruction sheet, any remaining cookie into the bins before leaving the lab. We found that in the anthropomorphism condition, 96.8% of the participants recycled the information sheet compared with 89.40% did in the control condition (). Moreover, we found that six participants tore the instruction sheet into pieces in the control condition, whereas no participant did the same thing in the anthropomorphism condition, indicating that people wanted to minimize potentially hurting the humanlike object when they disposed of it.

Experiment 2 aimed to a) replicate the findings in experiment 1 and b) examine when anthropomorphism backfires. In this experiment, we used a smoothie-maker as our stimulus and manipulated anthropomorphism by describing the smoothie-maker from a first-person perspective. We manipulated disassembling instruction by telling half of the participants that "*Since the smoothie maker consists of several parts, you must carefully disassemble it into different parts before disposing these parts into different recycling bins*." They then answered our dependent variable measures – "How likely are you to trash the smoothie maker?" and "How likely are you to recycle the smoothie maker?" on a seven-point scale. The other half of the participants received no disassembly instructions and just answered the dependent measures. We used the difference between the two measures as our dependent variable. Results showed a significant interaction effect between anthropomorphism and disassembling (). When there was no disassembling instruction, participants recycled more when the product was humanlike (); whereas when the disassembling instruction was present, participants recycled less when the product was humanlike (). The effect could not be explained by effort because in the control condition, disassembling instruction made participants recycle more ().

Experiment 3 replicated the effect that when people had to disassemble a product, anthropomorphism backfires. We used the same stimuli as Experiment 2 and all participants read the instruction that if they wanted to recycle the smoothie maker, they must disassemble it into different parts. Results showed a significant decreasing effect of anthropomorphism on recycling (). When the disassembling instruction was present, participants recycled less when the product was humanlike () than when the product was not humanlike ().

In sum, we find that people prefer to minimize hurting the anthropomorphized product – either by recycling it (and possibly giving it the potential to be resurrected) or by trashing it as a whole rather than dismembering it. Our findings suggest that this effect occurs because consumers have empathy for the humanlike product, but further research is required to test this theory.

REFERENCES

Berry, Diane S. and Sheila Brownlow (1989), "Were the Physiognomists Right? Personality Correlates of Facial Babyishness," *Personality and Social Psychology Bulletin*, 15(2), 266-79.

Berry, Diane S. and Julia L. F. Wero (1993), "Accuracy in Face Perception: A View from Ecological Psychology," *Journal of Personality,* 61(4), 497-520.

Browning, D. S. (1975). *Generative man: Psychoanalytic perspectives*. New York: Dell.

Carstensen, Laura L. and Frieder Lang (1997), "Measurement of time orientation in diverse population," Unpublished data, Stanford University, Stanford, CA.

Epley, Nicholas (2018), "A Mind like Mine: the Exceptionally Ordinary Underpinnings of Anthropomorphism," *Journal of the Association for Consumer Research*, 3(4), 591-598.

Gheaus, Anca (2016), "The right to parent and duties concerning future generations. *Journal of Political Philosophy*," 24(4), 487-508.

Heider, Fritz (1958), *The psychology of interpersonal relations*. New York: Wiley

Hoffman, Martin L. (1989), "Empathy and prosocial activism," *Social and moral values: Individual and societal perspectives*, 65-85.

Horberg, Elizabeth J., Christopher Oveis, and Dacher Keltner (2011), "Emotions as moral amplifiers: An appraisal tendency approach to the influences of distinct emotions upon moral judgment," *Emotion Review*, 3(3), 237-244.

Jellison, Jerald M., and Jane Green (1981), "A self-presentation approach to the fundamental attribution error: The norm of internality," *Journal of Personality and Social Psychology,* 40(4), 643.

Johnson, Devon (2009), "Anger about crime and support for punitive criminal justice policies," *Punishment & Society,* 11(1), 51-66.

Jones, Edward E., and Victor A. Harris (1967), "The attribution of attitudes," *Journal of Experimental Social Psychology,* 3(1), 1-24.

McAdams, Dan P., and E. D. de St Aubin (1992), "A theory of generativity and its assessment through self-report, behavioral acts, and narrative themes in autobiography," *Journal of Personality and Social Psychology,* 62(6), 1003.

Michel, Lacie M. (2007), "Personal responsibility and volunteering after a natural disaster: The case of Hurricane Katrina," *Sociological Spectrum*, 27 (6), 633-652.

Morselli, D. and Passini, S. (2015), "Measuring prosocial attitudes for future generations: The Social Generativity Scale," *Journal of Adult Development,* 22 (3), 173-182.

Omoto, Allen M., Mark Snyder, and Justin D. Hackett (2010), "Personality and motivational antecedents of activism and civic engagement," *Journal of Personality,* 78(6), 1703-1734.

Wen Wan, Echo, Rocky Peng Chen, and Liyin Jin (2017), "Judging a Book by its Cover? The Effect of Anthropomorphism on Product Attribute Processing and Consumer Preference," *Journal of Consumer Research*, 43(6), 1008-30.

White, Katherine, Rhiannon MacDonnell, and Darren W. Dahl (2011), "It's the mind-set that matters: The role of construal level and message framing in influencing consumer efficacy and conservation behaviors," *Journal of Marketing Research,* 48 (3), 472-485.

Willis, Janine and Alexander Todorov (2006), "First impressions: Making up Your Mind After a 100-ms Exposure to a Face," *Psychological Science*, 17 (7), 592-98.

Wilson, J. and Musick, M. (1997), "Who cares? Toward an integrated theory of volunteer work," *American Sociological Review,* 62, 694-713.

Coolness: Identifying What Makes People, Products, and Brands Cool

Chairs: Caleb Warren, University of Arizona, USA
Martin Reimann, University of Arizona, USA

Paper #1: Consumer Interpretations of Product Coolness Across Three Cultures

Gratiana Pol, Hyperthesis, LLC, USA
Eden Yin, University of Cambridge, UK
Gerard Tellis, University of Southern California, USA

Paper #2: Why Are Autonomous Brands Cool? The Role of Value Authenticity and Brand Biography

Alessandro Biraglia, University of Leeds, UK
J. Joṣko Brakus, University of Leeds, UK

Paper #3: What Makes People Cool?

Todd Pezzuti, University of Adolfo Ibanez, Chile
Caleb Warren, University of Arizona, USA

SESSION OVERVIEW

Consumers want to be cool because coolness brings them admiration and esteem (Belk et al. 2010; Heath and Potter 2004; Warren 2010). Merely being in the presence of a cool product is enough to make consumers feel better about themselves (Quartz and Asp 2013). Recognizing this, marketing professionals spend a lot of time and money trying to figure out how to create cool products and brands (Gladwell 1997; Kerner and Pressman 2007; Southgate 2003) and marketing researchers attempt to understand what may distinguish cool product designs from designs that seem either funny or normal (Warren and Reimann 2019). And for good reason. Just as becoming a cool person can help consumers feel better about themselves (Quartz and Asp 2013), offering a cool product or brand can help firms feel better about their bottom line (Im, Bhat, and Lee 2015; Kim, Shin, and Park 2015; Shin and Biocca 2018).

Thus, upon closer inspection, it seems wise for consumers, firms, and especially consumer researchers to better understand how to become cool. All of the papers in this special session attempt to answer this question, each using a different approach to address a different aspect of how to become cool. Pol, Yin, and Tellis investigate how coolness varies across cultures by gathering data in the US, UK, Germany, and China, but shift their focus to how products, rather than people, become cool. Pol et al. also identify two interpretations of coolness, one relatively personal and the other more social, develop a set of measures to assess these two interpretations, and identify cross-cultural commonalities and variations in these interpretations. Biraglia and Brakus shift the focus from products to brands, by investigating why and when it is cool to for a brand to be autonomous. They find that autonomy is only cool under certain conditions, including when a brand comes from a disadvantaged background, the audience is relatively independent, and the product is self-expressive. Pezzuti and Warren investigate the characteristics that make people cool using a new methodology that distinguishes cool traits from traits that seem socially desirable or good. They additionally explore how the characteristics associated with cool people vary across a variety of cultural variables.

By taking different approaches to a similar question, the three papers advance our wisdom and understanding of how people, products, brands, and designs become cool. Collectively, they dispel some of the ineffability that has long characterized the concept of coolness, and help researchers, marketers, and designers alike become wiser about how to capture and create coolness.

Consumer Interpretations of Product Coolness Across Three Cultures

EXTENDED ABSTRACT

Deeply rooted in U.S. history and culture, the term and notion of 'coolness' have gained popularity in many other cultures (Belk et al. 2010; Van den Berg and Behrer 2011), with marketers around the world often willing to go to great lengths to figure out what appeals to consumers, and how to design and sell "the next cool thing" (Belk et al. 2010; Kerner and Pressman 2007). Yet despite the global importance of the coolness construct, prior research on coolness has been surprisingly scant, particularly in a cross-cultural context. This lack of research can be partially attributed to coolness being a socially constructed characteristic, which is somewhat elusive (Nancarrow et al, 2002; Tapp and Bird 2008) and highly subjective (MacAdams 2001; O'Donnell and Wardlow 2000). In the present paper, we set out to understand the different ways in which U.S.-based—or, more broadly, English-speaking—consumers intuitively interpret the meaning of product coolness, and to what extent these interpretations replicate to other cultures. We collect data from a survey in three major cultures that employ the term 'cool' in everyday language—the U.S. (along with a pilot study in the U.K.), Germany and China. Our research focuses on coolness in the context of a product (as opposed to a brand or person).

Study 1 is a pilot examination of how consumers interpret the meaning of product coolness. We use student samples from two English-speaking cultures: 207 respondents from the U.S. and 177 respondents from the U.K. Using open-ended questions—which we then code into categories—participants indicated how they define product coolness, and what they believe determines whether a product is cool. The results reveal a remarkably robust pattern across the two samples. Consistent with previous findings from coolness research (e.g., Warren 2010), respondents largely fail to articulate a clear definition of coolness, but consistently resort to using specific product attributes (such as usefulness, aesthetic design, uniqueness, etc.) as a basis for defining coolness. When it comes to the more general determinants of coolness, consumers interpret a product's coolness as emerging when the product provides some form of intrinsic, social, subjective, and/or marketing-driven value. Because our investigation appears to have good ecological validity, we decide to continue examining both the coolness-driving product attributes and the more general interpretations of coolness in tandem.

Using the insights generated in Study 1, in Study 2 we develop and validate a series of scale measures meant to capture the interpretations of product coolness, and the coolness-driving product attributes. Given the very strong similarity between the U.S. and U.K. samples, this study focuses solely on the U.S. as a representative of English-speaking cultures. We include 136 undergraduate students from a large US university, and a more demographically representative sample of 248 participants recruited via Amazon Mturk. For both the *coolness-driving product attributes* and the *interpretations of coolness*, we generate a pool of scale items derived from the exact words provided by participants in Study 1. Respondents are asked to indicate, on a scale from 1 to 7, the extent to which they believe each item describes cool products.

For the *coolness-driving product attributes,* we use EFA to arrive at a three-factor solution that is stable across the two samples,

and which includes functional attributes (i.e., usefulness and ease-of-use), symbolic attributes (i.e., exclusivity and aesthetics), and creativity. For the interpretations of product coolness, a two-factor solution emerges. Specifically, respondents view a product as cool (a) if it closely meets their needs and preferences (i.e., a *personal interpretation* that represents a combination of the subjective and intrinsic value identified in Study 1, and contains items such as "it possesses outstanding attributes" and "it makes me happy when I use it."), or (b) if it receives the social approval of others (i.e., a *social interpretation*, which represents a broad combination of the social and the marketing-driven value identified in Study 1, and contains items such as "it starts a popular trend," "it is perceived as cool by most people," and "it is associated with a cool brand").

Study 3 examines to what extent U.S. consumers' interpretations of product coolness replicates to Germany and China. We construct an integrative predictive framework that links the coolness-driving product attributes to the two interpretations of coolness, and to consumers' desirability perceptions vis-à-vis cool products. Using Structural Equation Modeling, we find that the framework provides a satisfactory fit to the data across all cultures (χ^2/df= 2.33, CFI = .89, GFI = .82, RMSEA = .05). The two coolness interpretations replicate cross-culturally in terms of both factorial structure and importance, with consumers across cultures agreeing more strongly with the personal interpretation of coolness–and hence rejecting the notion that they see coolness purely as a socially-determined characteristic. Nevertheless, while U.S. consumers view the two interpretations as fully independent facets of coolness (r = -.04, p > .05), Chinese consumers perceive them as strongly inter-related (r = .65, p < .001). The coolness-driving product attributes also vary cross-culturally, with symbolic attributes being the "cooler" ones in China ($M_{symbolic}$ = 5.56, $M_{functional}$ = 5.25, $F(1, 140)$ = 9.33, p < .05), functional ones being the "cooler" ones in Germany ($M_{functional}$ = 5.22, $M_{symbolic}$ = 4.85, $F(1, 135)$ = 7.65, p < .05), and neither of them dominating in the U.S. These findings suggest that Chinese consumers view coolness more strongly related to social and symbolic factors than do U.S. and German consumers, which may also explain why Chinese consumers perceive cool products as particularly high in desirability (M_{China} = 5.59, $M_{Germany}$ = 4.94, M_{US} = 4.75, $F(1, 522)$ = 17.04, p < .001).

Together, these findings support the notion that, despite gravitating towards a rather personal interpretation of coolness, different cultures perceive this interpretation, as well as the product attributes that ultimately factor into it, in a manner that is subject to cultural influences. We use several perspectives on cross-cultural differences to shed light on how the general replicability of our model across cultures can be reconciled with cultural variations.

Why Are Autonomous Brands Cool? The Role of Value Authenticity and Brand Biography

EXTENDED ABSTRACT

Coolness has attracted the interest of scholars from different disciplines: semiotics (Danesi, 1994), psychology (Dar Nimrod et al., 2012), and cultural studies (Hebdige and Potter, 2008). Consumer researchers have linked coolness to autonomous brands (i.e. brands that diverge from the norm; Warren and Campbell, 2014) or to the extent by which an endorser expresses or conceals emotions (Warren et al., 2018). In this paper we extend this research by addressing an overarching research question: when and why is high autonomy cool?

We contribute to the literature on coolness by linking highly autonomous behaviors to the disadvantaged financial and social backgrounds a brand can present in its biography. Such backgrounds are often offered in the companies' narratives about the background of their founders (e.g., Steve Jobs "home brewing" computers in a garage). These narratives are persuasive because of the *underdog effect* -- individuals root for and prefer a disadvantaged entity over an advantaged one (Paharia et al., 2011). We claim that consumers perceive a highly autonomous brand as cooler when the company highlights a disadvantaged rather than an advantaged biography. We argue that value authenticity (i.e. the capacity of sticking with and remaining true to inner values and beliefs; Newman and Smith, 2016) mediates this relationship. In other words, if a brand acts in congruence with its proclaimed values at all stages—production, promotion, or customer care—, then consumers perceive the brand as authentic and consequently as cool. We believe that this is the case because acting autonomously to succeed is more aligned with an underdog rather than with a topdog biography.

We further demonstrate how this mediating effect is stronger for individuals with an independent rather than with an interdependent self-construal (Markus and Kitayama, 1989). Moreover, we show how the link between high autonomy and being an underdog matters especially for the coolness in self-expressive than in functional product categories. Finally, we extend our findings to political marketing by demonstrating how the effect holds also when a politician is a highly autonomous underdog.

We conducted four experiments to test the hypotheses. In Experiment 1 (n = 215) we presented respondents in a laboratory setting with a scenario about a fictitious coffee company. We manipulated the background (disadvantaged vs. advantaged) and the positioning of the company (high autonomy vs. low autonomy). We found that the interaction between a disadvantaged background and a highly autonomous positioning significantly affects the perception of coolness ($M_{Disadvantaged\_high\_autonomy}$ = 5.38, $M_{Advantaged\_high\_autonomy}$ = 3.81; $M_{Disadvantaged\_low\_autonomy}$ = 4.41, $M_{Advantaged\_low\_autonomy}$ = 4.05; $F(1, 214)$ = 12.01, p < .001). We also found that the interaction was fully mediated by value authenticity (B =.0631, SE = .0862, t = .73, NS, LLCI = −.1069, ULCI = .2330; bias-corrected confidence interval = 95%; number of bootstrapping resamples = 10,000).

In Experiment 2 (N= 317 on MTurk) participants rated the coolness of a fictitious apparel brand in a 2 (autonomy: high vs. low) x 3 (background: disadvantaged vs. advantaged vs. control) between-subjects design. The results confirmed a significant interaction effect of the high autonomy with the disadvantaged background $F(2, 316)$ = 8.09, p < .001. Next, we tested a moderated mediation (Model 8; Hayes, 2013) using the interaction term as the IV, value authenticity as the mediator, coolness as the DV, and independent self-construal as the moderating factor. Results showed that value authenticity fully mediated the direct effect of the interaction effect on coolness and that consumers' level of independence moderated the relationship between high autonomy, disadvantaged biography, and coolness. In Experiment 3 (N = 442) we examined the relationship between the disadvantaged company background and the perception of coolness in different product categories (i.e. self-expressive vs. functional). We designed a 2 (autonomy: high vs. low) x 2 (background disadvantaged vs. advantaged) x 2 (category: functional vs. self-expressive) between subject design. As predicted, the a high autonomous underdog is perceived as cool especially when the company operates in a self-expressive category ($M_{Underdog\_High\_Autonomy\_Self-expressive}$ = 5.49, $M_{Topdog\_High\_Autonomy\_Self-expressive}$ = 3.26, $M_{Underdog\_High\_Autonomy\_Functional}$ = 4.48, $M_{Topdog\_High\_Autonomy\_Functional}$ = 3.89, $M_{Underdog\_Low\_Autonomy\_Self-expressive}$ = 4.28, $M_{Topdog\_Low\_Autonomy\_Self-expressive}$ = 3.28, $M_{Underdog\_LowAutonomy\_Functional}$ = 4.37, $M_{Topdog\_Low\_Autonomy\_Functional}$ = 3.88, $F(1, 441)$ = 4.32, p <.05). Finally, in Experiment 4 we show how the link between disadvantaged background and high autonomy works also in a political marketing

context. MTurk participants (N = 207) rated a politician with a disadvantaged background and a highly autonomous slogan as more cool than his advantaged counterpart ($M_{Disadvantaged\_high\_autonomy}$ = 4.57, $M_{Advantaged\_high\_autonomy}$ = 3.42, $M_{Disadvantaged\_low\_autonomy}$ = 3.51, $M_{Advantaged\_low\_autonomy}$ = 3.77; $F(1, 206)$ = 17.06, $p < .001$).

This research extends the literature on coolness, demonstrating how consumers' evaluation of advertising clues (such as a highly autonomous positioning) can be considered cooler under certain conditions (i.e disadvantaged company background; a high level of consumer independence; for self-expressive more than functional categories) due to the mediating role of value authenticity. On a managerial level, this research demonstrates that the use of a disadvantaged brand biography in presenting the company enhances the level of coolness in different contexts (groceries, apparel, and politics).

What Makes People Cool?

EXTENDED ABSTRACT

People want to be cool because being cool brings them the admiration of others and makes them feel better about themselves (Heath and Potter 2004; Quartz and Asp 2015). In turn, people emulate and imitate the behaviors of cool people in an attempt to be seen as cool (Runyan, Noh, and Mosier 2012; Warren and Campbell 2014). Recognizing the power of coolness in the marketplace, marketers pour money into consultants, such as cool hunters and trend spotters, who can ostensibly help them identify and develop cool products (Gladwell 1997; Southgate 2003). Consequently, identifying the characteristics and traits that distinguish cool people from uncool people is an important task for marketers and consumer researchers.

Initial research finds that cool people possess a variety of desirable characteristics (Dar-Nimrod et al. 2012; Horton et al. 2012; Warren, Pezzuti, and Koley 2018). However, if coolness is a distinct trait, rather than merely another way of saying that someone is desirable or good, then there should be a set of characteristics that distinguish cool people both from people perceived to be not cool and from people perceived to be good.

Our research had three objectives. One, to identify the personality traits and characteristics that differentiate cool people from uncool people. Two, to determine whether these characteristics are merely desirable (i.e., they also differentiate good people from bad people) or whether they distinctly apply to cool people. Three, examine whether the characteristics that are perceived to be cool vary across cultures.

To distinguish the characteristics that are perceived to be cool from characteristics perceived to be good, we designed three studies in which we asked participants from the USA and Chile to nominate a non-famous person who they know and like but who they also either consider good, not good, cool, or not cool using a 2 (characteristic type: cool or good) by 2 (characteristic level: present vs. absent) between-subjects design. Participants evaluated this person on 15 characteristics from the Portrait Values Questionnaire (autonomy, hedonism, excitement seeking, power, achievement, conformity, warmth [caring for friends and family], benevolence [appreciation, tolerance, and protection for the welfare of all people and nature], concern for security, and traditionalism [respect, commitment and acceptance of cultural traditions; Schwartz et al. 2001) and the Big Five personality traits (openness, conscientiousness, extroversion, agreeableness, and neuroticism; Gosling, Rentfrow and Swann 2003).

Our first study recruited USA participants (N = 287) on MTurk. To determine which characteristics are most useful for differentiating people that are cool from people that are uncool, we estimated 2 (characteristic type: cool vs. good) x 2 (characteristic level: present vs. absent) ANOVAS with each of the 15 characteristics as dependent variables. These analyses tested whether a characteristic was associated with both coolness and goodness (indicated by a main effect of "characteristic level") or more (or less) associated with coolness than goodness (indicated by an interaction).

Consistent with the literature (Dar Nimrod et al. 2012; Horton et al. 2012), most of the characteristics associated with coolness were also associated with goodness. Participants rated both cool people and good people as being more adventurous, capable, benevolent, warm, conscientious, agreeable, and open, and less neurotic than not-cool and not-good people, respectively. Interestingly, however, significant interactions revealed that the following characteristics were more strongly associated with coolness than goodness: adventurous, open, and (less) neurotic. In contrast, being benevolent warm, conscientious, and agreeable, were more strongly associated with goodness than coolness. Additionally, we identified several characteristics that were associated with cool people but not good people, including being autonomous, hedonistic, powerful, and extroverted.

Interestingly, most of the characteristics that American participants more strongly associated with coolness than goodness, including being autonomous, adventurous, open, hedonistic, powerful, and non-neurotic, signal that the person has the ability or motivation to do what they want rather than follow the expectations or desires of others (Warren and Campbell 2014). The other characteristic that is perceived to be cool but not good was extroversion, which suggests that cool people not only have the freedom to do what they want, they are not loners. They remain highly interactive and connected with others, despite having the ability to do their own thing.

Our second study (N = 335, USA, MTurk) examined whether measured cultural differences, including Hofstede's dimensions (collectivism, uncertainty avoidance, power distance, and masculinity; Yoo et al. 2011), materialism (Richins and Dawson 1992), and tightness-looseness (at the state level; Harrington and Gelfand 2014), influence which characteristics participants associate with cool and good people. The study replicated the findings from study 1. Interestingly, it also showed that the characteristics that distinguish cool people from not-cool people remained fairly stable across the measured cultural differences. For example, even though participants from relatively tight states (e.g., Mississippi, Oklahoma) perceived autonomy as being less good than participants from loose states (e.g., Oregon, California), all participants perceived autonomy as being cool. Similarly, even though participants who scored higher on uncertainty avoidance perceived conformity as being more good than participants who scored lower on uncertainty avoidance, participants did not associate coolness with conformity, regardless of their score on this measure.

Our third study, which recruited undergraduate students from Chile (N = 241; survey in Spanish) and the USA (N = 178, survey in English), replicated the results in a cross-cultural sample. To examine whether the results are similar in Eastern cultures, we are in the process of recruiting participants from India for a fourth study.

In sum, the results of three studies provided consistent evidence that the characteristics that make people seem cool are not the same as the characteristics that make people seem good. In three studies in two culturally distinct countries, autonomy, adventurousness, openness, hedonism, power, a lack of neuroticism, and extroversion differentiated cool people from uncool people more than they differentiated good people from not-good people. Moreover, although the characteristics that are seen as good vary depending on cultural differences like tightness-looseness and uncertainty avoidance, the

characteristics that make people seem cool appear to be relatively stable across cultures.

REFERENCES

Belk, Russell. W., Kelly Tian, and Heli Paavola (2010), "Consuming Cool: Behind the Unemotional Mask," in *Research in Consumer Behavior*, ed. Russell W. Belk, Emerald Group Publishing Limited, 183–208.

Danesi, Marcel (1994), *Cool: The Signs and Meanings of Adolescence*, University of Toronto Press.

Dar-Nimrod, Ilan, I. G. Hansen, T. Proulx, and D. R. Lehman (2012), "Coolness: An Empirical Investigation," *Journal of Individual Differences*, 33, 175–185.

Gladwell, Malcolm (1997), "The Coolhunt," *The New Yorker* (March 17), 78-87.

Gosling, Samuel D., Peter J. Rentfrow, and William B. Swann Jr. (2003), "A Very Brief Measure of the Big-Five Personality Domains," *Journal of Research in Personality*, 37, 504–528.

Harrington, Jesse R. and Michele J. Gelfand (2014), "Tightness–Looseness Across the 50 United States," *Proceedings of the National Academy of Sciences*, 111, 7990–7995.

Heath, Joseph and Andrew Potter (2004), "*Nation of Rebels: Why Counterculture Became Consumer Culture*," HarperCollins.

Hebdige, Dick and Andrew Potter (2008), "A Critical Reframing of Subcultural Cool and Consumption," in *European Advances in Consumer Research*, ed. Stefania Borghini, Mary Ann McGrath, and Cele Otnes, Association for Consumer Research, 527–528.

Horton, Matthew, Janet C. Read, Daniel Fitton, Linda Little, and Nicola Toth (2012), "Too Cool at School: Understanding Cool Teenagers," *PsychNology Journal,* 10, 73–91.

Im, Subin, Subodh Bhat, and Yikuan Lee (2015), "Consumer Perceptions of Product Creativity, Coolness, Value and Attitude," Journal of Business Research, 68 (1), 166–72.

Kerner, Noah and Gene Pressman (2007), *"Chasing Cool: Standing out in T*oday's Cluttered Marketplace," Atria.

Kim, Ki Joon, Dong-Hee Shin, and Eunil Park (2015), "Can coolness predict technology adoption? Effects of perceived coolness on user acceptance of smartphones with curved screens," *Cyberpsychology, Behavior, and Social Networking,* 18 (9), 528-533.

MacAdams, Lewis (2001), *Birth of The Cool: Beat, Bebop, and the American Avant Garde*. Free Press, New York.

Markus, Hazel R. and Shinobu Kitayama (1991), "Culture and the Self: Implications for Cognition, Emotion, and Motivation," *Psychological Review*, 98, 224–53.

Nancarrow, Clive, Pamela Nancarrow, and Julie Page (2002), "An Analysis of the Concept of Cool and Its Marketing Implications," *Journal of Consumer Behavior,* 1, 311–322.

Newman, George E. and Rosanna K. Smith (2016), "Kinds of Authenticity," *Philosophy Compass*, 11 (10), 609–618.

O'Donnell, Kathleen, A. and Daniel L. Wardlow (2000), "A Theory of the Origins of Coolness," *Advances in Consumer Research*, 27, 13–18.

Paharia, Neeru, Anat Keinan, Jill Avery, and Juliet B. Schor (2011), "The Underdog Effect: The Marketing of Disadvantage and Determination through Brand Biography," *Journal of Consumer Research*, 37, 775–790.

Pieters, Rik (2017), "Meaningful Mediation Analysis: Plausible Causal Inference and Informative Communicatio," *Journal of Consumer Research,* 44, 692–716.

Quartz, Stephen and Anette Asp (2015), "*Cool: How the Brain's Hidden Quest for Cool Drives our Economy and Shapes Our World*," Farrar, Straus and Giroux.

Richins, Marsha L. and Scott Dawson (1992), "A Consumer Values Orientation for Materialism and its Measurement: Scale Development and Validation," *Journal of Consumer Research* 19, 303–316.

Runyan, R. C., Noh, M., and Mosier, J. (2013). What is cool? Operationalizing the Construct in an Apparel Context. *Journal of Fashion Marketing and Management: An International Journal*, 17, 322–340.

Runyan, Rodney C., Mijeong Noh, and Jon Mosier (2013), "What Is Cool? Operationalizing the Construct in an Apparel Context," *Journal of Fashion Marketing and Management*, 17, 322–340.

Schwartz, Shalom H., Gila Melech, Arielle Lehmann, Steven Burgess, Mari Harris, and Vicki Owens (2001), "Extending the Cross-Cultural Validity of the Theory of Basic Human Values with a Different Method of Measurement," *Journal of Cross-Cultural Psychology*, 32, 519–542.

Shin, Donghee, and Frank Biocca (2018), "Exploring immersive experience in journalism," *New Media & Society*, 20(8), 2800–2823.

Southgate, Nick (2003), "Coolhunting, Account Planning and the Ancient Cool of Aristotle," Marketing Intelligence & Planning, 21 (7), 453-461.

Spencer, Steven J., Mark P. Zanna, and Geoffrey T. Fong (2005), "Establishing a Causal Chain: Why Experiments are Often More Effective than Mediational Analyses in Examining Psychological Processes." *Journal of Personality and Social Psychology* 89, 845–851.

Tapp, Alan and Sara Bird (2008), "Social Marketing and the Meaning of Cool," *Social Marketing Quarterly*, 14, 18–29.

Van Den Bergh, Joeri and Mattias Behrer (2011), "*How Cool Brands Stay Hot: Branding to Generation Y,*" Kogan Page Publishers.

Warren, Caleb and Margaret C. Campbell (2014), "What Makes Things Cool? How Autonomy Influences Perceived Coolness," *Journal of Consumer Research*, 41, 543–563.

Warren, Caleb (2010), "*What Makes Things Cool and Why Marketers Should Care*," Proquest Umi Dissertation Publishing.

Warren, Caleb, Todd Pezzuti, and Shruti Koley (2018), "Is Being Emotionally Inexpressive Cool?" *Journal of Consumer Psychology,* 28, 560–577.

Warren, Caleb and Martin Reimann (2019), "Crazy-funny-cool theory: Diverging reactions to unusual product designs," *Journal of the Association of Consumer Research*, 4 (4), 409-421.

Yoo, Boonghee, Naveen Donthu, and Tomasz Lenartowicz (2011), "Measuring Hofstede's Five Dimensions of Cultural Values at the Individual Level: Development and Validation of CVSCALE," *Journal of International Consumer Marketing,* 23, 193–210.

Consumer Consequences of Robotic Replacement

Chairs: Emanuel de Bellis, University of St. Gallen, Switzerland
Bernd Schmitt, Columbia University, USA

Paper #1: Consumer Preferences for Human Versus Robotic Labor: The Role of Symbolic Consumption

Stefano Puntoni, Erasmus University Rotterdam, The Netherlands
Armin Granulo, Technical University of Munich, Germany
Christoph Fuchs, Technical University of Munich, Germany

Paper #2: This Robot Doesn't Judge Me – Service Robots and the Choice of Embarrassing Products

Jenny van Doorn, University of Groningen, The Netherlands
Jana Holthoewer, University of Groningen, The Netherlands

Paper #3: How Robotic Customer Service Impacts Consumers' Evaluation of the Firm

Noah Castelo, University of Alberta, Canada
Johannes Boegershausen, University of Amsterdam, The Netherlands
Christian Hildebrand, University of St. Gallen, Switzerland
Alex Henkel, Open University, The Netherlands

Paper #4: Inner Values Also Count: Algorithm Types Drive Consumer Adoption of Robotic Technologies

Melanie Clegg, University of Lucerne, Switzerland
Reto Hofstetter, University of Lucerne, Switzerland
Emanuel de Bellis, University of St. Gallen, Switzerland
Bernd Schmitt, Columbia University, USA

SESSION OVERVIEW

Advances in artificial intelligence (AI) and robotics enable firms to replace humans with modern technology, leading to a radical transformation in the production and consumption of goods and services. In the service domain, robots are used to communicate and interact with consumers in a wide variety of contexts, including stores, restaurants, and hotels. By 2025, it is predicted that 95% of all customer interactions will be powered by some form of AI or robotics. While research has started to shed light on this transformation (Castelo, Bos, and Lehmann 2019; de Bellis and Johar 2020; Granulo, Fuchs, and Puntoni 2019; Mende et al. 2019; Schmitt 2019), we are only beginning to understand its multifaceted consequences for consumers. The four papers in this session aim to improve this understanding by answering the following key question: What are the psychological consequences of robotic replacement for consumers?

The first paper by **Puntoni, Granulo, and Fuchs** examines for which products consumers prefer robotic versus human labor. It shows that consumers value human (vs. robotic) labor more for products with higher symbolic value, as it lends products unique qualities in the eyes of consumers. The second paper by **Van Doorn and Holthoewer** examines for which products consumers prefer robotic versus human service providers. It shows that consumers are more accepting of a robotic service provider when acquiring embarrassing products because they feel less judged by a robot than by a human. The third paper by **Castelo et al.** examines the downstream consequences of robotic versus human service providers for firms. It shows that consumers perceive firms that use robotic service providers as less customer-centric, which in turn decreases service satisfaction and willingness to recommend the firm to others. Whereas the first three papers contrast robots with humans, the fourth paper by **Clegg et al.** examines different types of algorithms that are the backbone of robotic technologies. It shows that technologies based

on adaptive algorithms are perceived as more creative whereas those based on pre-programmed algorithms are perceived as more predictable, showing that also the "inner values" of robotic technologies influence their adoption by consumers.

Taken together, this session is intended to deepen our knowledge on the psychological consequences of robotic replacement from a consumer perspective. The papers utilize multi-method approaches, combining data from online, lab, and field studies to explore the robustness and generalizability of the proposed effects. This session speaks to ACR's call for special sessions on the impact of technology on consumption by highlighting the diverse consequences of replacing humans by robotic technologies. This session should not only be of interest to scholars working on new technologies, AI, and robotics but also to anybody interested in symbolic consumption, emotion, and creativity.

Consumer Preferences for Human Versus Robotic Labor: The Role of Symbolic Consumption

EXTENDED ABSTRACT

Advances in robotics, automation, and artificial intelligence increasingly enable firms to replace human labor with modern technology, fundamentally transforming how goods and services are produced. The consequences of these developments for the demand for human labor are hotly debated in both academia and popular press. Within the social sciences, the debate has been most intense within economics with a focus on when, that is, for which tasks, human labor can potentially be replaced by robotic labor (e.g., Autor, Levy, and Murnane 2003). Despite the relevance of these developments to consumers—robots and algorithms are transforming consumer-firm interactions in many industries—consumer researchers have so far provided little insight into how consumers react to today's robotic revolution (cf. Granulo, Fuchs, and Puntoni 2019).

In this research, we examine consumer acceptance of human versus robotic labor—and how this acceptance depends on product characteristics. Specifically, this research investigates for which specific products, services, and product features consumers are more likely to favor human over robotic labor. In seven studies using different products, designs, and samples, we predict and demonstrate that consumers value human (vs. robotic) labor more for products with higher symbolic value (i.e., where expressing something about one's beliefs and personality is of central importance; e.g., Belk 1988; Reed et al. 2012). We theorize that human (vs. robotic) labor creates value by lending products unique qualities in the eyes of consumers. Consumers should value these unique qualities (e.g., Brock 1968; Tian and McKenzie 2001) more for products with higher symbolic value, resulting in greater preferences for human (vs. robotic) labor in the case of products with higher symbolic value. We provide support for this theoretical framework by documenting (i) greater consumer preference for human (vs. robotic) labor in more symbolic consumption contexts, (ii) that this effect is mediated by product uniqueness, controlling for various other alternative accounts (e.g., love, product importance, and product quality), (iii) that the effect is moderated by consumers' need for uniqueness, and (iv) that it can be observed even when there is no direct (physical) contact in the production process (differentiating the effect from work on handmade products; Fuchs et al. 2015).

To test our main prediction that consumers favor human (vs. robotic) labor more in symbolic consumption contexts, we conducted five studies focusing on the symbolic value of different products, services, consumption contexts, and product components. In study 1 ($N = 72$, students), we asked participants to rate a series of products on symbolic value or on relative preference for human labor. Preference for human (vs. robotic) production was highest for product categories whose symbolic value was in the upper third (e.g., jewelry or suits), and lowest for products whose symbolic value was in the lower third (e.g., toolsets or car brakes; 20 product categories in total). In study 2A ($N = 144$, students), we find that consumers prefer human (vs. robotic) labor more when the symbolic value of a service is high (i.e., getting a tattoo) than when the symbolic value of a service is low (i.e., getting a tattoo removed; $M_{high} = 5.03$ vs. $M_{low} = 4.03$, $t(142) = 3.65$, $p < .0001$).[1] In study 3A ($N = 322$, MTurk), we document that consumers are more likely to purchase products designed by a human (vs. algorithm)—but produced by a machine—when they have more symbolic consumption goals (i.e., purchasing a printed poster to decorate; $M_{human} = 4.39$ vs. $M_{algorithm} = 2.30$) than when they have less symbolic consumption goals (i.e., purchasing a printed poster to educate; $M_{human} = 4.30$ vs. $M_{algorithm} = 3.25$; $F(1, 318) = 5.20$, $p < .05$). And in study 4A ($N = 124$, MTurk), we document that consumers choose human (vs. robotic) production for more symbolic product components (i.e., the frame of eyeglasses; 59% vs. 41%, $Z = 2.00$, $p < .05$) but not for less symbolic product components (i.e., the lenses of eyeglasses; 23% vs. 77%, $Z = 6.01$, $p < .0001$, $= 35.2$, $p < .0001$).

To test our prediction that uniqueness can explain why consumers prefer human (vs. robotic) labor more in symbolic consumption contexts, we conducted two additional studies. Specifically, we tested whether this relative preference is moderated by individuals' need for uniqueness, and whether it is mediated by product uniqueness. In study 3B ($N = 402$, MTurk), we find that consumers value human (vs. robotic) labor more strongly for products with higher symbolic value when they have a higher need for uniqueness ($b = 0.724$, $(394) = 2.08$, $p < .05$; 95% CI: [0.04, 1.41]). Specifically, the interaction between production mode and symbolic value was non-significant for individuals low in need for uniqueness ($F(1, 133) = 0.57$, $p = .451$) and highly significant for respondents high in need for uniqueness ($F(1, 123) = 8.78$, $p < .01$). In study 4B ($N = 201$, Prolific), we find that consumers value human (vs. robotic) more for products with higher symbolic value because they want more unique products (indirect effect: $b = 0.222$, $SE = 0.09$, $Z = 2.42$, $p < .05$; 95% CI: [0.08, 0.45]).

In summary, our research demonstrates that human labor creates additional economic value in consumption contexts where symbolism plays a central role. By doing so, we complement the supply-side perspective in the economics literature (e.g., for which tasks human labor can and cannot be replaced by firms) with a demand-side perspective (e.g., for which products human labor can and cannot create value for consumers). Moreover, we demonstrate that one important driver behind our findings is that human (vs. robotic) labor lends products unique qualities in the eyes of consumers. Our findings suggest that the extent to which human labor will continue playing a role in production processes in the years to come should not only depend on cost and efficiency, but also on the inherent characteristics of products.

---

[1]   In study 2B (N = 192, MTurk), we replicate this effect in a 2(symbolic: high vs. low) × 2(labor: human vs. robotic labor) between-participants design (F(1, 188) = 6.40, p < .05).

This Robot Doesn't Judge Me – Service Robots and the Choice of Embarrassing Products

EXTENDED ABSTRACT

During the last years, there has been significant progress in service automation, robots, and artificial intelligence (AI; Kahn et al. 2013). Service robots have started to communicate and interact with customers in a frontline service setting. With a 61% sales increase of service robots for professional use from 2017 to 2018 (Industrial Federation of Robotics 2019), it is estimated that 95% of all customer interactions will be powered by AI by 2025 (Servion Global Solutions 2018). Service robots distinguish themselves from previous generations of technology and automation because they often go beyond a merely functional role and engage their users on a social level. The degree to which technology makes consumers feel the presence of another social entity is known as automated social presence (Van Doorn et al. 2017). Yet, previous literature shows that service robots are not always easily accepted. On the contrary, they can trigger negative feelings and compensatory behaviors (Mende et al. 2019), and cause more discomfort than dealing with a human employee (Čaić et al. 2019). Given that service robots are on the rise, it is imperative to identify circumstances where the negative effects documented in previous literature are attenuated, or can even be avoided altogether. In this paper, we investigate whether service robots can help overcome consumer reluctance to acquire embarrassing products.

Social identity theory posits that unwanted negative evaluations from audiences can cause a threat to one's social identity (Edelmann 1987; Miller and Leary 1992) and influence patronage decisions (Moore et al. 2006; Grace 2009). In embarrassing service situations, consumers endanger their health, engage in risky behavior, and avoid seeking medical care in order to avoid social judgment (Helweg-Larsen and Collins 1994; Lund-Nielsen et al. 2011; Kiefe et al. 1998). We argue that robots may reduce this feeling and thus make it easier for consumers to, for example, collect medication that they experience as embarrassing. Hence, we extend the concept of social presence, that has shown to influence embarrassment in purchase situations (Argo et al. 2005; Dahl et al. 2001), to automated social presence, therewith taking into account novel ways of purchase interactions that come with the development of new technology.

We furthermore explore the role of anthropomorphism in shaping how consumers react to service robots. Anthropomorphization means imbuing the "behavior of nonhuman agents with human-like characteristics, motivations, intentions, or emotions" (Epley, Waytz, and Cacioppo 2007, p. 864). Although humanizing robots is the ultimate goal in robotics (Rubin 2003), there is a certain risk that consumers feel uncomfortable in dealing with very human-like robots. This phenomenon is known as the "uncanny valley" (Mori, MacDorman, and Kageki 2012). We argue that very human-like robots might increase consumers' apprehension of judgments by anthropomorphizing this attribute to the robot, leading to a less positive consumer evaluation (Miller 1995). Thus, consumers may prefer less anthropomorphic robotic service providers in an embarrassing situation.

In three studies, we find that consumers are indeed more accepting of robotic service providers in embarrassing situations. In study 1 ($N=136$, 47 males) involving real choice behavior participants watched a video featuring a human vs. robotic ambassador promoting a new health initiative and offering a free giveaway. The giveaway was either a pack of condoms (high embarrassment) or hand sanitizer (low embarrassment). The percentage of participants taking the pack of condoms rather than refusing it rose from 38% for the

human ambassador to 61% for the robotic ambassador ((1)=3.353, p=.067).

Study 2 is a 2 (service provider: human vs. robot) × 2 (embarrassment product: low vs. high) between-subjects Prolific study. Respondents (N=395, 174 males) imagine buying antibiotics for an ear infection (low embarrassment) or a sexually transmitted disease (high embarrassment) from a human vs. robot at their local pharmacy. The results reveal a main effect of service provider (F(1,394)=27.209, p<.001) and a two-way interaction between service provider and product embarrassment (F(1,394)=5.066, p=.025). Participants acquiring non-embarrassing products had higher loyalty intentions when there was a human (M=5.04) rather than a robotic service provider (M=3.93; F(1,391)=27.943, p<.001). Yet, the preference for a human service provider was less pronounced when buying embarrassing products (M_{human}=4.65, M_{robot}=4.21; F(1,391)=4.387, p=.037). This indicates that product embarrassment attenuates the negative effect of a robot. As expected, social judgment acts as a mediator in that consumers feel less judged by a robot when acquiring embarrassing products, which again drives their loyalty intentions (M_{robot}=3.81, M_{human}=4.38; F(1,391)=8.684, p=.003, 95%CI: [0.020, 0.206]).

Study 3 (N=795, 376 males) extends the previous study and explores the impact of the level of anthropomorphism of the robot (machine-like, human-like, very human-like). When acquiring non-embarrassing products, participants express higher loyalty intentions when served by a human (M=5.10) than by any robot ($M_{machine-like}$=4.24, $M_{human-like}$=4.37, $M_{veryhuman-like}$=3.93; F(3,787)=10,733, p<.001). Buying embarrassing products attenuates this consistent preference for the human service provider. Particularly, participants are equally likely to be loyal to the pharmacy when served by a human service provider (M_{human}=4.60) or a more anthropomorphic robot ($M_{human-like}$=4.45, p=.490; $M_{veryhuman-like}$=4.37, p=.297). Countering our expectations, lowest loyalty is expressed towards the least anthropomorphic robot ($M_{machine-like}$=4.14; p=.034), although a moderated mediation analysis reveals that consumers feel less socially judged by it (M=3.75; 95%CI: [0.003, 0.130]) compared to a human (M=4.54) when acquiring embarrassing products. Consumers feel also less judged by a human-like robot (M=3.76; 95%CI: [0.003, 0.126]), yet the very human-like robot is perceived as equally judging as the human (M=4.03; 95%CI: [-0.001, 0.093]).

This paper contributes to literature by showing an important boundary condition to earlier work cautioning that consumers are reluctant to accept robotic service providers (Čaić et al. 2019; Mende et al. 2019). Importantly, we find that consumers are more accepting of robotic service providers when acquiring embarrassing products. As expected, social judgment mediates the relationship in that consumers feel less judged by a robot than by a human. Given that consumers feel less judged by a moderately anthropomorphic robot compared to a human, yet express equally high loyalty intentions when acquiring an embarrassing product, a moderately anthropomorphic robot seems a better choice when selling embarrassing products than a machine-like or very human-like robot.

How Robotic Customer Service Impacts Consumers' Evaluation of the Firm

EXTENDED ABSTRACT

Robots are being used to provide customer service online and in stores. However, only 15% of firms that currently use the market-leading Pepper service robot plan to renew their contracts (Whitton 2018). We use real customer-machine interactions to shed light on the challenges facing the use of service robots.

We propose that encountering service robots activates a lay theory that automation is motivated by profit maximization at the expense of the customer experience. Since firms have finite resources, consumers rely on a "zero-sum heuristic" (Chernev 2007), such that investments into service robots may be perceived as coming at the expense of a worse customer experience.

Firms using service robots should therefore be seen as less customer-centric than firms that do not, which should in turn decrease consumers' service satisfaction and willingness to recommend the firm to others.

These effects should be attenuated when the firm's perceived motivation for using the automation is to overcome current shortcomings in customer service.

Study 1: In a field study over four days, we varied whether 109 customers in a café placed their order with a Pepper robot or with a human. After ordering, customers rated their agreement with the statements "I would recommend this coffee bar to a friend or colleague" and "I am satisfied with my service experience today" (α = .92). These firm outcomes were worse in the robot condition (M = 5.34) than in the human condition (M = 5.81, F(1,107) = 4.89, p = .029). The difference remained significant controlling for technology affinity, age, gender, and frequency of visiting the café.

Study 2: 238 Prolific participants engaged in an online chat with a chatbot but were told that they were interacting either with a bot or with a human. This keeps the interaction identical across conditions. were told that we were testing new customer service platforms for a telecommunications company and that they would interact with one of the company's representatives. After the interaction, we measured service satisfaction and recommendation willingness as in Study 1. We also measured perceived customer centricity of the firm (Habel et al. 2019).

The firm seemed less customer-centric when participants believed they were chatting with a bot than with a human ($M_{Chatbot}$ = 4.75, M_{Human} = 5.28; t(236) = 2.66, p = .008), and consumers had lower satisfaction and willingness to recommend the firm ($M_{Chatbot}$ = 4.87, M_{Human} = 5.38; t(236) = 2.47, p = .014). A mediation model with bootstrapped estimates (5000 iterations) confirmed the positive effect of customer centricity on firm outcomes (β = .79, p < .001), switching off the main effect of condition (β = -.09, p = .49), and an indirect effect excluding zero (-.42, 95% CI = -.71, -.11), indicating full mediation.

Study 3: We used a platform called Chatplat, which allows researchers to connect participants to engage with text-based chat with each other. We recruited 1076 participants from Prolific and assigned them to either the "employee" role or the "customer" role. All participants were told we were working with a telecommunications company to test new customer service platforms and were given a script to follow, which involved the customer asking about changing a mobile phone plan and the employee asking for their customer ID and providing the requested information.

Customers were further divided into three conditions. In the *human* condition, they were told they would chat with a customer service employee from the company. In the *chatbot* condition, they were told they would chat with a chatbot. In the *customer-centric chatbot* condition, they were told that they would chat with a chatbot and that the company's goal in using chatbots was to "reduce wait times and improve service for customers." This condition also stated that since introducing the chatbot, "the average wait time for customer to connect with an agent has decreased from over 5 minutes to less than 10 seconds."

In reality, the "employee" with whom the "customers" chatted was always another Prolific participant. Our interest was in com-

paring participants' experience across the three customer conditions. After the interaction, participants again reported service satisfaction and recommendation likelihood.

We first cleaned the data by conducting several exclusions. We excluded the 541 participants in the "employee" role given our interest in the "customers'" experiences. We excluded 141 participants who reported having technical difficulties during the chat; these were inevitable since participants matched with each other in real time to conduct the chat and thus some participants had to wait too long for their chat partner and could not complete the chat in a timely manner. Finally, we excluded 72 participants who did not correctly remember whether they had chatted with a human employee or a chatbot and 111 participants who did not believe that they had chatted with a human or chatbot despite what they had been told. Final sample sizes per condition were 55 in the human condition, 86 in the regular chatbot condition, and 83 in the customer-centric chatbot condition.

Firm outcomes were best in the human condition ($M = 8.47$), worse in the regular chatbot condition ($M = 6.99$, $t(139) = 3.96$, $p < .001$), and also worse in the customer-centric chatbot condition but to a lesser degree ($M = 7.56$, $t(135) = 2.41$, $p = .016$). The difference between the two chatbot conditions was marginally significant ($t(167) = 1.75$, $p = .087$).

Taken together, these results show that firms using service robots to automate customer service are perceived as less customer-centric and that consumers are less satisfied with and less likely to recommend such firms to others, relative to firms using humans. Furthermore, we show that firms can reduce these negative consequences by highlighting a customer-centric motivation for using robots. Additional completed studies show that using service robots for less customer-centric tasks (i.e., food delivery vs. waiter) can also reduce these effects.

Our findings help explain why initial rollouts of service robots have been lackluster and have clear implications for how firms can improve outcomes while continuing to pursue the use of this technology.

Inner Values Also Count: Algorithm Types Drive Consumer Adoption of Robotic Technologies

EXTENDED ABSTRACT

Algorithms are implemented in all robotic technologies. These technologies take care of our elderly (Bemelmans et al. 2012), serve us food (Mende et al. 2019), and undertake domestic work (Rijsdijk and Hultink 2009). One major obstacle to accept robotic technologies (e.g., as co-workers or employees) is lacking transparency and informedness about their true technological underpinnings (Moreau, Lehmann, and Markman 2001; Rai 2020), since their "inner values" oftentimes remain opaque for consumers. Therefore, firms increasingly start to communicate details about algorithms of technologies to their consumers (e.g., the app FitnessAI or Samsung's smart fridge; FitnessAI 2019; Samsung 2018). However, no research so far has addressed the question of how this information can influence consumer behavior.

This research examines whether and how information about the details of implemented algorithms can shape consumers' technology adoption. It therewith complements former research that presumably takes a materialistic perspective focusing either on the outer appearance (Kim, Schmitt, and Thalmann 2019; Mende et al. 2019), or the observable output or attributes of a technology (Mukherjee and Hoyer 2001). It further extends research on algorithm acceptance that mainly measured lay perceptions of algorithms and AI as generic concepts (Castelo, Bos, and Lehmann 2019; Longoni, Bonezzi, and

Morewedge 2019) while highlighting additional barriers to consumer adoption of autonomous technologies (de Bellis and Johar 2020).

Based on computer science literature we distinguish two fundamentally different types of algorithms: adaptive (whose parameters can be changed by using external data) and pre-programmed (whose parameters are fixed in-advance by a programmer). We predict that adaptive (vs. pre-programmed) algorithms increase the intention to use a technology (usage intention) because they are perceived as more creative (H1A, H1B). We further predict that this effect reverses when the tasks of a technology require only a low degree of creativity and specific outcomes are valued (H2). In such cases, a pre-programmed algorithm increases usage intention, because it is perceived as more predictable (H2-H3).

The pilot study applied a Turing test paradigm (Turing 1950/2009) to test whether algorithm type influences consumer perceptions independently from a technology's output. According to the Turing test, a machine is considered intelligent if its communication behavior is indistinguishable from human behavior. In our version, we let participants (US-MTurkers, $N=192$, $M_{age}=34.14$, 46% female) chat with an advanced chat bot. Though all participants chatted with the same bot (thus holding output constant), we experimentally manipulated information about the bot's implemented algorithm (pre-programmed vs. adaptive). We found that participants rated the bot as more intelligent ($M_{adaptive}=4.10$, $M_{pre-programmed}=3.49$, $F(1, 190)=5.25$, $p=.04$) and more human-like ($M_{adaptive}=3.73$, $M_{pre-programmed}=2.80$, $F(1, 190)=16.34$, $p<.001$) if they were told it used an adaptive (vs. pre-programmed) algorithm. This indicates that not only the output but also the implemented algorithm matters for consumers.

Study 1 formally tests how algorithm type shapes consumers' perception of and intention to use a technology (H1-H2). In a lab study conducted at a large Northeastern university, participants ($N=207$, $M_{age}=24.55$, 57% female) were informed about the algorithm implemented in a voice assistant (adaptive vs. pre-programmed, 2-cell between subjects), before indicating their intention to use it. A one-way ANOVA revealed that usage intention was significantly increased if participants were informed that the voice assistant applies an adaptive (vs. pre-programmed) algorithm ($M_{adaptive}=4.70$, $M_{pre-programmed}=4.05$, $F(1, 205)=6.50$, $p=.01$). This effect is mediated by perceived creativity of the algorithm ($b=.61$, 95%CI=[.34; .94]). Note that we did not find a mediation via predictability ($b=-.02$, 95%CI=[-.20; .14]) because a voice assistant is considered a creative technology.

Study 2 tests whether task creativity (i.e., the creativity required by the tasks of a technology) moderates the effect of algorithm type on usage intention (H1-H3). We conducted an online study with US-MTurkers ($N=395$, $M_{age}=35.71$, 48% female) and employed a 2×2 between-subjects design. Participants were informed about the algorithm implemented in a cooking app (adaptive vs. pre-programmed), before indicating their intention to use it. We additionally manipulated the task for which the app should be used (high creativity: baking a completely novel cake vs. low creativity: baking a cake exactly by recipe). A two-way ANOVA revealed a significant interaction between both factors ($F(1, 391)=14.61$, $p<.001$). Follow-up contrasts confirmed that usage intention is significantly higher for the adaptive (pre-programmed) algorithm when task creativity is high (low). Parallel moderated mediation analysis supported H2 and H3: The mediation via perceived algorithm creativity on usage intention is significantly higher when task creativity is high (index of moderated mediation: $b=.40$, 95%CI=[.17; .67]), while a mediation via perceived predictability is significant only when task creativity is low (index of moderated mediation: $b=.59$, 95%CI=[.30; .93]).

Studies 3A and 3B generalize the findings to a broader range of products (H1-H3). In study 3A, we let US-MTurkers (*N*=181, M_{age}=35.46, 52% female) evaluate either task creativity or predictability of 54 robotic products. A separate MTurk sample (*N*=131, M_{age}=34.32, 48% female) received information about both algorithm types and indicated in a binary choice which they preferred for each of the 54 products. Analyses revealed a positive correlation between products' task creativity and the ratio of participants voting for an adaptive algorithm in the binary choice (*r*=.83, *p*<.001). Predictability ratings correlate much less with the ratio of adaptive choices (*r*=.23, *p*=.084). Corroborating these findings, we calculated the sentiment of over 11,000 Twitter posts that discussed the 54 products in the context of AI (with AI being colloquially used for adaptive algorithms; Arel, Rose, and Karnowski 2010). Sentiment positively correlated with products' creativity ratings (*r*=.29, *p*=.09), suggesting that consumers perceive AI in creative products more positively.

In sum, we find that also the inner values of technologies influence consumers' technology adoption. Interestingly, our findings imply that consumers assign a degree of creativity to technologies if they are appropriately informed about their capabilities (i.e., their adaptivity). This contradicts typical lay assumptions that creativity is a human-like trait which algorithms are incapable of due to their mechanical and analytical thinking (Huang and Rust 2018). Our findings imply that, aside from increasing the human-like appearance of technologies, informing about their inner values can boost their adoption.

REFERENCES

Arel, Itamar, Derek C. Rose, and Thomas P. Karnowski (2010), "Deep Machine Learning–A New Frontier in Artificial Intelligence Research," *IEEE Computational Intelligence Magazine*, 5 (4), 13–18.

Argo, Jennifer J., Darren W. Dahl, and Rajesh V. Manchanda (2005), "The Influence of a Mere Social Presence in a Retail Context," *Journal of Consumer Research*, 32 (2), 207–212.

Autor, David H., Frank Levy, and Richard J. Murnane (2003), "The Skill Content of Recent Technological Change: An Empirical Exploration," *The Quarterly Journal of Economics*, 118 (4), 1279–1333.

Belk, Russell W. (1988), "Possessions and the Extended Self," *Journal of Consumer Research*, 15 (2), 139–168.

Bemelmans, Roger, Gert Jan Gelderblom, Pieter Jonker, and Luc De Witte (2012), "Socially Assistive Robots in Elderly Care: A Systematic Review into Effects and Effectiveness," *Journal of the American Medical Directors Association*, 13 (2), 114–120.

Brock, Timothy C. (1968), "Implications of Commodity Theory for Value Change," in *Psychological Foundations of Attitudes* (pp. 243–275). Elsevier.

Čaić, Martina, João Avelino, Dominik Mahr, Gaby Odekerken-Schröder, and Alexandre Bernardino (2019), "Robotic versus Human Coaches for Active Aging: An Automated Social Presence Perspective," *International Journal of Social Robotics*, 1–16.

Castelo, Noah, Maarten W. Bos, and Donald R. Lehmann (2019), "Task-Dependent Algorithm Aversion," *Journal of Marketing Research*, 56 (5), 809–825.

Chernev, Alexander (2007), "Jack of All Trades or Master of One? Product Differentiation and Compensatory Reasoning in Consumer Choice," *Journal of Consumer Research*, 33 (4), 430–44.

Dahl, Darren W., Rajesh V. Manchanda, and Jennifer J. Argo (2001), "Embarrassment in Consumer Purchase: The Roles of Social Presence and Purchase Familiarity," *Journal of Consumer Research*, 28 (3), 473–481.

de Bellis, Emanuel and Gita Venkataramani Johar (2020), "Autonomous Shopping Systems: Identifying and Overcoming Barriers to Consumer Adoption," *Journal of Retailing*, 96 (1), 74–87.

Edelmann, Robert J. (1987), *The Psychology of Embarrassment*, John Wiley & Sons.

Epley, Nicholas, Adam Waytz, and John T. Cacioppo (2007), "On Seeing Human: A Three-Factor Theory of Anthropomorphism," *Psychological Review*, 114 (4), 864–886.

FitnessAI. (2019), "Get Stronger with AI," https://www.getfitnessai.com/.

Fuchs, Christoph, Martin Schreier, and Stijn M. J. Van Osselaer (2015), "The Handmade Effect: What's Love Got to Do with It?" *Journal of Marketing*, 79 (2), 98–110.

Grace, Debra (2009), "An Examination of Consumer Embarrassment and Repatronage Intentions in the Context of Emotional Service Encounters," *Journal of Retailing and Consumer Services*, 16 (1), 1–9.

Granulo, Armin, Christoph Fuchs, and Stefano Puntoni (2019), "Psychological Reactions to Human versus Robotic Job Replacement," *Nature Human Behavior*, 3 (10), 1062–1069.

Habel, Johannes, Roland Kassemeier, Sascha Alavi, Philipp Haaf, Christian Schmitz, and Jan Wieseke (2019), "When Do Customers Perceive Customer Centricity? The Role of a Firm's and Salespeople's Customer Orientation," *Journal of Personal Selling and Sales Management*, 39 (1), 1–19.

Helweg-Larsen, Marie and Barry E. Collins (1994), "The UCLA Multidimensional Condom Attitude Scale: Documenting the Complex Determinants of Condom Use in College Students," *Health Psychology*, 13 (3), 224–237.

Huang, Ming-Hui and Roland T. Rust (2018), "Artificial Intelligence in Service," *Journal of Service Research*, 21 (2), 155–172.

Industrial Federation for Robotics (2019), "Executive Summary World Robotics 2019 Service Robots," https://ifr.org/downloads/press2018/Executive_ Summary_WR_Service_Robots_2019.pdf.

Kahn Jr, Peter H., Heather E. Gary, and Solace Shen (2013), "Children's Social Relationships with Current and Near Future Robots," *Child Development Perspectives*, 7 (1), 32–37.

Kiefe, Catarina I., Ellen Funkhouser, Mona N. Fouad, and Daniel S. May (1998), "Chronic Disease as a Barrier to Breast and Cervical Cancer Screening," *Journal of General Internal Medicine*, 13 (6), 357–365.

Kim, Seo Young, Bernd H. Schmitt, and Nadia M. Thalmann (2019), "Eliza in the Uncanny Valley: Anthropomorphizing Consumer Robots Increases their Perceived Warmth but Decreases Liking," *Marketing Letters*, 30 (1), 1–12.

Longoni, Chiara, Andrea Bonezzi, and Carey K. Morewedge (2019), "Resistance to Medical Artificial Intelligence," *Journal of Consumer Research*, 46 (4), 629–650.

Lund-Nielsen, Betina, Julie Midtgaard, Mikael Rørth, Finn Gottrup, and Lis Adamsen (2011), "An Avalanche of Ignoring–A Qualitative Study of Health Care Avoidance in Women with Malignant Breast Cancer Wounds," *Cancer Nursing*, 34 (4), 277–285.

Mende, Martin, Maura L. Scott, Jenny van Doorn, Dhruv Grewal, and Ilana Shanks (2019), "Service Robots Rising: How Humanoid Robots Influence Service Experiences and Elicit Compensatory Consumer Responses," *Journal of Marketing Research*, 56 (4), 535–556.

Miller, Rowland S. and Mark R. Leary (1992), "Social Sources and Interactive Functions of Emotion: The Case of Embarrassment," in M. S. Clark (Ed.), *Review of personality and social psychology*, Vol. 14. *Emotion and social behavior* (p. 202–221). Sage Publications, Inc.

Miller, Rowland S. (1995), "On the Nature of Embarrassability: Shyness, Social Evaluation, and Social Skill," *Journal of Personality*, 63 (2), 315–339.

Moore, Sarah G., Darren W. Dahl, Gerald J. Gorn, and Charles B. Weinberg (2006), "Coping with Condom Embarrassment," *Psychology, Health & Medicine*, 11 (1), 70–79.

Moreau, C. Page, Donald R. Lehmann, and Arthur B. Markman (2001), "Entrenched Knowledge Structures and Consumer Response to New Products," *Journal of Marketing Research*, 38 (1), 14–29.

Mori, Masahiro, Karl F. MacDorman, and Norri Kageki (2012), "The Uncanny Valley [From the Field]," *IEEE Robotics & Automation Magazine*, 19 (2), 98–100.

Mukherjee, Ashesh and Wayne D. Hoyer (2001), "The Effect of Novel Attributes on Product Evaluation," *Journal of Consumer Research*, 28 (3), 462–472.

Rai, Arun (2020), "Explainable AI: From Black Box to Glass Box," *Journal of the Academy of Marketing Science*, 48 (1), 137–141.

Reed II, Americus, Mark R. Forehand, Stefano Puntoni, and Luk Warlop (2012), "Identity-Based Consumer Behavior," *International Journal of Research in Marketing*, 29 (4), 310–321.

Rijsdijk, Serge A. and Erik Jan Hultink (2009), "How Today's Consumers Perceive Tomorrow's Smart Products," *Journal of Product Innovation Management*, 26 (1), 24–42.

Rubin, Charles T. (2003), "Artificial Intelligence and Human Nature," *The New Atlantis*, (1), 88–100.

Samsung (2018). "'All In' on AI, Part 3: The Family Hub Recognizes You and Provides a Personalized Diet," https://news.samsung.com/global/all-in-on-ai-part-3-the-family-hub-recognizes-you-and-provides-a-personalized-diet.

Servion Global Solutions (2018), "What Makes Emerging Technologies the Future of Customer Experience?" https://servion.com/blog/what-emerging-technologies-future-customer-experience/.

Tian, Kelly Tepper and Karyn McKenzie (2001), "The Long-Term Predictive Validity of the Consumers' Need for Uniqueness Scale," *Journal of Consumer Psychology*, 10 (3), 171–193.

Turing, Alan M. (1950/2009), "Computing Machinery and Intelligence," in *Parsing the Turing Test*, pp. 23-65. Springer, Dordrecht.

Van Doorn, Jenny, Martin Mende, Stephanie M. Noble, John Hulland, Amy L. Ostrom, Dhruv Grewal, and J. Andrew Petersen (2017), "Domo Arigato Mr. Roboto: Emergence of Automated Social Presence in Organizational Frontlines and Customers' Service Experiences," *Journal of Service Research*, 20 (1), 43–58.

Whitton, Rian (2018), "Whiz Robot from SoftBank Arrives as Pepper Renewals Lag," *The Robot Report*, https://www.therobotreport.com/renewals-softbank-pepper-robot-lag/.

Might I Recommend This Session? Insights on the Effectiveness of Modern Persuasion Agents

Chairs: Jennifer D'Angelo, Texas Christian University, USA
Francesca Valsesia, University of Washington, USA

Paper #1: Slanguage & Cultural Value: It's Lit to Say It - How Mainstream Slang Affect Online WOM

Shaheer Ahmed Rizvi, University of Alberta, Canada
Sarah G Moore, University of Alberta, Canada
Paul Richard Messinger, University of Alberta, Canada

Paper #2: You Should Try It With This: Recommending Compatible Items Increases Perceptions of Expertise and Persuasiveness

Jennifer D'Angelo, Texas Christian University, USA
Francesca Valsesia, University of Washington, USA

Paper #3: Influencer Effectiveness: Contexts and Boundaries

Jared Joseph Watson, New York University, USA
Lauren Grewal, Dartmouth College, USA
Shoshana Segal, New York University, USA

Paper #4: You Didn't Take My (Uncertain) Advice? Examining the Effects of Confidence and Recommendation Outcomes on Recommender Preferences

Matthew James Hall, Oregon State University, USA
Jamie D. Hyodo, University of Nebraska-Lincoln, USA
Kirk Kristofferson, Ivey Business School, Canada

SESSION OVERVIEW

Technological advancements and new societal trends have affected the way in which consumers engage with companies and with each other, as well as who consumers turn to when seeking information about products and services. These changes have posed new challenges for marketers who need to adapt to novel means of reaching, engaging, and ultimately persuading consumers—oftentimes foregoing direct communication in favor of enlisting social media influencers or leveraging online WOM communication. This special session addresses important theoretical and substantive questions surrounding the effectiveness of modern influencers and persuasion agents. In particular, this session addresses *how* the effectiveness of a persuasion agent is conditional on the language used (paper 1) and the use of expertise cues (paper 2), *who* the most effective agents of persuasion are (paper 3), and *what* happens if these agents fail to be persuasive (paper 4).

Rizvi, **Moore**, and **Messinger** study the persuasive effectiveness of using slang in digitally-mediated WOM exchanges. Across four studies, they find the use of mainstream slang (but not subcultural or unknown slang) improves a persuasion agent's effectiveness. In particular, relative to non-slang equivalents (e.g., great), the cultural value carried by slang terms (e.g., lit) elicits more favorable consumer responses in terms of how they evaluate WOM messages and the products promoted in these messages.

D'Angelo and **Valsesia** identify a novel cue persuasion agents can use to increase their perceptions of expertise and ultimately their persuasiveness. Across four studies, they find individuals who use combinatory mentions (talk of how products go well together) are perceived as domain experts. For this reason, consumers form a more positive attitude toward the products endorsed by these individuals.

Watson, **Grewal**, and **Segal** investigate why social media influencers are effective and compare the effectiveness of influencer- vs. brand-communicated messages. Across three studies, they identify the entertainment-value of influencers to be of utmost importance to consumers. Moreover, they find the effectiveness of influencer-communicated (vs. brand-) messages is reduced when the persuasive intent of the message is made salient and consumers' persuasion knowledge is activated.

Finally, **Hall**, **Hyodo**, and **Kristofferson** explore the consequences of persuasion agents' failed persuasion attempts. Across five studies, they demonstrate that recommenders reduce future choice away from their recommended product if their advice is not followed (unfulfilled recommendation). This switching occurs when persuasion agents make a recommendation with less-than-full confidence, leading them to use others' choices to make inferences about the product they recommended.

All papers are at an advanced stage of completion with multiple studies completed. Taken together, they shed light on the effectiveness of persuasion agents and on novel tactics that leverage the changing landscape in communication and technology. We expect this session to be of interest to researchers studying persuasion and social influence, as well as those interested in the impact of new technology on consumer behavior.

Slanguage & Cultural Value: It's Lit to Say It - How Mainstream Slang Affect Online WOM

EXTENDED ABSTRACT

In digitally-mediated exchanges, language is the sole basis of communication (Danet & Herring, 2007). Accordingly, prior research has studied how consumers are influenced by nuances in word choice in online word-of-mouth (WOM; e.g., Moore 2015). Despite their ubiquity (Zazulak 2016), slang terms have received little attention in this context. Yet up to 25% of tweets contain slang (Kundi, Ahmad, Khan, and Asghar 2014), and slang is common on other social media platforms (Facebook, Instagram) and online settings (Yelp), where consumers engage in WOM by recommending, evaluating, and discussing products and brands: "This got an #epic feel to it. #lit #EminemKamikaze"; "These new Jordans are lit af!"

Slang is an informal type of speech that is ephemeral and dynamic (Gleason 1961), and it can infuse all parts of speech with rich connotations: nouns (beast), adjectives (on fleek), verbs (trending), acronyms (yolo), and abbreviations (bae; Ayto and Simpson 2010). While most extant research examines group dynamics related to slang use (Eble 2012), we focus on broadly popular slang terms that are not restricted to specific groups. Specifically, we explore slang terms that emerge, gain mainstream popularity, and are used over the internet (Kundi et al. 2014). We propose that using mainstream slang improves the effectiveness of online WOM.

Specifically, we argue that slang terms have a unique ability to influence consumers through the cultural value imbued in them. We introduce the *cultural value* model to explain how slang affects consumers. Building on McCracken's (1986) model of meaning transfer, we theorize that slang terms are specialized words that users have encoded with value and meaning. Thus, internet users' collective (and tacit) agreement to regard certain informal words as valuable results in the social construction of culturally valuable verbal artifacts, in the form of slang terms. These slang words are similar to other cultural artifacts which hold special value in the marketplace, due to broad

agreement about their status (e.g., fashion, brands; Bikhchandani, Hirshleifer, and Welch 1992; Tsai 2005). Because of this cultural value, we predict that, relative to equivalent non-slang terms, slang terms used in online WOM will elicit more favorable responses from consumers in terms of how they evaluate the WOM message and the product. Furthermore, we expect that these effects will be mediated by perceived cultural value. Below, we report four experiments that test these hypotheses.

Study 1 examined the basic effect of slang on consumers. We recruited 158 North American undergraduates to participate in a single factor, 2-level (Slang: present vs. control) between-subjects design. The study introduced participants to a fictional brand of sneakers. They then read an online review which described the sneakers using either a slang word (fire) or a control word (trendy). Next, participants rated the review (was it well written, clearly understood), and the product (willingness to buy, product performance).One-way ANOVAs revealed significant effects of slang versus control for the review (M_{fire} = 5.58, M_{trendy} = 4.87; p = .02) and the product (M_{fire} = 5.72, M_{trendy} = 4.99; p = .006), providing preliminary evidence for the proposed effect.

Study 2 (N = 125 undergraduates) replicated and extended study 1 by examining various slang words that we hypothesized would vary in cultural value. We tested five words in descending order of cultural value: a currently popular slang term (lit), an equivalent non-slang adjective (great), a generic older slang term (cool), an emerging unknown slang term (blinding), and a made-up slang term (antipel). The procedure and measures were similar to study 1. The results revealed that the popular slang term outperformed the other conditions in review (M_{lit} = 5.04, M_{great} = 4.32, M_{cool} = 3.97, $M_{blinding}$ = 3.30, $M_{antipel}$ = 3.04; p < .001) and product evaluations (M_{lit} = 4.12, M_{great} = 3.80, M_{cool} = 3.60, $M_{blinding}$ = 3.92, $M_{antipel}$ = 3.60; p = .037).

Prior work has established that slang terms often originate in groups, and are intimately linked with group language (Eble 2012). We argue that slang can transcend its group status and attain mainstream appeal in the form of cultural value. However, since the identity of the review writer was not specified in previous studies, our effects may have been due to inferences of shared group membership (i.e., similarity) between the reader and the writer (Naylor, Lamberton, and Norton 2011). To address this issue, we manipulated sender identity in study 3 (N = 243 undergraduates), using a 2 (Slang: current [lit] vs. unknown [blinding]) x 2 (Sender: in-group vs. out-group) between-subjects design. Participants read a product review about a sweater and then completed measures similar to those in previous studies. The results revealed only a positive main effect of slang (M_{lit} = 3.78, $M_{blinding}$ = 3.18; p < .001). The main effect of sender identity and the interaction were insignificant, ruling out group membership as an alternative explanation.

Study 4 (N = 80 undergraduates) examined the proposed underlying process by measuring perceived cultural value. The study compared popular slang with outdated slang (i.e., previously cherished words that are no longer afforded cultural value). It was a single factor, 2-level (Slang: popular [dope] vs. outdated [gnarly]) between-subjects design, and used similar procedures and measures as before. Additionally, prior to measuring evaluations, we measured cultural value (2 items, e.g., "Would you consider the choice of words as culturally valued [cool]?"). The results showed that popular slang performed better than outdated slang (M_{dope} = 3.84, M_{gnarly} = 2.97; p < .001) and that cultural value mediated this effect ($CI_{95\%}$: -0.65, -0.03).

This research contributes to the literatures on slang and WOM. It extends our understanding of how mainstream slang affects consumers' product perceptions via cultural value; this renders slang a more effective communication tool than common vernacular. Fur-

thermore, this research speaks to theories of group membership and slang by demonstrating that mainstream slang functions differently from group/subcultural slang. Mainstream slang terms do not rely on shared group identity; rather, they benefit from their culturally-valued, popular appeal. Practically, this work suggests that employing culturally valued slang can enhance message effectiveness, a finding applicable to both consumers and firms.

You Should Try It With This: Recommending Compatible Items Increases Perceptions of Expertise and Persuasiveness

EXTENDED ABSTRACT

Decades of research on social influence suggest that some individuals can disproportionally sway the preferences and actions of others (Katz and Lazarsfeld 1955; Merton 1968). Generally, individuals who are perceived as experts tend to be more influential, as consumers are more likely to be persuaded by experts' recommendations (Alba and Hutchinson 1987; Gershoff, Broniarczyk, and West 2001).

In recent years, retailers, particularly those based online, have made significant investments in hiring individuals (e.g., stylists, designers, nutritionists) to consult consumers in what to purchase across a breadth of product domains (Bobb 2019; Gorin 2018; Howland 2018). To what extent do consumers perceive these individuals as experts? Perceived expertise can depend on many factors, including the individual's appearance and choices (Bellezza, Gino, and Keinan 2014; Sela et al. 2019). We suggest another signal of expertise is through the offering of opinions about compatibility among products (*combinatory mentions*).

Why might combinatory mentions signal expertise? Typically, complementary products are paired together *by the company* (Tellis 1986; Karataş and Gürhan-Canli 2020), alluding to the notion that lay consumers may lack knowledge of which products are compatible. Indeed, consumers often experience difficulty assessing the outcome of products that are combined or used together (Petre, Sharp, and Johnson 2006). A more nuanced understanding of product attributes and how they are related develops as expertise in a domain grows (Alba and Hutchinson 1987). Hence, if an individual not only understands the attributes of individual products, but also whether these attributes are compatible, consumers might view this individual as having expertise in the product domain. In sum, we suggest that an individual's mere mention of two or more products as compatible (i.e., go well together) can bolster perceptions that the individual is an expert within a product domain, subsequently increasing consumers' attitudes toward the products recommended by that individual. Four studies test our predictions, address an alternative explanation, and provide external validity for our findings.

Study 1 tests whether *combinatory mentions* improve attitudes toward recommended products. Undergraduate participants (N=257) were randomly assigned to one of two combinatory mention conditions (explicit vs. non-explicit). Participants received a subscription box modeled after the real company SpiceBar. A note from SpiceBar's chef detailed the contents of the box: one focal "spice of the month" and three other spices. The chef recommended the same spices across conditions, but in the high (vs. low) condition, the chef highlighted the compatibility among the spices. Participants then rated 1) their attitude toward the focal spice and 2) their collective attitude toward the other three spices (1=not at all positive; 9=very positive).

The focal spice was rated more positively in the explicit (vs. non-explicit) condition ($M_{explicit}$=6.47 vs. $M_{non-explicit}$=5.66; $F_{(1, 255)}$=15.21, p<.001), as were the other three spices ($M_{explicit}$=6.02

vs. $M_{non-explicit}$=5.23; F(1, 255)=13.27, p<.001). Participants then entered to actually win a subscription to either SpiceBar or another box. More participants in the explicit (vs. non-explicit) condition entered to win the SpiceBar subscription (42% vs. 29%; Wald χ2=4.67, p<.04).

Study 2 tests whether consumers' improved attitudes are driven by increased perceptions of expertise. MTurk participants (N=266) imagined shopping at a furniture store and overhearing an individual (i.e., the recommender) discuss dining chairs with a friend. In the *combinatory* [substitutable] condition, the recommender said the Logan chairs would *go really well mixed in with* [be a really good alternative to] the Bacci chairs. Participants then rated their attitude toward the Bacci chair (1=not at all positive; 9=very positive) and perceived interior design expertise of the recommender (1=not at all, 9=very much).

In the combinatory (vs. substitutable) condition, the Bacci chair was rated more positively ($M_{combinatory}$=6.90 vs. $M_{substitutable}$=6.42; $F(1, 264)$=5.36, p<.03) and the recommender was perceived as having greater expertise ($M_{combinatory}$=7.06 vs. $M_{substitutable}$=6.68; $F(1, 264)$=3.58, p=.06). Mediation analysis revealed the effect of the recommenders' mention on attitudes was driven by perceived expertise ($b_{indirect}$=.18, SE=.10, CI$_{95\%}$: .0058, .3947).

An alternative explanation for our findings may be that mentioning products are compatible implies versatility (i.e., the product could have many uses). Study 3 addresses this alternative explanation. If consumers' attitudes are driven by versatility, a recommender who established expertise by providing a combinatory mention should *not* improve consumers' attitudes toward *other* subsequently recommended products where compatibility is not mentioned. MTurk participants (N=500) read three Instagram posts from a food influencer. In each post, the influencer in the *combinatory* [control] combinatory mention condition recommended a food item *and mentioned* [but did not mention] a compatible food item. Participants rated the influencer's food expertise (1=not at all, 9=very much). Next, all participants viewed the influencer's fourth post which recommended a food product with no mention of a combatable item. Participants then rated their attitude toward this product (1=not at all positive; 9=very positive).

In the combinatory (vs. control) condition, the influencer was perceived as more expert ($M_{combinatory}$=7.26 vs. $M_{control}$=6.01; $F(1, 498)$=65.15, p<.001); the food product was also rated more positively ($M_{combinatory}$=6.37 vs. $M_{control}$=5.96; $F(1, 498)$=7.42, p<.007). Importantly, the effect of combinatory mention on attitudes toward the food product was driven by perceived expertise of the influencer ($b_{indirect}$=.73, SE=.10, CI$_{95\%}$[.5399, .9383]).

Study 4 provides external validity for our findings using a Facebook split-ad field study. We ran advertisements for a skincare website where website users provide skincare advice. In the explicit combinatory mention ad, the ad quoted and depicted a skincare advice giver's recommendation for which products go well together in a skincare routine. In the non-explicit condition, the ad quoted and depicted the same product recommendations from a skincare advice giver without explicitly stating that the products went well together. A logistic regression predicting click-through rate revealed that the explicit combinatory ad lead to significantly more clicks (1.52%) than the non-explicit ad (CTR=1.26%; Wald χ²=9.92, p<.002). Among those who clicked on the ad to visit the skincare website, membership sign-up rates were greater among those who arrived via the explicit combinatory ad (7.12%) relative to the non-explicit ad (4.51%; Wald χ2=3.24, p=.07).

Influencer Effectiveness: Contexts and Boundaries

EXTENDED ABSTRACT

With the proliferation of social media, influencers are more important than ever. Brands now spend over one billion dollars annually on influencer marketing, where micro-influencers are thought to be 6.7 times more cost efficient in generating engagement relative to their celebrity counterparts (Pierucci 2018). While brands have traditionally employed a broadcasting strategy (e.g., national commercials or print ads), they can now employ easily employ a narrowcasting strategy by selecting specific influencers to reach more homogenous populations. This begs the following questions: "why do consumers listen to social media influencers?" and "when should brands outsource their messaging vs. sending the message directly to consumers?"

While the effectiveness of celebrity endorsers has been widely researched (for a review, see: Erdogan 1999), this literature can't fully explain the effectiveness of social media influencers today. In addition to credibility and liking (Friedman and Friedman 1979), we posit that the desire for a parasocial relationship (Rubin and McHugh 1987) plays a role with consumers today. Whereas influencers may have traditionally existed through standard advertisements, consumers now seek out and "follow" influencers, whose marketing may seem more like an authentic message between friends than an advertisement. Thus, a consumer's persuasion knowledge (Friestad and Wright 1994) might not be activated in the same fashion that it is with traditional advertisements. Promoting too many brands can decrease an influencer's effectiveness (Mowen and Brown 1981; Tripp, Jensen, and Carlson 1994), but there are likely to be many other ways by which influencer effectiveness is moderated.

In this research, our goal is first to understand the attributes that characterize effective influencers. Then, we aim to determine the boundaries of said influencer effectiveness. In doing so, we aim to contribute to both theory and practice regarding this emerging marketing trend. In study 1, we survey participants to identify the manifest attributes of effective influencers, in general. Study 2 then asks participants to identify an influencer they follow and evaluate the influencer on the same attributes. Finally, in study 3, we investigate the relative effectiveness of a marketing message when it comes from the brand vs. an influencer to determine the relative value of employing an influencer. Due to space constraints, we will only highlight select findings.

Study 1 asked participants "what characteristics of influencers are important to you" then featured a battery of 14 items on a 5-point scale. A factor analysis yielded a 3-factor solution with the measures of *message value* (8 items; α = .907; e.g., "inspiring" or "helpful"), *entertainment value* (2 items; r = .622; i.e., "entertaining" and "funny"), and *physical value* (4 items; α = .741; e.g., "attractive" or "similar"). Relative to physical value (M = 2.45), paired t-tests indicated that consumers placed more importance on message value (M = 3.49; t(106) = 11.453; p < .001) and entertainment value (M = 3.59; t(106) = 10.602; p < .001). There was no difference in the perceived importance of message value and entertainment value (t(106) = -.944; p = .347).

Study 2 followed the same paradigm as study 1 with a few exceptions. We used fewer items (six) and elicited responses on a 7-point scale. And importantly, in this study, we first asked participants to indicate an influencer that they currently follow on Instagram, and thus, asked them to what extent each attribute described their influencer rather than the importance of that attribute. In doing so, we wanted to assess whether the responses in study 1 were reflective of perceptions of influencers that consumers already follow.

Paired samples t-test indicated that this was not the case. Relative to physical value (M = 5.04), paired t-tests indicated that consumers placed less importance on message value (M = 4.12; t(79) = -3.386; p = .001), while there was no difference with entertainment value (M = 5.25; t(79) = .946; p = .347). Naturally, entertainment value was also more descriptive of their recalled influencer relative to message value (t(79) = -5.163; p < .001). Taken together, these studies suggest that entertainment value seems to be of utmost importance while consumers might oversell the importance of message value and undersell the importance of physical value.

Having established why consumers might follow influencers. We now seek to understand the context-dependent value of influencers relative to brands. Study 3 adopts a 2x2 design in which frame the social media post as coming from the brand or an influencer, and whether a promotion code is absent or present. Our theorizing would suggest that consumers generally prefer marketing messages from influencers vs. brands due to the activated persuasion knowledge in the presence of a brand's marketing attempt, but the presence of a promotion code leads consumers to identify the influencer's message as a marketing message, activating persuasion knowledge, and lowering their effectiveness. After viewing the post, we measured Blue Apron purchase intentions (3 items; α = .867). A 2x2 ANOVA on purchase intentions yielded a significant interaction (F(1,403) = 10.757; p = .039). Neither main effect was significant (p's > .10). Planned contrasts demonstrate that in the absence of a promotion, whether the brand or an influencer posts the content does not significant impact intentions (M_{brand} = 4.09; $M_{influencer}$ = 4.30; F(1,403) = .869; p > .35). However, the presence of a promotion led to a significant decline for influencers (M_{brand} = 4.32; $M_{influencer}$ = 3.88; F(1,403) = 4.025; p = .045), suggesting the promotion made salient an ulterior motive and undermined the influencer's credibility.

Taken together, these studies begin to address the questions of "why do we follow influencers" and "what are the boundaries of their influence?" In subsequent studies, we plan to investigate the discrepancies between studies 1 and 2 by further exploring the role of an existing parasocial relationship with an influencer and creating a taxonomy of message characteristics (e.g., promo codes, behind-the-scenes content, etc.) that are better suited to come from the brand or the influencer.

You Didn't Take My (Uncertain) Advice? Examining the Effects of Confidence and Recommendation Outcomes on Recommender Preferences

EXTENDED ABSTRACT

Although limited, research considering how providing word-of-mouth influences the *sharer* often assumes that, i) those who recommend do so with initially-high confidence, ii) others will (and do) take the recommender's advice, and iii) recommending entrenches product-related attitudes. However, by incorporating the bidirectional nature of the recommendation environment, we challenge these assumptions and demonstrate that consumers who recommend a product can and do *reduce* future preference for that product when their recommendation is not followed (unfulfilled recommendation).

Research shows that confidence indeed predicts WOM engagement (Brown 2005). However, because recommendations are frequently solicited and provided in social settings, consumers often recommend with less-than-full confidence to fulfill perceived social obligations (Lui and Gal 2011) or avoid appearing unknowledgeable (Berger 2014). Confirming this assumption, a pilot study revealed that 77.9% of participants (n=103) had made a recommendation when they were unsure whether the other consumer would like their recommended product.

Given recommendations are being provided with less-than-full confidence, low-confidence recommenders may be prone to preference- or choice-influence based on recommendation feedback. The rise of social media as a recommendation platform, along with increased sharing of consumption choices, increases the likelihood recommenders will discover whether their recommendations are fulfilled/unfulfilled (Duan and Dholokia 2017). We propose those recommending with less-than-full confidence, despite publicly committing to the recommended product, will shift future product choice *away* from their recommended option when their recommendation is not fulfilled. We propose this will occur because low-confidence consumers perceive others' divergent choices as indicative of differing objective quality (Spiller and Belogolova 2013), thus inferring the unpurchased (recommended) product is of lower quality. Thus, we predict the interaction between recommendation fulfillment and confidence will be mediated by perceived product quality.

In Study 1a, undergraduates (n=91) tested three pens and selected their favorite. Next, they individually interacted with a trained confederate who had information about the pens but did not test them. During the scripted interaction, the confederate solicited a recommendation on which pen to select, and the participant provided his/her recommendation. After the recommendation, the confederate indicated she planned to select the recommended pen (fulfilled) or an alternative (unfulfilled). Participants returned to the lab and selected a pen to keep. Participants were more likely to shift preference when their recommendation was unfulfilled (36.5%), relative to fulfilled (5.9%; χ^2_{Wald}=9.88, p=.002).

In Study 1b, participants (n=301) read a scenario about recommending a bottle of wine to a wine-savvy friend, who either did or did not fulfill the recommendation. We also included a control condition in which participants did not learn the recommendation outcome. Again, those whose recommendations were unfulfilled reported lower intentions to repurchase the recommended wine (M=4.93; 7-point scale), relative to those in the fulfilled (M=5.57; F(1,286)=13.47, p<.001) and control (M=5.46;F(1,286)=9.26, p=.003) conditions.

In Study 2a, participants (n=326) completed a 2(fulfilled/unfulfilled recommendation) x 2(high/low confidence) study in which they read about recommending a bottle of wine to a friend. Confidence was manipulated via recommendee wine knowledge (Constant et al. 1994). A 2x2 ANOVA with product intentions as the dependent variable revealed the predicted interaction (F(1,322)=3.94, p=.048). Unfulfilled recommendations negatively affected future purchase intentions when confidence was low ($M_{Fulfilled}$=5.78, $M_{Unfulfilled}$=5.08;F(1,322)=8.23, p=.004), but not high ($M_{Fulfilled}$=5.40, $M_{Unfulfilled}$=5.39;F(1,322)=.005, p=.942). Perceived product quality mediated the interaction (CI_{95}:[.089,.680]).

Study 2b tested the moderating role of the presence of third parties' divergent/convergent recommendations. We propose recommendation confidence will be *enhanced* when supporting recommendations from others are present, thus attenuating our effect. Undergraduates (n=127) were assigned to one of three conditions (recommendation context: alone/converging/diverging) in which they recommended a restaurant to a friend on Facebook (stimuli presented as mock Facebook *Recommendation* posts). In the alone condition, the participant provided the only recommendation. In the diverging condition, another friend also responded, but recommended a different restaurant. In the supporting condition, one friend recommended the same restaurant as the participant, while two others recommended an alternative. All participant recommendations were unfulfilled. An ANOVA revealed a significant effect of recom-

mendation context on product intentions ($F(1,124)=3.71$, $p=.027$). Consistent with our framework, unfulfilled recommendations reduced future support of participants' recommended product in the lone/divergent conditions ($M=5.23$) compared to when a convergent recommendation was present ($M=5.65$; $F(1,124)=6.23$, $p=.014$). No differences emerged between the lone and divergent conditions ($M_{Lone}=5.13$, $M_{Divergent}=5.33$, $p=.275$). Importantly, the focal contrast was again mediated by perceived product quality ($CI_{95}=[.049,.446]$).

Others' choices are seen as more diagnostic when product quality is perceived to be objective (vertical differentiation; Spiller and Belogolova 2016). Alternatively, when products are differentiated on more taste-based dimensions (horizontal differentiation), divergent choices can be attributed to idiosyncratic preferences. Thus, we predict our focal effect will be attenuated when the product is perceived as horizontally (vs. vertically) differentiated. Study 3 employed the same design as Study 1a (confederate interaction) with one difference—manipulation of differentiation prior to participants' initial choice. The vertical condition stated the pens were made with materials of varying quality, resulting in some pens being objectively better than others—participants were asked to select the *best* pen. The horizontal condition stated the pens were made with materials of similar quality, meaning observed differences resulted from differing preferences—they were asked to select their *preferred* pen (Spiller and Belogolova 2013). Undergraduates (n=163) tested the pens and recommended their choice to a confederate, who then did/did not fulfill the recommendation. We planned to conduct a logistic regression, but low switching rates in three conditions rendered this inappropriate (Cox 1970). As such, to directly test our predictions, we used simple contrasts to compare mean switching rates in the vertical/unfulfilled condition versus the three other cells (Buckless and Ravenscroft 1990). As expected, those in the unfulfilled/vertical condition changed their choice *away* from their recommended option more often (10 of 40; $M=25.00\%$) than participants in the other three conditions (6 of 123; $M=4.88\%$; $F(1,161)=14.89$, $p<.001$). All simple effect comparisons were also significant.

By integrating the bidirectional nature of solicited recommendations and focusing on the consumption consequences of WOM sharers, this research challenges prior assumptions of WOM research to demonstrate possible deleterious effects of recommendation outcomes on subsequent recommender choice. We further demonstrate the crucial role that confidence and product differentiation play in this understudied aspect of WOM behavior.

REFERENCES

Alba, J. W., & Hutchinson, J. W. (1987), Dimensions of consumer expertise, *Journal of Consumer Research*, *13*(4), 411-454.

Ayto, John, and John Simpson (2010), *Oxford dictionary of modern slang*. Oxford University Press.

Bellezza, S., Gino, F., & Keinan, A. (2014), The red sneakers effect: Inferring status and competence from signals of nonconformity, *Journal of Consumer Research*, *41*(1), 35-54.

Berger, Jonah (2014), Word of mouth and interpersonal communication: A review and directions for future research, *Journal of Consumer Psychology, 24*(4), 586-607.

Bikhchandani, Sushil, David Hirshleifer, and Ivo Welch (1992), A theory of fads, fashion, custom, and cultural change as informational cascades, *Journal of Political Economy*, *100*(5), 992-1026.

Bobb, Brooke (2019), Amazon fashion launches a personal styling service—will customers actually use it?, *Vogue*, Retrieved January 22, 2020 from https://www.vogue.com/article/amazon-prime-personal-shopper.

Brown, Tom J., Thomas E. Barry, Peter A. Dacin, and Richard F. Gunst (2005), Spreading the word: investigating antecedents of consumers' positive word-of-mouth intentions and behaviors in a retailing context, *Journal of the Academy of Marketing Science, 33*(2), 123-138.

Buckless, Frank A., and Sue Pickard Ravenscroft (1990), Contrast coding: A refinement of ANOVA in behavioral analysis, *Accounting Review*, 933-945.

Constant, David, Sara Kiesler, and Lee Sproull (1994), What's mine is ours, or is it? a study of attitudes about information sharing, *Information Systems Research*, *5*(4), 400-421.

Danet, Brenda, and Susan C. Herring (2007), *The multilingual Internet: Language, culture, and communication online*, Oxford University Press on Demand.

Duan, Jingye, and Dora R. Dholokia (2017), Posting purchases on social media increases happiness: The mediating roles of purchases' impact on self and interpersonal relationships, *Journal of Consumer Marketing, 34*(5), 404-413.

Eble, Connie (2012), *Slang and sociability: In-group language among college students.* Chapel Hill, NC: University of North Carolina Press.

Erdogan, B. Z. (1999), Celebrity endorsement: A literature review, *Journal of Marketing Management*, *15*(4), 291-314.

Friedman, H. H., and Friedman, L. (1979), Endorser effectiveness by product type, *Journal of Advertising Research*, *19*(5), 63–71.

Friestad, M., and Wright, P. (1994), The persuasion knowledge model: How people cope with persuasion attempts, *Journal of Consumer Research*, *21*(1), 1-31.

Gleason Jr, Henry A. (1961), *An Introduction to Descriptive Linguistics (Revised Edition).*

Gorin, Amy (2018), The Rise of the Supermarket Nutritionist, *Food Network*. Retrieved February 15, 2020 from https://www.foodnetwork.com/healthyeats/news/2018/supermarket-rds.

Howland, Daphne (2018), Wayfair draws up interior design services, *Retail Dive*. Retrieved February 15, 2020 from https://www.retaildive.com/news/wayfair-draws-up-interior-design-services/530237/.

Karataş, Mustafa, and Zeynep Gürhan-Canli (2020), When Consumers Prefer Bundles with Noncomplementary Items to Bundles with Complementary Items: The Role of Mindset Abstraction, *Journal of Consumer Psychology*, *30*(1), 24-39.

Katz, Elihu and Paul F. Lazarsfeld (1955), *Personal influence*. Glencoe, Ill: The FreePress

Kundi, Fazal Masud, Shakeel Ahmad, Aurangzeb Khan, and Muhammad Zubair Asghar (2014), Detection and scoring of internet slangs for sentiment analysis using SentiWordNet, *Life Science Journal*, *11*(9), 66-72.

Liu, Wendy, and David Gal (2011), Bringing Us Together or Driving Us Apart: The Effect of Soliciting Consumer Input on Consumers' Propensity to Transact with an Organization, *Journal of Consumer Research, 38*(2), 242-259.

McCracken, Grant (1986), Culture and consumption: A theoretical account of the structure and movement of the cultural meaning of consumer goods, *Journal of Consumer Research*, *13*(1), 71-84.

Merton Robert K. (1968), Patterns of influence: Local and cosmopolitan influentials, in social theory and social structure. ed. Robert K. Merton, New York: Free Press, 441–74

Moore, Sarah G. (2015), Attitude predictability and helpfulness in online reviews: the role of explained actions and reactions, *Journal of Consumer Research*, *42*(1), 30-44.

Mowen, J. C., and Brown, S. W. (1981), on explaining and predicting the effectiveness of celebrity endorsers, *ACR North American Advances*.

Naylor, Rebecca Walker, Cait Poynor Lamberton, and David A. Norton (2011), Seeing ourselves in others: Reviewer ambiguity, egocentric anchoring, and persuasion, *Journal of Marketing Research*, *48*(3), 617-631.

Petre, M., Sharp, H., & Johnson, J. (2006), Complexity through combination: an account of knitwear design, *Design Studies*, *27*(2), 183-222.

Pierucci, S. (2018). Why Micro-Influencer Marketing is Still 'The Game' in 2019, *Medium*, Retrieved February 21, 2020 from https://medium.com/swlh/why-micro-influencer-marketing-is-the-game-in-2018-fdeda0993c36.

Rubin, R. B., and McHugh, M. P. (1987). Development of parasocial interaction relationships.

Spiller, Stephen A., and Lena Belogolova (2016), On consumer beliefs about quality and taste, *Journal of Consumer Research,* *43*(6), 970-991.

Tellis, Gerard J. (1986), Beyond the many faces of price: an integration of pricing strategies, *Journal of Marketing*, *50*(4), 146-160.

Tsai, Shu-pei (2005), Utility, cultural symbolism and emotion: a comprehensive model of brand purchase value, *International Journal of Research in Marketing*, *22*(3), 277-291. York, NY: Holt, Rinehart and Winston.

Tripp, C., Jensen, T. D., & Carlson, L. (1994), The effects of multiple product endorsements by celebrities on consumers' attitudes and intentions, *Journal of Consumer Research*, *20*(4), 535-547.

Zazulak, Steffanie (2016), The rise in popularity of internet slang, Retrieved August 18 2018 from https://www.english.com/blog/english-internet-slang/.

New Learnings in Financial Decision-Making: Influences on How Consumers Use and Obtain Financial Resources

Chair: Wendy J. De La Rosa, Stanford University, USA

Paper #1: The Impact of Payment Frequency on Subjective Wealth Perceptions and Discretionary Spending

Wendy J. De La Rosa, Stanford University, USA
Stephanie M. Tully, Stanford University, USA

Paper #2: Pennies Reframing of Savings Rates

Stephen Shu, City University of London and Digital Nudging Tech, UK
Hal Hershfield, University of California Los Angeles, USA
Shlomo Benartzi, University of California Los Angeles, USA
Richard Mason, Carnegie Mellon University and Voya Financial, USA

Paper #3: How Soon is Now? Present Bias and the Mental Accounting of Time

Oleg Urminsky, University of Chicago, USA
Minkwang Jang, University of Chicago, USA

Paper #4: Fighting Fiscal Awkwardness: The (Dis)Advantages of Digital Payment Methods on Peer-Debt Dynamics

Alexander Park, Washington University in St. Louis, Olin Business School, USA
Cynthia Cryder, Washington University in St. Louis, Olin Business School, USA
Rachel Gershon, University of California San Diego, Rady School of Management, USA

SESSION OVERVIEW

Millions of consumers are struggling financially. According to the Consumer Financial Protection Bureau, 43% of Americans are unable to make ends meet (2017), and nearly 40% cannot cover an unexpected $400 expense (Federal Reserve Board, 2018). Thus, it is of great theoretical and societal importance to understand how consumers make financial decisions. In this session, we take a holistic approach and focus on understanding unique and underexplored factors that impact how consumers use the resources they already have (e.g., spending and saving) and factors that impact how consumers acquire more financial resources (e.g., intertemporal choices and debt collection).

The first two papers focus on factors that impact how consumers use financial resources that they already have: payment frequency and saving frames. In the first paper, De La Rosa and Tully examine the impact of payment frequency on consumers' spending decisions. The authors demonstrate that higher payment frequency increases consumers' perceptions of wealth, which in turn increases their discretionary spending. In the second paper, Shu et al. demonstrate how differing savings frames (save a penny of every dollar of salary vs. save 1% of your salary) impact consumers' perceptions of the affordability of saving. Through a series of experiments, the authors show that pennies framing increases savings rates by making saving seem more affordable.

The last two papers focus on factors that impact how consumers obtain financial resources: budget periods and social ties. In the third paper, Urminsky and Jang demonstrate that consumers' perceptions of their budgeting periods significantly impacts their intertemporal decisions. Consumers choose the smaller, sooner option less often (e.g., become more patient) when the larger, later option is still within (vs. outside of) their perceived budgeting period, which explains

present bias. Finally, in the fourth paper, Park, Cryder, and Gershon demonstrate the impact of relationship closeness on how consumers decide to request debt repayment. Across a series of studies, the authors show that consumers' are more likely to request the payment in person (vs. using a bank enabled app like Venmo) when they perceive the borrower to be a close friend.

Together, these papers enhance our understanding of how consumers decide to use and obtain financial resources. This topical and novel session sheds light on how unique interventions can help impact consumers' financial well-being.

The Impact of Payment Frequency on Subjective Wealth Perceptions and Discretionary Spending

EXTENDED ABSTRACT

An increasingly popular trend is for consumers to get paid more often, resulting in more frequent, yet smaller paychecks. For example, beyond day laborers and tipped employees, Uber drivers, and even Wal-Mart cashiers can now get paid on a daily basis. However, surprisingly little is known about whether and how payment frequency impacts consumer behavior. Higher payment frequency has been shown to help consumers spread out their consumption throughout a period (e.g., Parsons and Van Wesep 2013; Stephens and Unayama 2011). However, in the current work, we explore other potential consequences of payment frequency: consumers' wealth perceptions and their discretionary spending.

If consumers focused only on the smaller number on their paycheck, it could lead consumers to have lower wealth perceptions (Morewedge, Holtzman, and Epley 2007). However, we suggest that payment frequency is more likely to be experienced as a series of segregated gains. Past research demonstrates that smaller, more frequent segregated gains lead to higher hedonic assessments than a larger, less frequent, aggregated gain because hedonic assessments exhibit diminishing marginal returns (Thaler, 1985). We build on this work and posit that subjective wealth perceptions, like but distinct from hedonic assessments, also exhibit diminishing marginal returns. Thus, more frequent (albeit smaller) paychecks should increase consumers' wealth perceptions. In short, consumers' wealth perceptions are formed not just from consumers' objective wealth (or their objective wealth relative to a benchmark), but also from the timing of their payments. Moreover, we suggest that these increased wealth perceptions also increase consumers' willingness to spend on discretionary purchases.

In Study 1, we analyze the real-world spending behaviors of 27,000 consumers who were customers of a large US banking platform. This data included consumers' income and spending for each day. Using a linear mixed-effects model, our analysis revealed a positive and significant relationship between payment frequency and discretionary spending. Thus, higher payment frequency was associated with more discretionary expenditures ($\beta = 1.35$, $p < .001$), even after controlling for consumers' income (log-transformed).

In Study 2 (N = 405), we created a life simulation where participants earned income, incurred expenses (e.g., rent, utilities, phone bill), and made discretionary spending decisions (e.g., whether to eat out, whether to go to a concert, etc.) to examine the causal impact of payment frequency. We manipulated participants' payment frequency while holding constant the total amount earned. Participants

paid daily (vs. weekly) made more high-cost expenditures (Mdaily=9.47 vs. Mweekly= 8.48, *p*<.001) than those in the weekly condition. Moreover, those in the daily pay condition reported had higher wealth perceptions than those in the weekly pay condition (Mdaily=2.86 vs. Mweekly= 2.24, *p*<.001). These wealth perceptions mediated changes in spending decisions (*ab*=0.27, 95% CI[0.12, 0.46]).

Study 3 was designed to disentangle differences in objective wealth from subjective wealth perceptions. In Study 2, daily pay led to a higher average daily balance than the weekly condition. Hence, in Study 3, we designed the life simulation such that participants in the bi-weekly pay condition had a higher average daily balance than those in the daily pay condition (while maintaining the total amount of income earned the same across conditions). Again, higher payment frequency led to more high-cost decisions than weekly pay (Mdaily=8.01 vs. Mbi-weekly=6.94, *p*<.001; Moreover, this effect was again mediated by participants' wealth perceptions (*ab*=.12, 95% CI[0.01, 0.27]).

We next examined the introduction of a daily pay option by a sizable gig-economy platform. We received earnings and spending data for 752 people working for this platform three months before and three months after the introduction of daily pay through a third-party app, accounting for over 427,000 transactions. Using a linear mixed-effects model, we find that after the introduction of a daily pay option, workers made more discretionary expenditures (β=4.02, *p*=.035) as compared to before the introduction of daily pay.

We demonstrate that consumers' form their wealth perceptions based not just on their objective wealth (or their objective wealth relative to some benchmark) but also from the timing of their pay. Across several pre-registered, controlled lab studies, and two analyses of real consumer spending behavior, the current research demonstrated that higher payment frequency consumers' wealth perceptions and thus, their discretionary spending. Our research suggests that payment frequency impacts not just when consumers spend, but also how much, and calls for future research to understand how other aspects of consumer spending that may be impacted by payment frequency.

Pennies Reframing of Savings Rates

EXTENDED ABSTRACT

The savings crisis in the United States affects a broad swath of workers, and this disproportionately affects those with lower incomes, who may also have lower education levels, numeracy, and financial literacy. For example, one of the most pervasive ways of choosing a savings rate is to identify a percent of salary that one wants to contribute to their retirement account. However, the broader literature indicates that how numerical and financial information is presented affects people's judgments and decisions. Examples include the miles per gallon illusion versus gallons per mile (Larrick & Soll, 2008) where people underestimate the financial benefits of replacing certain cars, and the temporal reframing of recurring savings decisions (Hershfield et al., 2020 forthcoming) where more people participate in recurring savings programs when decisions are framed as saving $5 per day versus $150 per month, despite being essentially the same choice from an economic perspective. In other words, metrics matter. In our stream of research on pennies reframing of savings rates, we hypothesize that eliciting savings rates using percentages may lead to less desirable outcomes for some subpopulations. In a laboratory setting, we explore a novel, savings choice architecture that is essentially not available in the market today by framing savings decisions using pennies per dollar of salary, which avoids uses of percentages. This research stream currently includes three survey-based, experimental studies which focuses on savings decisions which include the joint choice of an initial savings rate and an escalator rate. For example, if a person elects an initial, economically equivalent savings rate of 3% and an escalator rate of 2%, then they will save 3% of their salary this year, 5% of their salary next year, 7% of their salary two years from now, and so forth.

Study 1 (N=200) covers a low, introductory savings choice and may effectively be viewed as a practical boundary case where companies would likely not implement initial savings rates and escalator rates any lower than 1% and 1%. We assess the difference in participants' selections in a between-subject design when faced with 1) an opportunity to either save 1% of salary, increasing by 1% every year thereafter or not save versus 2) an opportunity to either save 1 penny per dollar of salary increasing by 1 penny per dollar of salary every year thereafter or not save. We find evidence that setting rates this low, even for those among the lowest salaries, may be too low as evidenced by ceiling effects in participation rates (β=0.02, p=0.709) and insignificant main effects in perceived affordability (β=0.15, p=0.427), although a spotlight analysis indicates marginally significant simple effects of subjective numeracy on perceived affordability.

Study 2 (N=200) broadens the scope of inquiry by allowing participants to select higher savings rates within a range that effectively spans the range of default rates of a large majority of defined contribution plans. Participants first make a choice to save at an initial savings rate (limited to between 0% to 6% of salary) followed by an escalator rate (limited to between 0% to 3%) in a between-subject design with some seeing pennies versus percent framing. In this study, no differences were detected in the initial savings rate selected (β=0.11, p=0.648), although participants selected significantly higher escalator rates in the pennies condition (β=0.55, p=0.000). Note that a 55-basis point increase, if it were to be realized in the field, would be quite substantial given the benefits of money compounding and that the most common escalator rate in plans with auto-escalation is 1%. Spotlight analysis indicates that subjective numeracy moderates both choice of higher escalator rates and perceptions of affordability. Additionally, both structural equation modeling and Preacher-Hayes mediation analyses indicate perceptions of affordability partially mediating initial savings rates and escalator rate choices.

Study 3 (N=401) broadens the scope of inquiry to include both self-reported and objective psychological measures, the latter using methodologies from Query Theory (Johnson et al., 2007). Furthermore, a limitation of Study 2 was also relaxed in that instead of requiring people to choose an initial savings rate and then an escalator rate (i.e., restricted process flow), participants could freely choose to select and change either rate in any order. In Study 3, we find that people both save at both higher initial savings rates (β=0.50, p=0.004) and escalator rates (β=0.37, p<.001) in the pennies framing. We also find that people subjectively report higher affordability (β=0.41, p<.001) and understandability (β=0.21, p=0.043) with pennies framing. Spotlight analyses indicate that financial literacy moderates savings choices, especially for those with lower financial literacy. Financial literacy also moderates self-reported affordability and understandability. Structural equation modeling also shows evidence for people choosing higher initial savings rates and higher escalators with objective thoughts about affordability mediating choice.

The studies above offer evidence that a small change of eliciting savings choices using pennies versus percent framing can impact people's perceptions of affordability and thus lead people to select higher savings and savings escalator rates. Treatment effects seem to improve the outcomes for those with the lowest numeracy and financial literacy the most. In Study 3, those with the lowest financial

literacy selected initial rates that were more than 2 percentage points higher in the pennies frame (relative to a sample mean of 2.9%), and they also selected escalator rates that were more than 64 basis points higher (relative to a sample mean of 0.82%). Research on the pennies reframing of savings rates is continuing with a survey-based study (N=270) covering a higher income participant pool within a corporation and a field study (N = target of 1,000) covering the real retirement choices of eligible employees across a number of retirement plans (study launched in the field in November 2019 with data expected in June 2020).

How Soon is Now? Present Bias and the Mental Accounting of Time

EXTENDED ABSTRACT

Consumers often face situations where they have to choose between a smaller but immediate outcome and a larger but delayed outcome. Research on intertemporal choice has found that people are often more impatient for temporally proximate decisions (e.g., $40 today vs. $50 in 1 month) than for future decisions (e.g., $40 in 12 months vs. $50 in 13 months), contradicting the standard economic model that dictates constant degree of patience over time (for a review, see Urminsky & Zauberman, 2016). Present bias explains this inconsistency by suggesting that rewards lose more value when delayed from "now" or the present (Loewenstein & Prelec, 1992). However, prior literature has not clearly established what counts as the present.

Some research has shown that people often perceive time as discrete, which can impact their task initiation (Hennecke & Converse, 2017; Tu & Soman, 2014). Relating to financial decisions, how people divide time differently was shown to affect their estimate of future budget (Ülkümen, Thomas, & Morwitz, 2008) and their mental tracking of costs (Soster, Monga, & Bearden, 2010).

In the current research, we build on the notion of discrete perception of time as budget periods to fill in the gap in the literature on intertemporal choice regarding present bias. In seven studies, we demonstrate that people's choices are not consistent with treating now as the current day, and that how people subjectively categorize time into binary periods, as either current or future financial period, can provide a better explanation of preference reversals in intertemporal choice.

In studies 1A and 1B (total N=917), we first tested when present-biased preference reversals emerge. One possible heuristic is to define the current day to be the present and simply any time later to be the future. Under such an assumption, present bias would predict people to demonstrate relatively drastic preference shift toward the larger-later option between a choice "today" (e.g., $30 today or $50 in 1 month) and the same choice any time in the future (e.g., $30 in 1 month or $50 in 2 months), but less so between choices already in the future. Contrary to this prediction, delaying choice by either two weeks or one month by adding a relatively short "front-end delay" (i.e., how much the same choice is delayed into the future), did not result in a significant increase in choices of the larger-later option (ps>.05). Statistically significant differences only emerged when the front-end delay was three months or longer (ps<.01), which suggests people are not simply "today-biased." In an additional study (N=615), we found that the hyperbolic discounting model also cannot fully account for how preferences change with front-end delays.

In study 2 (N=262), we tested if how people think of budget periods can better explain present bias. After making a series of intertemporal choices, participants were asked to categorize different future times as being part of the current or future financial period when thinking about budgeting. This measure allowed us to estimate when the "current" budget period ends and when the "future" period begins for each participant, relative to the date of the survey. First, we observed substantial heterogeneity in the duration of the current budget period, with the modal response (two weeks from today) taking up less than 20% of total responses, consistent with prior research suggesting heterogeneity in people's planning horizons for finances (e.g., Lynch, Netemeyer, Spiller, & Zammit, 2009).

Importantly, our analysis on intertemporal choices showed that people were significantly less likely to choose the larger-later option when the options occurred in different subjective periods, i.e., the smaller-sooner option in their current budget period and the larger-later option in the future period (β=-0.235, p<.001). Whether the sooner option is promised today did not explain present-bias and was a weaker predictor of choice (β=0.02, p=.07), which is further confirmed by model comparison analyses. While participants with more savings had longer current periods, our results did not change after controlling for demographics, including the reported amount of savings. In an additional study, we replicated the same finding using longer delays (N=289).

Next, we further replicated our findings in more specific budgeting and consumption contexts. In study 3 (N =234), we asked participants to make a series of intertemporal choices with outcomes earmarked to specific consumer budget categories (i.e., credits for grocery shopping or credits for utility payment). We then again asked participants about their budget period specifically for the corresponding spending categories. On average, those who answered about utility payments reported having longer current budget periods than those who answered about grocery shopping (p<.001). Replicating the prior results again, we found that people were more impatient when the smaller-sooner and larger-later credits were promised in different budgeting periods for the given spending category (β=-0.07, p<.001), and relatively insensitive to whether one of the options can be received "today" or not (β=0.009, p>.05). We found no significant differences in these effects between the contexts.

Finally, in study 4 (N=532), we tested for a causal effect by providing participants with hypothetical budget periods—either two weeks or six weeks. For choices in which the smaller-sooner option was within two weeks and the larger-later option was after two weeks (but before six), participants given the two-week current period were more impatient on average (p<.001), but vice versa when the options spanned across current and future periods only in the six-week current period condition (p=.002). This did not hold for other choices in which period-spanning did not differ by condition (ps>.05).

Our results suggest that budget periods can explain present-biased preference: people are more willing to accept delays that occur in the same period but are reluctant to delay rewards from the current to future financial period.

Fighting Fiscal Awkwardness: The (Dis)Advantages of Digital Payment Methods on Peer-Debt Dynamics

EXTENDED ABSTRACT

People often lend and borrow money from peers. Although such financial transactions may appear superficially mundane, debt repayment among acquainted individuals is socially complex. The discussion of money among peers can be uncomfortable (Krueger, 1986; Trachtman, 1999; Rose & Orr, 2007), and accordingly, requesting and repaying money can evoke awkwardness. Because of this discomfort, consumers may turn to digital payment methods such as Venmo to avoid fiscal confrontations. However, the use of digital payment methods for peer-debt requests may also increase percep-

tions of impersonality (Walther, 1995; Schroeder et al., 2017). Thus, the use of digital payment methods may act as a double-edged sword for peer debt requests, where it can potentially reduce fiscal confrontation, but also make the interaction feel less personal.

In four studies, we investigate how consumers adjust the way that they request money from peers based on their relationship with the requestee. Specifically, we examine how the strength of social ties affects the choice of peer debt repayment methods. We find that consumers are *less* likely to request money via digital payment methods with their stronger social ties (i.e., close friends) compared to their weaker social ties (i.e., acquaintances). Mediation results indicate that, with close friends, *fewer* consumers choose to request via Venmo because digital payment methods seem impersonal. For weaker social ties, however, people attempt to avoid fiscal confrontation, thus, *more* people choose to request money via Venmo. In sum, consumers selectively use digital payment methods to match relationship priorities.

In Study 1 ($N = 300$), participants recalled a real instance where they requested money from someone they know. They described the situation, indicated how they requested the money (i.e., in-person, phone call, text message, electronic payment method, email, other), rated how they felt requesting the money, and rated their social ties with the requestee. Results showed that people who requested the money via electronic methods felt more impersonal than those who requested in person ($ps < .05$). Moreover, correlational results showed that the weaker the social ties with the requestee, the greater the discomfort people felt when requesting the money in person ($p < .01$). In short, we find that different request methods (e.g., in-person versus electronic payment methods) elicit different socio-emotional consequences depending on the social distance with the requestee.

In Study 2, a between-subjects experiment ($N = 300$), participants imagined requesting money that was owed from either a *close-friend* or an *acquaintance*. Participants indicated if they would request the money either (1) in-person, (2) via Venmo, or (3) they would choose not to ask. For *close-friends*, participants were *less* likely to request money using Venmo relative to requesting from an *acquaintance* (31% vs. 54%; $p < .01$). However, people were directionally *more* likely to request the money in person with a *close-friend* versus an *acquaintance* (52% vs. 41%, $p = .09$). That is, people were *less* likely to use digital payment methods with stronger (vs. weaker) social ties, while *more* likely to request in person with stronger (vs. weaker) social ties.

Study 3 ($N = 503$) replicated this basic effect and added a *Vendor* condition to test how a strictly transactional relationship with the requestee affects the choice of request method. In addition, we added a new method of request, a standard bank app, to see how a purely transactional, yet still digital, payment method differs from Venmo and in-person requests. All participants read a scenario where a *close-friend*, *acquaintance*, or *vendor* owed them money (randomly assigned). Participants were asked whether they would request the money either (1) in person, (2) via Venmo, (3) via a Bank app, or (4) they would not ask. Replicating Study 2, people were *less* likely to request the money that was owed via Venmo when requesting from a *close-friend* (19%) versus an *acquaintance* (35%; $p < .01$) or a *vendor* (30%; $p < .05$). However, people were directionally more likely to request the money in person with a *close-friend* (53%) versus an *acquaintance* (43%) or a *vendor* (43%). Moreover, people were substantially *more* likely to request the money using a standard bank app with a *vendor* (25%) versus a *close-friend* (5%; $p < .001$) and an *acquaintance* (5%; $p < .001$). That is, people were more likely to use a purely transactional payment app to request money from a strictly transactional relationship (i.e., with the vendor).

Study 4 (N = 503) addressed the mechanisms underlying the relationship between social distance and choice of request method. We investigated whether anticipated discomfort and impersonality between social distances are associated with Venmo versus in-person requests. Participants imagined requesting money from either a *close-friend*, *distant-acquaintance*, or *extremely distant-acquaintance* and chose to request the money in person or using Venmo. Then, participants rated how uncomfortable and impersonal it would feel to request the money. Consistent with previous studies, *fewer* people chose to request via Venmo with a *close-friend* (25%) compared to *distant-acquaintances* (42%; $p < .001$) or *extremely distant-acquaintance* (45%; $p < .001$). Conversely, more people chose to request in person with a *close-friend* (75%) than with a *distant-acquaintance* (58%) or an *extremely-distant-acquaintance* (55%; $p < .001$). Mediation results showed that anticipated discomfort from requesting in-person (indirect effect: 95% CI [-.07, .00]) and perceptions of impersonality using Venmo (indirect effect: 95% CI [.07, .00]) mediated the relationship between the strength of social distance and choice of request method.

Our findings suggest that people request money differently depending on the strength of their social ties with the requestee. With close friends, people are *less* likely to use digital payment methods because that makes the transaction feel less personal; instead, people request in person with those with whom they share close social bonds. At the same time, with weaker social ties (i.e., acquaintances), people are *more* likely to use digital payment methods to avoid fiscal confrontation and discomfort. Taken together, we see that consumers adjust their approach to peer financial interactions based on the needs of the social relationship at hand.

REFERENCES

Consumer Financial Protection Bureau. (2017). *Financial well-being in America*. Retrieved from https://files.consumerfinance.gov/f/documents/201709_cfpb_financial-well-being-in-America.pdf

Federal Reserve Board. (2018). *Report on the Economic Well-Being of U.S. Households in 2017*. Retrieved from https://www.federalreserve.gov/publications/files/2017-report-economic-well-being-us-households-201805.pdf

Hennecke, M., & Converse, B. A. (2017). Next week, next month, next year: How perceived temporal boundaries affect initiation expectations. *Social Psychological and Personality Science*, 8(8), 918-926.

Krueger, D. W. (1986). Money, success, and success phobia. The last taboo: Money as a symbol and reality in psychotherapy and psychoanalysis, 3, 16.

Larrick, R. P., & Soll, J. B. (2008). The MPG illusion. *Science*. 320(5883):1593-1594.

Loewenstein, G., & Prelec, D. (1992). Anomalies in intertemporal choice: Evidence and an interpretation. *The Quarterly Journal of Economics*, *107*(2), 573-597.

Lynch Jr, J. G., Netemeyer, R. G., Spiller, S. A., & Zammit, A. (2009). A generalizable scale of propensity to plan: the long and the short of planning for time and for money. *Journal of Consumer Research*, *37*(1), 108-128.

Morewedge, C. K., Holtzman, L., & Epley, N. (2007). Unfixed resources: Perceived costs, consumption, and the accessible account effect. *Journal of Consumer Research*, 34(4), 459-467.

Parsons, C. A., & Van Wesep, E. D. (2013). The timing of pay. *Journal of Financial Economics*, 109(2), 373-397.

Rose, G. M., & Orr, L. M. (2007). Measuring and exploring symbolic money meanings. *Psychology & Marketing*, 24(9), 743-761.

Schroeder, J., Kardas, M., & Epley, N. (2017). The humanizing voice: Speech reveals, and text conceals, a more thoughtful mind in the midst of disagreement. *Psychological Science*, 28(12), 1745-1762.

Soster, R. L., Monga, A., & Bearden, W. O. (2010). Tracking costs of time and money: How accounting periods affect mental accounting. *Journal of Consumer Research*, *37*(4), 712-721.

Stephens, M., & Unayama, T. (2011). The consumption response to seasonal income: Evidence from Japanese public pension benefits. *American Economic Journal: Applied Economics*, 3(4), 86-118.

Thaler, R. (1985). Mental accounting and consumer choice. *Marketing science*, 4(3), 199-214.

Trachtman, R. (1999). The money taboo: Its effects in everyday life and in the practice of psychotherapy. *Clinical Social Work Journal*, 27(3), 275-288.

Tu, Y., & Soman, D. (2014). The categorization of time and its impact on task initiation. *Journal of Consumer Research*, *41*(3), 810-822.

Ülkümen, G., Thomas, M., & Morwitz, V. G. (2008). Will I spend more in 12 months or a year? The effect of ease of estimation and confidence on budget estimates. *Journal of Consumer Research*, *35*(2), 245-256.

Urminsky, O., & Zauberman, G. (2015). The psychology of intertemporal preferences. *The Wiley Blackwell handbook of judgment and decision making*, 2, 141-181.

Walther, J. B. (1995). Relational aspects of computer-mediated communication: Experimental observations over time. *Organization Science*, 6(2), 186-203.

Say It Like You Mean It: Revealing Market Narratives through Text Analysis

Chair: Ignacio Luri, DePaul University, USA

Paper #1: Analyzing Brand Backstories: Combining Textual and Multi-sensory Data
Cristel Russell, Pepperdine University, USA

Paper #2: Rituals in Rap: Remaking the Road to Riches
Tonya Bradford, University of California Irvine, USA
Courtney Jemison, University of California Irvine, USA

Paper #3: Metaphorical Framings in Market Discourse
Ignacio Luri, DePaul University, USA
Hope Schau, University of Arizona, USA
Bikram Ghosh, University of Arizona, USA

Paper #4: Written in the Sand: Tracing Practice Diffusion Across Time and Space
Melissa Archpru Akaka, University of Denver, USA
Hope Schau, University of Arizona, USA

SESSION OVERVIEW

In this session, we present four empirical papers that, in addition to sharing text analysis as a methodological tool, explore the power of narratives. The contexts studied range from market perceptions of debt to brand backstories, and from the diffusion of surfing to rap lyrics. Each of these four papers utilizes a longitudinal dataset to study evolving market stories, as told by firms, news media, rap artists or surfers. The researchers in this session share the conviction that discourses in the market represent and construct reality. To study them, we engage in diverse forms of text analysis, widely considered a next frontier in marketing research (Berger et al. 2020), that include theme-coding, content analysis, and automated text analysis. Beyond a shared focus on textual data and analysis, these projects use a variety of data sources and theoretical lenses to contribute to our understanding of how narratives represent and drive the market. The presentations will dive deep into the everyday conversations of each topic to uncover the subtext behind everyday language and how it reflects deeper realities in the market.

The first presentation examines how brand managers strategically construct brand backstories from a curated set of facts, signs, symbols, that provide the firm's official narrative of the brand's origins. The authors reveal how practitioners design the backstory, curating brand materials to offer the 'real', 'authentic' story and the ultimate 'truth' about the brand. The next presentation focuses on the important topic of wealth disparities and the non-linear narratives of poverty and wealth. Rap music has had a fascination with these narratives, and their lyrics negotiate and link both ends. Though spending rituals are prominent in hip-hop lyrics, the authors explore how hip-hop lyrics also may encourage engagement in wealth creation rituals. The third presentation explores the timely topic of personal debt, attempting to uncover how the media constructs the perception of debt and what it does for/to people in society. Employing a variety of automated textual analysis on a large news database, the authors study in particular the role of metaphors framing issues in public discourse. The final presentation explores the dispersion of an indigenous practice, surfing, revealing that practice diffusion occurs through practice codification, transposition, and adaptation.

We structure the session as a series of four empirical presentations tied to the theme of market narratives and linked by a methodological focus on text. Each presentation will be 12 minutes leaving 20-25 minutes for discussion and debate. While all the presentations have implications for market creation, public policy, and branding, they borrow from a range of theories including narratology, conceptual metaphor theory, rituals and identity projects, or diffusion theory. This session will facilitate scholarly discussion of the complex interplay between markets and discourses. A big theme in it guiding the session and discussion with the audience will be the performative aspect of discourses or, in other words, how industries, firms, consumers "fake it till they make it", slowly creating a reality (a backstory, public consensus, wealth, a practice) by telling it. Jointly, we anticipate sparking conversation around questions such as: 1) how does a historical view of a specific market discourse (i.e. longitudinal, etymological, heritage or origin stories) inform understanding of current discourses? 2) how can industries, firms and consumers utilize these frameworks to strategically tell their stories? We expect lively audience participation and involvement based around the timeliness and relevance of the contexts and methods, as well as the eclectic theoretical perspectives.

Analyzing Brand Backstories: Combining Textual and Multi-sensory Data

EXTENDED ABSTRACT

Brand managers strategically construct brand backstories from a curated set of facts, signs, symbols, with accompanying evidentiary support that, when knitted together, provide the firm's official narrative of the brand's origins, including novel insights and revelations regarding the early days of the brand. Our research question is: How can analysis of multi-sensory archival data reveal how practitioners design the backstory, curating brand materials to offer the 'real', 'authentic' story and the ultimate 'truth' about the brand?

This multi-year, multi-country project focuses on the growing practice of the brand backstory, whereby firms grant consumers access to facts about the brand origins, 'private' backstage information. Often brand backstories unfold in the home of the brand (its headquarters or factory) or an authoritative institution, such as a museum. These sites (headquarters, factory, museum) frame the backstory, imbuing it with an aura of authenticity that bolsters the firm's authorial voice.

We draw on graphic narrative theory, a narratology theory grounded in the study of graphic novels and comics (bandes dessinées) and which allows a fuller understanding of storytelling via words and images. In particular, Thierry Groensteen's work on the System of Comics provides a novel lens through which we can integrate visual, verbal, spatial, and chronological expressions in narrative analysis. We share the insights gained from our ongoing analysis of four brand backstories. Our experience unearthed the challenges of incorporating visual and other sensory data in primarily text-centered consumer research and signals the need for narrative theories and rhetorical tools to supplement automated text analyses.

Our data consist of brand materials across four brand backstories (an entertainment brand, two fast moving consumer good brands and a nonprofit organization) that varied in the type of spatial brand backstory on offer (museum exhibit, factory tour and corporate headquarter exhibit), in the duration (one time event and ongoing) and location of the backstory (offsite museum and brand headquarters) as well as in the number and type of creators involved in the design of the backstory (multiple creators all not members of the brand-owning firm vs. a sole creator employed by the brand-owning firm). Practitioners approached for this project shared not only their views

and insights on their involvement with the brand backstory but also access to historical documents and curatorial practices such as backstory creation manifestos or documentation describing the project scope of the brand backstories.

Our data consist of in-depth qualitative with practitioners responsible for crafting and promoting brand backstories for the entertainment brand Outrageous Fortune (OF), the sole creator for the factory tour of Herr's Snacks, four practitioners for the headquarters of Girl Scouts USA, five for the Calissons du Roy Rene, a specialty almond delicacy. Interviews were conducted at the backstory site to enable the researchers to gain firsthand observations and an applied experience as a simulated consumer of the multisensorial backstory environments discussed in the interviews. First-hand observations were recorded as data through handwritten notes and supplemented the interviews carried out. The researchers visited each site on multiple occasions for lengthy periods of time. Follow up interviews were conducted with three OF backstory practitioners in a group interview, one GSUSA backstory practitioner, and two members of the Tourism Office in charge of industrial tourism and the Calissons tours. Interviews centered on the processes involved in the creation and maintenance of the brand curation, the motivations of the producers for the genesis of the brand backstory, the type of information included, the narrative structure and spatial organization of the exhibit, the goals and aims of the backstory during and after creation, and general opinions on consumer reactions to the backstory.

We supplemented interview data with analysis of the curation materials: all the OF materials from the Arts Department were provided digitally as well as the Official 'behind the Scenes' DVD, the tour guide manuals and instructions for the guided visits at Herr's, GSUSA, and the Calissons (in as many iterations as were available), as well as archival documents, when available, outlining the processes for selecting and organization curation materials into the backstory space . We also relied on the hundreds of photos and videos of the exhibits provided by the organizations as well as our own.

Our analysis of interview transcript data and the curated materials were analyzed hermeneutically, noting the relationships between codes and then nomothetically across interviews and data sources (Glaser & Strauss 1967; Mick & Buhl 1992; Thompson, Locander & Pollio 1989). A refinement of ideas and themes was achieved by way of the constant comparative method whereby data were compared to other sections that contained similar incidents and themes, as well as contrasted with other sections of data with differing themes (Goulding 2002).

We highlight the challenges of analyzing multi-sensory data. The brand backstories in our sample were multi-lingual, multi-cultural and multi-industry. The data collection and analysis followed the procedure and protocols of multiple traditions: textual media data, textual interview data, visual brand collateral (brand advertising and promotional material), and experiential data (factories, headquarters and museums). Complicating matters, the practitioner curated materials represent different punctuated moments with temporal notions of brand attributes and market perceptions. Our data represent a process theoretic approach (Giesler and Thompson 2016) centering on the brand backstories, consisting of the process of brand becoming, or the ways in which brands enter the market and minds of market constituents.

Rituals in Rap: Remaking the Road to Riches

EXTENDED ABSTRACT

Wealth disparities have long garnered attention in lyrics of rap music, and continues to do so with more recent lyrics focusing on overcoming such differences. Art serves a functional purpose within the African American community (French 2017; Karenga [1972] 1997). Rap, a musical art form embedded in hip-hop culture, was once a marginal influence and has emerged as a prominent global socialization force (French 2017; Lena 2006; Motley and Henderson 2008). Motley and Henderson (2008; p. 243) note "Hip-hop culture influences styles of behavior…"

Prior research identifies hip-hop influences on brand consumption (Burkhalter and Thornton 2014; Ferguson and Burkhalter 2015; North and Hargreaves 2007). While spending is integral to consumption, so is saving (Bradford 2015). Studies of hip-hop lyrics suggest listeners are socialized to rituals in support of spending (Leung and Kier 2010). Though spending rituals are prominent in hip-hop lyrics, we explore how hip-hop lyrics also may encourage engagement in wealth creation rituals.

Hip-hop lyrics often include implicit endorsements of specific forms of consumption (Motley and Henderson 2008; Rehn and Sköld 2005). Consider Petey Pablo's song featuring Seagram's gin (Burkhalter and Thornton 2014) or Run-DMC and the "My Adidas" campaign (Ferguson and Burkhalter 2015). Hip-hop music emerged from urban and ethnic enclaves providing an outlet of expression for those in marginalized communities, and is now found globally across other marginalized communities (French 2017; Motley and Henderson 2008). Hip-hop lyrics focus on current issues, where one such issue is the need for wealth creation (vs. spending). The primary emphasis in hip-hop lyrics are on those spending rituals related to brand acquisition. However, there is evidence that hip-hop lyrics also may encourage performance of wealth creation rituals.

The study explored lyrics of one of the wealthiest hip-hop artists, Shawn Carter—"Jay-Z", who amassed wealth through a diversified portfolio music, real estate, sports management (Akhatar 2018). Jay-Z shares his rags-to-riches story outlining his transition from poverty to drug-dealing "in the crucible of Brooklyn's Marcy projects." (Simmons 2005). Data were collected from studio albums released between 1996 and 2017 (212 songs). Lyrics were analyzed individually, within its album, and across albums. The data were coded using codes associated with wealth accumulation from the literature and the lyrics. Three themes emerged from that analysis related to wealth creation rituals.

Prior research on savings explores how individuals employ earmarks and social comparison in support of wealth creation and identity projects (Bradford 2009, 2015). Missing is an explanation of how wealth creation rituals may be introduced through music. This research finds such rituals may be introduced through three key mechanisms: social comparison, nostalgia, and aspiration. Studies of social comparison finds people seek salient others as points of reference (Festinger 1954). Research on wealth creation finds African Americans employ social comparisons with whites (Bradford 2009). The lyrics serve as a metaphorical device that provides a wealth creation ritual model, and an alternative social referent for listeners who are not likely to achieve acclaim.

Ritual performance provides a link between the past and the future. Where nostalgia is employed by marketers to sustain brand vitality (Brown, Kozinets, and Sherry 2003), these lyrics employ nostalgia to elevate notions of simplicity found in poverty as noble and worthy of retention amidst the complexity of wealth. Where prior research on voluntary simplicity focuses on reductions in consumption (Craig-Lees and Hill 2002), we find that the notion of simplicity is not segregated from material possession. Rather, an orientation toward simplicity is emphasized with respect to consumption to support performances of wealth creation rituals. Thus, nostalgia is em-

ployed to facilitate balance between drives for material possessions and security.

Continuity of rituals also inspires a future focus which may include aspirations. Aspiration in consumption may be found in notions of a future self (Bonsu and Belk 2003). We find these lyrics inspire aspiration not only related to identity but also through an adoption of wealth creation rituals. Early research purports a relationship between social class and savings patterns (Martineau 1958), yet our findings expand Bradford (2009) that illustrates that the impact of social class may be mitigated by adoption of rituals.

This study contributes to the literature on how behaviors are influenced through hip-hop lyrics (Motley and Henderson 2008). More specifically, we identify how wealth creation rituals within hip-hop lyrics challenge notions of spending rituals, and also may inspire wealth creation rituals for all individuals. Wealth creation rituals proposed in these lyrics include a broader set of ritual participants, and encourage performance continuity through social comparison, nostalgia and aspiration.

Metaphorical Framings in Market Discourse

EXTENDED ABSTRACT

We communicate using borrowed tools. When businesses, academics, or consumers quote, reference, meme, we are deliberately recontextualizing past words to make them do our biding. But all words are borrowed. As Bakhtin (1981) puts it, "language has been taken over, shot through with intentions", each word acquiring the taste of a collective, a generation, an ideology. In this intertextual game, market actors can unquestioningly replicate the linguistic conventions of communications on a topic, or they can strategically design their "borrowings" to fit their agenda. These latter, discourse-driving market actors shape public opinion by framing reality through a specific lens.

Metaphors are one such lens that influences perception of a topic and drive behavior. Beyond being stylistic devices to attract attention and spice conversation, metaphors work as frames, affecting how we see the world or our definition of an issue. In this article, we explore how metaphors structure discourses in the context of debt. No other product of the market economy carries the emotional and moral baggage of debt. According to market narratives (Peñaloza and Barnhart 2011), debt empowers as much as it constrains borrowers. With innovations in conversational AI such as Bank of America's virtual assistant Erica (Legters 2019), the Consumer Financial Protection Bureau increasingly shifting the discourse to one of responsibility put on ordinary citizens (Hayashi 2019), and presidential candidates making debt cancellation a cornerstone of their campaigns, few dialectical battles are more current than the framing of consumer-firm responsibility regarding debt.

Whether debt is framed as a tool, a burden, or a prison, the power of the words describing it is compounded in the age of social media sharing and content aggregators. Largely repackaging facts from elsewhere, news outlets engage in a constant parroting of each other, much like social media users retweeting, reposting and sharing. The language used to speak of an issue, with its frame and ideology, is echoed by numerous sources and cements in public opinion. Persuasive influencers like savvy politicians and firms design their scripts carefully to guide perception, opinion and action.

We develop a framework to judge the aptness of metaphors to frame marketing-relevant issues such as personal debt to lead public opinion in a given direction. The implications of this work extend from the design of persuasive marketing communications to the promotion of public policy or nudging behavior towards consumer well-being. To this end, we build on the established literature on discursive frames (Barsalou 1992, Shoemaker and Reese 1996, Gamson et al.1992; Humphreys and Latour 2013) and we strengthen the known association in academic research between metaphors and frames, or metaphorical frames (Boeynaems et al. 2017, Lee & Schwarz 2014, Lakoff 1993, Lakoff and Johnson 2008). By spelling out an issue in relation to one particular schema and not another, frames become shared understandings not only on what to think about the topic but on how to think about it. In contrast to the immense potential to harnessing metaphors, the alternative, unquestioningly echoing the metaphors used by others can backfire or result in the implicit endorsement of ideologies embedded in the language.

Acknowledging its established role influencing and reflecting public discourse (Deephouse 1996, Humphreys 2010, Humphreys and Latour 2013, Warren and Sorescu 2017), we turn to mass news media for an investigation of the metaphors and frames in the topic of debt. We conduct a large-scale text analysis on a comprehensive database of ten years of news media articles. Employing textual methods at the forefront of market research innovation (Berger et al. 2020), we approach the research question: how do metaphors frame market-oriented discourse to guide action? Although we build on literature investigating discourse in market activism (Humphreys 2010; Karababa and Ger 2010; Kurzer and Cooper 2007; Sandlin and Callahan 2009; Woodly 2015), we align more closely with a rarer and more recent body of research (Giesler and Veresiu 2014; Humphreys and Thompson 2014) concerned with the already established institutional discourses against which activists sometimes compete. Our data is analyzed through a three-fold approach of interpretive deep reading, computer-assisted discourse analysis, and a deep learning Natural Language Processing (NLP) model of debt conversation.

Consistent with research on framing, we find metaphors to be of central importance not only defining a problem, but also suggesting a solution. Far from being neutral, metaphors form frames regarding the topic in terms of valence, responsibility assignment, and action. These metaphors tend to cluster around topics, ideologies and language that support their definition of the frame. We argue that metaphors associated with social issues form entrenched framings that shape perceptions of the topic and our lived experience. While these framings reflect and perpetuate ideologies, we foreground an effect that can be insidious rather than overt: an endorsement that is often-times tacit rather than explicit. Strategic marketing action requires carefully choosing the metaphorical frames that advance the firms goals. Conversely, acts of resistance against the dominant discourses can be forced to articulate their criticisms through the same frames that work against them, or consciously break the mirage of figurative language that traps them.

Written in the Sand: Tracing Practice Diffusion Across Time and Space

EXTENDED ABSTRACT

Prior consumer research underscores the importance of practices in shaping market-mediated experiences and social structures. Little is known, however, about how practices diffuse across various social and cultural contexts over time and the consequences of diffusion on consumption.

This research involved 10 years of data collection, 2009-2018, and multiple rounds of analysis, in which we iterated between data and theories to interpret our findings. We include a variety of market-related actors' narratives that capture different practices and perspectives; the sample of interviewees was purposive. We interviewed a number of surfing historians and historical figures (e.g., contest

organizers, surfboard shapers, and entrepreneurs) in the evolution of surfing to verify our archival data and to better understand and capture specific first-person accounts of particular events. Differences in occupation and gender provided a variety of viewpoints and perspectives of surfing as well as the history of surfing. We used a variety of archival sources, including newspapers, magazines, photos, websites, movies, and Observations include participation in the practice of surfing, engaging in surfing related events or activities, spending time in surf-related retail environments, writing for a surfing magazine, and volunteering at a surfing competition. In addition, two of the authors spent considerable amounts of time as members of local surfing communities and cultures prior to the initiation of this study.music, which served as surrogate data when first-person accounts were unavailable Karababa and Ger (2011). With each source of data, we examined each artifact as an individual representation of surfing and then considered its meaning within the wider scope of the surfing subculture. This approach enabled us to oscillate across micro- to meso- to macro-levels of social phenomena (Karababa and Ger 2011) within the surfing ecosystem (Akaka et al., 2013; Chandler and Vargo 2011).

We approach these data from an ecosystems perspective (e.g., Giesler 2008; Vargo and Lusch 2016) that allows us to consider how particular events and practices fit into a broader socio-historic narrative. We are particularly interested in understanding how micro-level social phenomena (e.g., practices) construct broader social structures (c.f. Giddens 1984) enabling the spread of practices. We utilize a longitudinal and historical data set (Karababa and Ger 2011), through a process theorization approach (Giesler and Thompson 2016).

Chronological accessibility of the emergence and re-emergence of specific practices requires the ability to track the spread of a particular local artifact across time and space (Giesler and Thompson 2016). While the complete pollination of surfing around the globe is beyond the scope of this particular study, we aim to understand how practices diffuse across regions and cultures.

Our historical research is guided by the work of Karababa and Ger (2011) and a process theorization approach that focuses analytical attention on change occurring in social collectives (Giesler and Thompson 2016). Change is made manifest in actions, ergo we utilize event-based data and analytical bracketing to organize the events (Giesler and Thompson 2016: 502) that, in our context (surfing) and with our interpretive lens (diffusion) reveal the manner in which surfing spread across multiple locales. Specifically, we examine what Giesler and Thompson (2016: 500) call topological change, or the "shifts in patterns of power relationships." These shifts from one reality to the next disrupt the status quo relations causing topological displacements (Giesler and Thompson 2016: 503). Based on the precipitating tensions arising from power struggles regarding respectability and reputation, we identify power shifts, manifested through events, which enable the spread and perpetuation of surfing (Giesler and Thompson 2016: 499).

Part of the challenge of understanding the practice diffusion is that in studying practices and local culture, there is a tendency to focus on understanding particular micro-social processes and contexts. Askegaard and Linnet (2011: 381) argue "there is a need for bridging the analytical terrain between the anthropological search for thick description and deep immersion in the field, and the sociological inclination towards broad social theories and movements that are often quite remote from the emic illustrations of everyday life experiences." To investigate communities of practice (Wenger 1998) that underpin surfing's consumer culture, we draw on the work by Schau and colleagues (2009) to identify specific micro-level practices that contribute to the emergence of common structure, and frame these

practices with a broader classification of value co-creation practices and their relationship to practice diffusion. This provides a framework for studying value co-creation and practice diffusion among micro- and higher (meso- or macro-) levels of social phenomena (Akaka et al., 2013).

This exploration of the dispersion of an indigenous practice, surfing, reveals that practice diffusion occurs through practice codification, transposition, and adaptation. Our data reveal that practice diffusion is not the wholesale adoption of a practice. We show that practice diffusion is influenced by the origins of a practice and the social and cultural contexts in which its diffusion occurs. Practice adaptation is a process that integrates varying perspectives of a practice into the broader nexus of understandings, doings and sayings associated with that particular practice. We find that the as a practice diffuses across contexts it has the potential to lead to social change and the emergence new social structures (subcultures of consumption).

REFERENCES

Akaka, Melissa Archpru, Stephen L. Vargo, and Robert F. Lusch (2013)"The complexity of context: A service ecosystems approach for international marketing." *Journal of International Marketing* 21.4: 1-20.

Askegaard, S., & Linnet, J. T. (2011). Towards an epistemology of consumer culture theory: Phenomenology and the context of context. Marketing Theory, 11(4), 381-404.

Akhatar, Allana (2018), "Here's How Much Jay-Z Is Worth—and How He Makes Money," http://time.com/money/5108647/jay-z-net-worth/.

Bakhtin, M. (1981). Discourse in the Novel. The Dialogic Imagination. Four essays, 301-331.

Barsalou, L., and Hale, C. (1993). Components of conceptual representation. From feature lists to recursive frames.

Berger, J., Humphreys, A., Ludwig, S., Moe, W. W., Netzer, O., & Schweidel, D. A. (2020). Uniting the tribes: Using text for marketing insight. Journal of Marketing, 84(1), 1-25.

Boeynaems, A., Burgers, C., Konijn, E. A., and Steen, G. J. (2017). The effects of metaphorical framing on political persuasion: A systematic literature review. Metaphor and Symbol, 32(2), 118-134.

Bonsu, Samuel K. and Russell W. Belk (2003), "Do Not Go Cheaply into That Good Night: Death-Ritual Consumption in Asante, Ghana," *Journal of Consumer Research*, 30 (1), 41-55.

Bradford, Tonya Williams (2009), "Intergenerationally Gifted Asset Dispositions," *Journal of Consumer Research*, 36 (1), 93-111.

--- (2015), "Beyond Fungible: Transforming Money into Moral and Social Resources," *Journal of Marketing*, 79 (2), 79-97.

Burkhalter, Janée N. and Corliss G. Thornton (2014), "Advertising to the Beat: An Analysis of Brand Placements in Hip-Hop Music Videos," *Journal of Marketing Communications*, 20 (5), 366-382.

Chandler, J. D., & Vargo, S. L. (2011). Contextualization and value-in-context: How context frames exchange. Marketing theory, 11(1), 35-49.

Craig-Lees, Margaret and Constance Hill (2002), "Understanding Voluntary Simplifiers," *Psychology & Marketing*, 19 (2), 187-210.

Deephouse, David L. (1996), Does Isomorphism Legitimate? Academy of Management Journal, 39 (4), 1024–1039.

Ferguson, Nakeisha S. and Janée N. Burkhalter (2015), "Yo, Dj, That's My Brand: An Examination of Consumer Response to Brand Placements in Hip-Hop Music," *Journal of Advertising*, 44 (1), 47-57.

Festinger, Leon (1954), "A Theory of Social Comparison Processes," *Human Relations*, 7, 117-140.

French, Kenneth (2017), "Geography of American Rap: Rap Diffusion and Rap Centers," *GeoJournal*, 82 (2), 259-272.

Gamson, W. A., Croteau, D., Hoynes, W., and Sasson, T. (1992). Media images and the social construction of reality. Annual review of sociology, 18(1), 373-393.

Giesler, Markus (2008) "Conflict and compromise: drama in marketplace evolution." Journal of Consumer Research 34.6: 739-753.

Giesler, M., & Thompson, C. J. (2016). A tutorial in consumer research: Process theorization in cultural consumer research. Journal of Consumer Research, 43(4), 497-508.

Giesler, M., and Veresiu, E. (2014). Creating the responsible consumer: Moralistic governance regimes and consumer subjectivity. Journal of Consumer Research, 41(3), 840-857.

Groensteen, Thierry (2017), The Expanding Art of Comics (translation by Ann Miller), University Press of Mississippi.

Groensteen, Thierry (1988) « Narration as Supplement : An Archaelogy of the Infra-Narrative Foundations of Comics » (traduction, par Ann Miller, de mon texte figurant dans Bande dessinée, récit et modernité, 1988), in Ann Miller & Bart Beaty (ed.), The French Comics Theory Reader, Leuven : Presses universitaires de Louvain, 2014, p. 163-181.

Groensteen, Thierry (2013), Comics and Narration (translation by Ann Miller), The University of Mississippi Press.

Hayashi, Y. (2019, July 12). Financial Watchdog Shifts from Enforcer to Educator. The Wall Street Journal, Retrieved from https://www.wsj.com/articles/financial-watchdog-shifts-from-enforcer-to-educator-11562922005 on July 12, 2019.

Hirschman, E. C. (1993). Ideology in consumer research, 1980 and 1990: A Marxist and feminist critique. Journal of consumer research, 19(4), 537-555.

Humphreys, A. (2010). Megamarketing: The creation of markets as a social process. Journal of Marketing, 74(2), 1-19.

Humphreys, A., and Latour, K. A. (2013). Framing the game: Assessing the impact of cultural representations on consumer perceptions of legitimacy. Journal of Consumer Research, 40(4), 773-795.

Humphreys, A., and Thompson, C. J. (2014). Branding disaster: Reestablishing trust through the ideological containment of systemic risk anxieties. Journal of Consumer Research, 41(4), 877-910.

Karababa, E., and Ger, G. (2010). Early modern Ottoman coffeehouse culture and the formation of the consumer subject. Journal of Consumer Research, 37(5), 737-760.

Karenga, Maulana ([1972] 1997), "Black Art: Mute Matter Given Force and Function," in *The Norton Anthology of African American Literature*, Vol. 1973-1977, ed. Henry Louis Gates and Nellie Y. McKay, New York: Norton.

Kurzer, P., and Cooper, A. (2007). Consumer activism, EU institutions and global markets: The struggle over biotech foods. Journal of Public Policy, 27(2), 103-128.

Lakoff, G. (1993). "The contemporary theory of metaphor". In A. Ortony (Ed.), Metaphor and Thought (pp. 202–251). Cambridge: Cambridge University Press. [Second edition].

Lakoff, G., and Johnson, M. (2008). Metaphors We Live by. Chicago. University of Chicago Press.

Lee, S. W., & Schwarz, N. (2014). Metaphor in judgment and decision making.

Legters, B. (2019, July 15). Chatbots in Banking Got Smart. This is How They'll Make Your Bank Better. Forbes, Retrieved from https://www.forbes.com/sites/boblegters/2019/07/15/chatbots-in-banking-got-smart-this-is-how-theyll-make-your-bank-better/#19ffe69d70a7 on July 12, 2019.

Lena, Jennifer C. (2006), "Social Context and Musical Content of Rap Music, 1979–1995," *Social Forces*, 85 (1), 479-495.

Leung, Ambrose and Cheryl Kier (2010), "Music Preferences and Young People's Attitudes Towards Spending and Saving," *Journal of Youth Studies*, 13 (6), 681-698.

Martineau, Pierre (1958), "Social Classes and Spending Behavior," *Journal of Marketing*, 23 (2), 121-130.

Motley, Carol M. and Geraldine Rosa Henderson (2008), "The Global Hip-Hop Diaspora: Understanding the Culture," *Journal of Business Research*, 61 (3), 243-253.

North, Adrian C. and David J. Hargreaves (2007), "Lifestyle Correlates of Musical Preference: 3. Travel, Money, Education, Employment and Health," 35 (3), 473-497.

Peñaloza, L., and Barnhart, M. (2011). Living US capitalism: The normalization of credit/debt. Journal of Consumer Research, 38(4), 743-762.

Rehn, Alf and David Sköld (2005), "'I Love the Dough': Rap Lyrics as a Minor Economic Literature," *Culture & Organization*, 11 (1), 17-31.

Sandlin, J. A., and Callahan, J. L. (2009). Deviance, dissonance, and détournement: culture jammers use of emotion in consumer resistance. Journal of consumer culture, 9(1), 79-115.

Shoemaker, P. J., and Reese, S. D. (1996). Mediating the message (pp. 781-795). White Plains, NY: Longman.

Simmons, Russell (2005), "Builders & Titans: Jay-Z," *Time International (South Pacific Edition),* (15), 73-73.

Vargo, Stephen L., and Robert F. Lusch (2016) "Institutions and axioms: an extension and update of service-dominant logic." Journal of the Academy of marketing Science 44.1: 5-23.

Warren, N. L., & Sorescu, A. (2017). When 1+ 1> 2: how investors react to new product releases announced concurrently with other corporate news. Journal of Marketing, 81(2), 64-82.

Woodly, D. R. (2015). The politics of common sense: How social movements use public discourse to change politics and win acceptance. Oxford University Press.

Moving on! The Effect of Movement On, From and Embodiedin Products on Consumer Judgments

Chairs: Ana Valenzuela, Baruch College, CUNY & ESADE – Universitat Ramon Llul, USA
Eda Sayin, IE Business School – IE University, Spain

Paper #1: Is Fast Feminine? The Effect of Speed of Observed Hand-Motor Actions on Consumer Judgment and Behaviors

Sumit Malik, IE Business School, Spain
Eda Sayin, IE Business School – IE University, Spain

Paper #2: Assimilative Versus Complementary Effects of Embodied Verticality: Neural and Behavioral Evidence

Massimiliano Ostinelli, Winthrop University, USA
David Luna, University of Central Florida, USA
Torsten Ringberg, Copenhagen Business School, Denmark
Seidi Suurmets, Copenhagen Business School, Denmark

Paper #3: Good Buzz, Bad Buzz: Using Vibrotactile Feedback to Shape Consumer Choice

William Hampton, University of St. Gallen, Switzerland
Christian Hildebrand, University of St. Gallen, Switzerland

Paper #4: Consumer Responses to Haptic Sensing of Movement in Mobile Advertising

Rhonda Hadi, University of Oxford, UK
Ana Valenzuela, Baruch College, CUNY & ESADE – Universitat Ramon Llul, USA
Karthik Sridhar, Baruch College, CUNY, USA
O. H. Groth, Baruch College, CUNY, USA

SESSION OVERVIEW

Personal experiences using hand movements and gestures have been shown to influence attitudes by activating heuristics, visual fluency, and emotional attachment (Labroo & Nielsen, 2010; Hadi & Valenzuela, 2014; Streicher & Estes, 2016). This is particularly true since, unlike visual or auditory cues, tactile exchanges require direct contact with a stimulus (Peck, 2010). Touch is considered the most "proximal" sense (Montagu & Matson, 1979) and has an idiosyncratic capacity to evoke a sense of psychological closeness (Trope & Liberman, 2010). A sense of movement can also be delivered through a device itself. In fact, computer science research suggests that "mediated touch" is possible, where haptic feedback from devices symbolizes the experience of the movement delivered by other (Gallace & Spence, 2010; Haans et al., 2006).

This session combines four papers that shed light on dimensions, which drive how movement actions on objects, received from objects or embodied on the trajectory of objects may have downstream consequences for advertising effectiveness, product preferences, and choice.

The first paper investigates how speed of observed hand-motor actions affect consumer judgments – driven by schematic associations between speed of hand-motor actions and femininity-masculinity. Specifically, Malik and Sayin propose that observing slow (vs. fast) hand-motor actions evokes feminine (vs. masculine) schematic associations, which leads to perceiving that the product itself is more feminine and transfers onto higher product evaluations among female (vs. male) consumers.

The second paper by Ostinelli, Luna, Ringberg and Suurmets reconciles disparate findings in the semantic association connected with vertical movements by introducing the conceptual distinction between static embodied experiences (i.e., being up/down in a stationary fashion) and dynamic embodied experiences (i.e., moving up/down). They suggest that static experiences lead to assimilative behavior and dynamic experiences lead to complementary behavior when they involve aversive situations.

Next, Hampton and Hildebrand demonstrate that certain movement delivered by devices, such as mobile vibrations, is consistently perceived as rewarding and can influence shopping decisions. They also provide evidence that conditioning drives this vibration-reward association.

Finally, Hadi, Valenzuela, Sridhar and Du develop a novel framework to predict consumer responses to synchronic integration of haptic effects into audiovisual mobile content, particularly movement. They demonstrate that, while haptic augmentation may indeed improve consumer responses to advertising, the positive effect is moderated by dimensions of brand personality.

This session should be of interest to a broad audience of researchers with substantive interests in the consequences of consumer associations with object-directed actions and the experience of movement within human-technology communication, as well as a theoretical interest in embodied cognition, associative processes, and information processing. The consequential nature of the dependent variables provides insights for practitioners.

Is Fast Feminine? The Effect of Speed of Observed Hand Movement on Consumer Judgment and Behaviors

EXTENDED ABSTRACT

Hand movements, gestures, and actions have been shown to influence consumer attitudes and behavior (Labroo & Nielsen, 2010; Hadi & Valenzuela, 2014; Streicher & Estes, 2016). Extending this literature, we investigate how speed of observed hand interaction with an advertised product affects consumer judgments.

We argue that consumers cognitively relate speedy or fast (than gentle or slow) movements with masculinity (than femininity). They may develop the associations about what it is feminine (vs. masculine) through social learning and repeated exposure to stimuli in their environment (Becker, Kenrick, Neuberg, Blackwell, & Smith, 2007). For example, in advertisements, consumers oftentimes observe a female protagonist performing a gentle hand interaction with a product (e.g., applying L'Oréal face cream, spreading Nutella on a pancake etc.) and male character doing a rather speedier hand movement (e.g., twisting the handle of Harley Davidson bike, spraying the AXE body deodorizer etc.) We propose that recurrent exposure to such sensorimotor experiences in advertisements, dance-forms, films, etc. can lead the consumers to develop distinct associations of slow (vs. fast) hand movements with a more feminine (vs. masculine) behavior (H#1). These associations may even be taken as an input to form product judgments. We hypothesize that slow (vs. fast) hand movement with a product will alter the attribute perception of the product – such that the touched product will be perceived more feminine (vs. masculine; H#2). Finally, drawing upon the social identity theory, we expect that observing a slow (vs. fast) hand movement with a product will evince a higher product evaluation among female (vs. male) consumers (H#3). This is because individuals are motivated to process information and make product choices that match their social identity (Berger & Heath, 2007).

In Study 1A, MTurk workers (N = 158) completed the computer-based Implicit Association Test (IAT; Greenwald, McGhee, & Schwartz, 1998). The findings revealed a positive and significant association for fast (vs. slow) movement with masculinity relative to femininity [D-score=.67, t(157)=20.40, p<.01, 95% CI =(.60, .73), Cohen's d=1.62]. The association of speed held across the participant genders.

In Study 1B, MTurk participants (N= 259) were assigned to either slow or fast speed between-subject conditions. Each participant watched three randomly-presented videos depicting commonly-encountered hand movements (i.e., ironing, vacuuming, and spray-cleaning) that varied on speed of action. They, then, shared their attribute associations for the action-doer i.e., feminine (gentle, nurturing, and caring) and masculine (forceful, aggressive, and dominant; Hoffman & Borders, 2001), perceived speed, video characteristics (manipulation checks), age, and gender (control variables). A repeated-measures ANCOVA with speed as between-subjects factor and the three contexts as within-subjects factor on the feminine-attributes index (average of feminine attributes) showed a significant effect of speed (M_{slow}=4.91 vs. M_{fast}=4.35, p<.01; ηp2=.06) suggesting that slow speed evinced a feminine schematic association. Likewise, the analysis on masculine-attributes index found that fast speed triggered a masculine schema (M_{slow}=3.30 vs. M_{fas}t=4.06, p<.01; ηp2=.07). These effects retained significance without the covariates (p<.01) as well.

Study 2 demonstrates the use of distinct associations from slow (vs. fast) speed as an input to form attribute perceptions of a product (i.e., shaving foam; H#2). In a pre-test of 5 shaving foam cans (fig.1), MTurk participants (N=103) identified "Ultra-Sensitive" labelled foam as significantly lower on perceived masculinity ($M_{Ultra-Sensitive}$=4.66) compared to "Bold" labelled foam (M_{Bold}=5.87, p<.01).

In main Study 2, MTurk participants (N=254) were assigned to either slow or fast between-subject conditions. The stimuli video showed a male applying shaving foam (fig.2). Participants were asked to choose the foam product they believed that the protagonist is applying ("Ultra-Sensitive" or "Bold"). They, then, rated the individual on the schematic attribute associations, video characteristics, manipulation checks, and control variables as study 1.

We conducted a logistic regression to test whether slow (vs. fast) hand movement led the featured product to be perceived as low/ "Ultra-Sensitive" (vs. high/ "Bold") on masculinity. The main effect of speed was significant (χ2(6)=3.71, p=.05; H#2) with no significant covariates (p>.35). Specifically, participants chose less of the high masculine product ("Bold") upon observing a slow (P_{slow}=48.81%) vs. fast (P_{fast}=60.62%) hand movement (χ2(1)=3.56, p=.06). We then ran a MANCOVA on schematic associations [DVs: femininity and masculinity index]. The analysis showed that slow (vs. fast) speed activated a significant feminine schema (M_{slow}=4.53, M_{fast}=3.79; p<.01) but did not alter the masculine associations (M_{slow}=3.59, M_{fast}=3.54; p=.79) for the protagonist. Gender and video characteristics had a significant effect (p<.01) but did not interact with speed to influence the associations. Subsequently, we ran a mediation analysis that showed that slow (vs. fast) observed hand movement elicits a higher feminine (vs. masculine) schematic association, which mediates the effect on choice of shaving foam product.

In Study 3, we investigate whether female (vs. male) consumers use speed of observed hand movement to form their purchase intention. We expect female (vs. male) consumers to evince higher evaluations upon observing a slow (vs. fast) hand interaction with a product. This is because consumers are influenced by gender-identity maintenance motives and choose products that match their own social identity.

Study 3 had a 2(speed: slow vs. fast) x 2(participants' gender: male vs. female) between-subjects design. Postgraduate students (N=89) watched the stimuli video depicting a lateral hand-movement, which varied on speed (slow: 2.5 cm./sec. vs. fast: 5 cm./sec) over a duvet cover (i.e., target product; fig.3). Participants, then, shared their purchase intention. An ANCOVA on purchase intention revealed no significant main effect of speed (F(1,82)=.41, p =.52) and participant's gender (F(1,82)=.08, p=.77) but a significant interaction effect (F(1,82)=3.75, p=.05; H#3). The effect-size improved upon excluding the covariates (F(1,85)= 5.09, p=.03).

To summarize, across four studies, we demonstrate that observing hand movements, varying on speed, can affect the consumer responses. We demonstrate that consumers evince higher evaluations for not only products but also hand movement speed that matches their distinct social identity – such that female (vs. male) consumers evoke higher evaluations for a product depicted with slow (vs. fast) hand movement. These findings have direct implications for product management, advertising, and online marketing.

Assimilative Versus Complementary Effects of Embodied Verticality: Neural and Behavioral Evidence

EXTENDED ABSTRACT

The embodied cognition literature presents, at times, contradictory effects of verticality. Most of the literature draws on the semantic association between power, general valence, and verticality to show *assimilative effects*, where "up" is generally associated with greater power and with positivity, and "down" is associated with less power and with negativity (Esteky, Wineman, & Wooten, 2018; Guido, Pichierri, Nataraajan, & Pino, 2016; Sundar & Noseworthy, 2014).

At the same time, other research has shown *complementary effects* of verticality. Complementary responses occur when sensory-motor experiences lead to effects that are inconsistent with, and even opposite of, the underlying conceptual metaphor of "up is good." These effects result from goal-oriented behaviors aimed at reducing the gap between a current and a desired state (Zhang and Risen 2014). For example, Ostinelli, Luna and Ringberg (2014), show that moving down leads individuals to experience lower self-worth, which motivates individuals to obtain better results in cognitive tasks.

We reconcile those seemingly disparate findings in the domain of verticality by introducing the conceptual distinction between *static* embodied experiences (i.e., being up/down in a stationary fashion) versus *dynamic* embodied experiences (i.e., moving up/down). We suggest that static experiences lead to assimilative behavior and dynamic experiences lead to complementary behavior when they involve aversive situations (e.g., moving down).

Study 1

Study 1 is an EEG study that measures the brain states that result from the manipulation of static versus dynamic verticality. Previous research suggests that the simulation of movement can activate the brain areas responsible for processing goals to prepare individuals to cope with changes in the environment (Barsalou 2009; Borghi 2012; Gallese 2009; Hamilton 2013; Hickok and Hauser 2010; Pezzulo and Castelfranchi 2009; Semin and Cacioppo 2009; Sartori, Bucchioni, and Castiello 2013). From that basis, we predict that the simulation of downward movement activates the brain areas responsible for compensatory goals aimed at reacting to unpleasant changes in self-worth. This leads to complementary effects such as a preference for products with positive associations (Sivanathan and Pettit 2010).

We found that, compared to static scenarios, theta synchronization in dynamic scenarios was higher in the parietal lobe. Syn-

cronization of theta power in the parietal lobe has previously been described as reflective of redirecting attention to goal-relevant semantic information (Atienza, Crespo-Garcia, & Cantero, 2011). This finding suggests that dynamic scenarios activate goal-directed behavior, which may drive the desire to compensate for an aversive state in the moving-down scenario. In addition, alpha synchronization was higher for dynamic imagery in the frontal, central and parietal regions. This implies that dynamic scenarios do trigger an increased internally focused attention. Synchronization of alpha oscillations in parietal regions may also reflect increased processing of motor, semantic and perceptual aspects of an imagined scene (Bartsch et al., 2015).

Study 2

Study 2 shows that down conditions activate more negative associations than the up conditions, both in dynamic and static simulations. The results show a main effect of direction such that respondents in the up condition had a higher self-worth than respondents in the down condition (M_{up} = 3.23, SD_{up} = 1.79; M_{down} = 2.66, SD_{down} = 1.45, F(1,234) = 8.60, p < .01), controlling for task enjoyment. Similarly, we analyzed the top three words that came to respondents' minds while imagining the vertical scenario. The results again show a main effect of direction such that the up condition led to typing more positive words than the down condition (M_{up} = .14, SD_{up} = 1.88; M_{down} = -.36, SD_{down} = 1.70, F(1,234) = 4.54, p = .03).

Study 3

Study 3 investigates whether dynamic verticality leads to complementary effects and static verticality leads to assimilative effects. The study was a 2 (direction: up vs. down) x 2 (movement: dynamic vs. static) between-subjects design. A significant interaction emerged ($F(1, 212) = 13.94$, $p < .001$). In the dynamic condition, participants who imagined moving downward were willing to pay a greater price premium for the high-status product relative to the low-status product than those who imagine moving upward ($M_{moving\ down}$ = 18.68%, $SD_{moving\ down}$ = 34.42%; $M_{moving\ up}$ = 4.23%, $SD_{moving\ up}$ = 28.79%, $t(212)$ = -2.19, p = .03). This is consistent with a *complementary effect* of vertical position. In the static condition, however participants in the "being down condition" reported a lower price premium for the high status iPad relative to the low status Klu tablet ($M_{being\ down}$ = 4.82%, $SD_{being\ down}$ = 31.04%; $M_{being\ up}$ = 24.73%, $SD_{being\ up}$ = 39.71%; $t(212)$ = 3.10, p < .01). This pattern of results is consistent with *assimilative effects* of vertical position (Zhang and Risen 2014).

Study 4

Study 4 provides support for a motivational goal priming explanation of complementary effects, including the mediating role of goal activation, through a moderation-of-process approach (Spencer, Zanna, and Fong 2005). We introduced a goal satiation condition, in which respondents had to write about their own success, and a control condition in which responents had to write about a trip to the grocery store. We found that in the dynamic down condition, writing about one's success led to lower willingness to pay for status products than writing about a trip to the grocery store ($M_{goal\ satiation}$ = 21.11%, $SD_{goal\ satiation}$ = 20.54% vs. $M_{no\ goal\ satiation}$ = 36.9%, $SD_{no\ goal\ satiation}$ = 27.6% vs; t(202) = -2.09, p = .04).

Our work provides two main theoretical contributions: First, we introduce a goal systems framework to the study of verticality, resolving discrepancies in the existing research. Second, we introduce and explain the difference between static and dynamic simulations in embodied cognition. Methodologically, we add to the incipient body of work that integrates neural and behavioral empirical studies

through the use of EEG and behavioral evidence. The implications of our findings extend beyond the domain of verticality, as our framework can help explain potential discrepancies in other embodied cognition areas such as the experiences of weight and/or approach behavior.

Good Buzz, Bad Buzz: Using Vibrotactile Feedback to Shape Consumer Choice

EXTENDED ABSTRACT

Although smartphones have been vibration-capable for over a decade, mobile vibration features have been relatively unutilized by firms. Within the last two years, however, large e-commerce platforms such as Amazon have quietly begun to pair mobile vibration with certain consumer behaviors such as shopping cart adds. Anecdotally, people tend to report that a vibration from their mobile evokes an approach response, hinting at its potential as rewarding stimulus, yet scholarly research examining the subjective perceptions of mobile vibration is lacking. The current research integrates and builds upon existing haptic and reward perception research to examine three fundamental research questions relating to mobile vibrations: (1) how they are subjectively perceived, (2) whether they influence consumer choice, and (3) by what mechanism they exert influence, focusing on the role of classical conditioning.

Almost every modern consumer now carries a vibrating mobile device that they interact with for up to 10 hours per day (Roberts, Yaya, & Manolis, 2014). This massive uptick in mobile usage has been accompanied by increasing reports of mobile dependency (Salehan & Negahban, 2013), heightened impulsivity (Wilmer, Hampton, Olino, Olson, & Chein, 2019), as well as experiences of "phantom vibrations," i.e. imaginary vibrations (Drouin, Kaiser, & Miller, 2012). Academic research of mobile vibration has focused primarily on its use as an alerting or communicative stimuli (Sahami, Holleis, Schmidt, & Häkkilä, 2008; Saket, Prasojo, Huang, & Zhao, 2013), though one recent marketing study does suggest that mobile vibrations can boost the persuasiveness of certain text messages (Hadi & Valenzuela, 2019). Nonetheless, it remains unclear how consumers perceive, and are affected by, mobile vibrations in consumptive contexts such as online shopping. We therefore conducted an initial pretest to establish a base understanding of consumer perception of different mobile vibrations and to guide our selection of vibrational stimuli.

In the pretest, online participants (n=150) reported their subjective perceptions mobile vibrations (ranging from 25ms to 3200ms; random presentation) along a variety of dimensions (reward, pleasantness, arousal, etc.). The findings of this pretest demonstrate that reward perception varies by vibration duration F(3,147)=6.52, p<.001, with reward perception peaking at 400ms.

Our pretest finding that 400ms mobile vibrations are rewarding, together with robust evidence that reward influences choice (Papies, Barsalou, & Press, 2015), led to our main Study 1 hypothesis: consumers will prefer an action that produces a rewarding vibration, compared to one that does not. Using a within-subjects design, we presented participants (n=150) with two visually-identical boxes (analogous to online shopping carts). Participants were instructed to add items to either box as many times as they liked during a fixed timeframe. As predicted, we find that participants added more items to the vibration-producing box (MVibrationClicks=14.69; MNonvibrationClicks=10.71; F(2,148)=4.08, p<.05). Interestingly, the extent to which participants found vibrations rewarding was significantly correlated with the positive-valence of their daily mobile notifications (r=.29, 95%-CI=[.11,.41], p<.01, suggesting that con-

ditioning may underlie mobile vibration reward perception (further examined in Study 3).

In Study 2, we extend our findings with a lab-controlled study (n=138, Swiss sample) examining the effect of rewarding vibro-tactile stimuli on consumer choice in a highly-ecological online shopping setting. Participants in this study used identical tablets to complete a custom-built online grocery shopping task. In the control condition, as in a typical online shopping interface, adding an item updated the shopping cart, but produced no other feedback. In the vibration condition however, clicking the add-to-cart button triggered a rewarding vibration. We find that consumers in the vibration condition had significantly higher basket totals compared to the control group (MVibrationBasketTotal=72.78CHF ; MControlBasketTotal=57.84CHF; F(1,138)=10.01, p<.001, and that this effect is moderated by impulsivity. This result establishes that mobile vibrations can be rewarding and influence consumer choice, but does not address the underlying mechanism.

In Study 3 we test the hypothesis that perception of mobile vibrations as rewards stems from classical conditioning (Gormezano & Moore, 1966). To test this hypothesis, we adapted a classic associative learning, Multi-armed Bandit (MAB) task (Gittins, Glazebrook, & Weber, 2011). In our incentive-compatible, two condition MAB task, we presented online participants (n=215, U.S. sample) with four visually-identical slot machines, and tasked them with finding the most rewarding slot machine (each with unknown win probability) to maximize their points across 4 blocks of 30 trials (120 total; probability assignment randomized between blocks). Participants were randomly assigned to either a (1) vibration-win condition in which wins were visually-salient and carried an approximately neutral mobile vibration (100ms), while losses were less visually-salient and carried no vibration or (2) a vibration-loss condition, in which the opposite was true: losses were salient and carried the vibration. In this way we conditioned participants to associate a previously-neutral vibration with either a positive stimulus (a win) or an aversive stimulus (a loss). Participants then completed a MAB task questionnaire, followed by the shopping task (Study 2, but with 100ms vibration for item-adds) and final questionnaire battery.

Study 3's findings support that consumers in the vibration-win condition had significantly higher basket totals compared to the control group (MVibrationWinBasketTotal=$158.13; MVibrationLossBasketTotal=$126.37; F(1,213)=9.62, p<.01) and, in line with our theorizing, the effect of vibration condition on shopping basket total was mediated by how rewarding participants found the MAB task.

The current study demonstrates that mobile vibration is parsed as a reward that can systematically influence consumer choice. Our findings show that even when the touch modality is kept constant, mobile vibrations evoke shifts in consumer preference toward stimuli that are paired with a vibration. We further provide evidence a classic conditioning mechanism likely underlies vibration reward perception and its influence on consumer decision making. Together, our findings have important implications for the effective design of haptic human-machine interfaces in marketing and the role of vibro-tactile stimuli as a novel form of reward.

Consumer Responses to Haptic Sensing of Movement in Mobile Advertising

EXTENDED ABSTRACT

While consumers' prolific smartphone usage provides a fruitful advertising avenue, small screen and limited ad visibility present a challenge to marketers (Bart et al., 2014). One way to circumvent this shortcomings and exploit the handheld nature of smartphones is to utilize haptic feedback technology, which takes advantage of the sense of touch by applying vibrations to the user in synch with displayed movement and content (Brewster et al., 2007). In the marketplace, some brands have begun to distribute such "haptified" experiencd (e.g., mobile ads for Stoli vodka, users feel their phone vibrate when a woman shakes a cocktail; Johnson, 2015).

Importantly, unlike visual or auditory cues, tactile exchanges require direct contact with a stimulus (Peck, 2010). Touch is considered the most "proximal" sense (Montagu & Matson, 1979) and has an idiosyncratic capacity to evoke a sense of psychological closeness (Trope & Liberman, 2010). Computer science research suggests that "mediated social touch" is possible, where haptic feedback from devices symbolizes the touch of another person (Gallace & Spence, 2010; Haans et al., 2006).

Drawing from this interdisciplinary literature, we propose that haptic sensations experienced in a mobile phone advertisement can be perceived as a form of touch from the sender (i.e., the brand). Further, because haptic sensations are so uniquely associated with immediate proximity and contact, haptic feedback in advertising may have the ability to make these consumer-brand exchanges feel more engaging and personal, ultimately augmenting mobile advertising effectiveness. However, any positive effect of haptics will likely depend on the brand's characteristics since the source of haptic sensations plays an important role in their interpretation (Martin, 2012).

IPG Media Labs recruited 1,136 Android mobile phone users in the U.S. from an online panel (MedianAge = 25-34 years; 51.67% female). Participants took a mobile survey, ostensibly about video content of their choosing. Before viewing the selected video content, all participants were served one of four pre-roll advertisements, which were either haptically augmented or not. Several other factors were manipulated, including: density of the haptics (high versus low), the presence/absence of a "bumper" notifying participants they were experiencing haptics, whether or not the "bumper" was branded, and the ability to skip the ad or not. We accessed this dataset and analyzed it to test whether the effect of haptic augmentation was universal or contingent on the brand being advertised. To do so, we employed a logit specification to investigate customer's purchase intentions (Top Box and Second Box of purchase intentions were assigned a value of 1, as we did not have access to the continuous variable) as a function of haptic augmentation at the category level while controlling for gender (due to the nature of the categories) and advertisement evaluation (see details in Exhibit 1). We were also able to control for other properties of advertisements: (i) the density of haptic effects (ii) whether the ad was skippable, and if so, whether it was watched to its completion and, (iii) whether there was a branded bumper/notification at the beginning of the advertisement. Overall, we found that while the overall impact of haptics on purchase intention was positive and significant, a closer look revealed the effect only manifested for certain brands. The model also confirms (as suggested by IPG itself) that high haptic density and the possibility to skip the advertisement has a negative impact on purchase intentions, but that adding a notification of haptics generates a positive effect instead.

Notably, brands can differ not only in how familiar they are to consumers (Kent & Allen, 1994) but also in personality dimensions (Aaker 1997; differences in perceived brand warmth are particularly robust; Kervyn et al., 2012). We expect that haptic feedback delivered from warm brands will exert a positive effect on downstream consumer responses, whereas the same feedback delivered from unfamiliar or cold brands will not. We conducted a series of experiments to explore these predictions. All haptic effects were professionally integrated by a developer of haptic feedback technology.

Study 2 held brand familiarity constant, varied product category as a within-subjects variable, and manipulated brand warmth and haptics between-subjects. Study 3 (N=174) was a 2(Haptics: absent versus present) x 2(Brand Warmth: low versus high) x 2(Product Category: Insurance versus Retail) mixed-model design. Within a video reel, participants viewed two advertisements: one for a retailer and one for an insurance provider. In the high brand warmth condition, participants viewed advertisements for Target and Geico, and in the low brand warmth condition, participants viewed advertisements for Walmart and Allstate (all brands were selected based on pretest results). Afterwards, participants indicated their brand attitudes and those in the haptics-present conditions described how the haptic effects felt to them. A repeated-measures ANOVA revealed no significant main effect of haptics on brand attitude, but a significant interactive effect of haptics and brand warmth on brand attitude (F(1,170)=5.91, p<.02). Planned contrasts revealed that as expected, haptics had a positive effect on attitudes towards high-warmth brands (F(1,170)=3.83, p<.06) but not towards low-warmth brands. Notably, this pattern did not differ across product categories (F(1,170)=.06, p>.80). In the haptics-present condition, independent coders coded participants' description of how the haptics felt. We also found a significant effect of brand warmth on affective reactions to the haptic effects (F(1,72)=8.80, p<.01).

Study 3 examined the effect of haptic advertising on a consequential downstream variable: product choice. Participants (N=85) viewed one of two 30-second advertisements on mobile phones according to a 2 level (Haptics: absent versus present) between-subjects experimental design. The advertisement was for the chocolate brand Cadbury, which pre-test results revealed to be high in both familiarity and warmth. Afterwards, participants were offered a snack as a gift (either a Cadbury chocolate bar or an equivalently-sized cereal bar). Binary logistic regression results revealed a main effect of haptics on choice ($\chi2$=3.80, p=.05). Participants in the haptics-present condition were more likely to choose the chocolate than those in the haptics-absent condition (80% versus 59%, respectively).

This is the first academic research to explore the effects of haptic advertising on consumer responses. We investigate an intersection between haptic feedback and source characteristics allowing us to differentiate between the nature of the haptic sensation and its evaluative implications.

REFERENCES

Aaker, J. L. (1997). "Dimensions of brand personality." *Journal of Marketing Research*, 34 (August), 347-57.

Aiken, L. S., & West, S. G. (1991). *Multiple regression: Testing and interpreting interactions*, Newbury Park, CA: Sage.

Atienza, M., Crespo-Garcia, M., & Cantero, J. L. (2011). "Semantic congruence enhances memory of episodic associations: Role of theta oscillations." *Journal of Cognitive Neuroscience*, 23(1), 75–90.

Barsalou, Lawrence W. (2009). "Simulation, Situated Conceptualization, and Prediction," *Philosophical Transactions of the Royal Society B: Biological Sciences*, 364 (1521), 1281-89.

Bartsch, F., Hamuni, G., Miskovic, V., Lang, P. J., & Keil, A. (2015). "Oscillatory brain activity in the alpha range is modulated by the content of word-prompted mental imagery." *Psychophysiology*, *52*(6), 727–735.

Bart, Yakov, Andrew T. Stephen and Miklos Sarvary (2014). "Which products are best suited to mobile advertising? A field study of mobile display advertising effects on consumer attitudes and intentions," *Journal of Marketing Research*, 51(3), 270-285.

Berger, J., & Heath, C. (2007). "Where consumers diverge from others: Identity signaling and product domains". *Journal of Consumer Research*, 34(2), 121-134.

Borghi, Anna M. (2012), "Language Comprehension: Action, Affordances and Goals," in *Language and Action in Cognitive Neuroscience*, ed. Y. Corello and A. Bartolo, 125-43.

Brewster, Stephen, Faraz Chohan, and Lorna Brown (2007). "Tactile Feedback for Mobile Interactions," in *Proceedings of the SIGCHI Conference on Human Factors in Computing Systems*, ed. Mary B. Rosson and David Gilmore, New York, NY: ACM, 159-62.

Brough, A. R., Wilkie, J. E., Ma, J., Isaac, M. S., & Gal, D. (2016). "Is eco-friendly unmanly? The green-feminine stereotype and its effect on sustainable consumption." *Journal of Consumer Research*, 43(4), 567-582.

Dohi, I., Yamada, F., & Asada, H. (2001). "The relationship between masculinity and the Type A behavior pattern: The moderating effects of femininity." *Japanese Psychological Research*, 43(2), 83-90.

Drouin, M., Kaiser, D. H., & Miller, D. A. (2012). "Phantom vibrations among undergraduates: Prevalence and associated psychological characteristics." *Computers in Human Behavior*, 28(4), 1490–1496.

Esteky, S., Wineman, J. D., & Wooten, D. B. (2018). The Influence of Physical Elevation in Buildings on Risk Preferences: Evidence from a Pilot and Four Field Studies. *Journal of Consumer Psychology, 28*(3), 487-494.

Gallese, Vittorio (2009). "Motor Abstraction: A Neuroscientific Account of How Action Goals and Intentions Are Mapped and Understood," *Psychological Research*, 73 (4), 486-98.

Gallace, Alberto and Charles Spence (2010). "The Science of Interpersonal Touch: An Overview," *Neuroscience and Bio-behavioral Reviews*, 246–59.

Gittins, J., Glazebrook, K., & Weber, R. (2011). *Multi-armed bandit allocation indices*. John Wiley & Sons.

Gormezano, I., & Moore, J.W. (1966). *Classical conditioning. Experimental Methods and Instrumentation in Psychology*, 1, 385–420.

Guido, G., Pichierri, M., Nataraajan, R., & Pino, G. (2016). "Animated logos in mobile marketing communications: The roles of logo movement directions and trajectories." *Journal of Business Research, 69*(12), 6048-6057.

Haans, Antal and Wijnand IJsselsteijn (2006). "Mediated Social Touch: A Review of Current Research and Future Directions," *Virtual Reality*, 149–59.

Hadi, R., & Valenzuela, A. (2014). "A meaningful embrace: Contingent effects of embodied cues of affection." *Journal of Consumer Psychology*, 24(4), 520-532.

Hadi, R., & Valenzuela, A. (2019). "Good Vibrations: Consumer Responses to Technology-Mediated Haptic Feedback." *Journal of Consumer Research*, forthcoming.

Hamilton, Antonia F. de C. (2013). "The Mirror Neuron System Contributes to Social Responding," *Cortex*, 49 (10), 2957-59.

Hanslmayr, S., & Staudigl, T. (2014). "How brain oscillations form memories - A processing based perspective on oscillatory subsequent memory effects." *NeuroImage*, *85*, 648–655.

Hickok, Gregory and Marc Hauser (2010). "(Mis) Understanding Mirror Neurons." *Current Biology*, 20 (14), R593-R94.

Hoffman, R. M., & Borders, L. D. (2001). "Twenty-five years after the Bem Sex-Role Inventory: A reassessment and new issues regarding classification variability." *Measurement and Evaluation in Counseling and Development*, 34(1), 39-55.

Johnson, L. (October 29, 2015). "Stoli's Mobile Ads Let You Actually Feel a Cocktail Being Made in Your Hand." *Ad Week*. Retrieved from www.adweek.com

Kent, Robert J. and Chris T. Allen (1994). "Competitive Interference Effects in Consumer Memory for Advertising: The Role of Brand Familiarity," *Journal of Marketing*, 58(3), 97-105.

Kervyn, Nicolas, Susan T. Fiske, and Chris Malone (2012). "Brands as Intentional Agents Framework: How Perceived Intentions and Ability Can Map Brand Perception," *Journal of Consumer Psychology*, 22(2), 166–76.

Krishna, A., & Morrin, M. (2008). "Does touch affect taste? The perceptual transfer of product container haptic cues." *Journal of Consumer Research*, 34(6), 807-818.

Kwon, M., & Adaval, R. (2018). "Going against the flow: The effects of dynamic sensorimotor experiences on consumer choice." *Journal of Consumer Research*, 44(6), 1358-1378.

Labroo, A. A., & Nielsen, J. H. (2010). "Half the thrill is in the chase: Twisted inferences from embodied cognitions and brand evaluation." *Journal of Consumer Research*, 37(1), 143-158.

Montagu, Ashley, and Floyd W. Matson (1979). *The Human Connection*. St Louis, MO: McGraw-Hill.

Ostinelli, Massimiliano, David Luna, and Torsten Ringberg (2014). "When up brings you down: The effects of imagined vertical movements on motivation, performance, and consumer behavior." *Journal of Consumer Psychology, 24*(2), 271–283.

Peck, Joann (2010). "Does Touch Matter? Insights from Haptic Research in Marketing," in *Sensory Marketing: Research on the Sensuality of Products*, ed. Aradhna Krishna, New York, NY: Routledge, 17-31.

Papies, E. K., Barsalou, L. W., & Press, G. (2015). "Grounding desire and motivated behavior: A theoretical framework and review of empirical evidence." *The Psychology of Desire*, 36–60.

Pezzulo, Giovanni and Cristiano Castelfranchi (2009). "Thinking as the Control of Imagination: A Conceptual Framework for Goal-Directed Systems," *Psychological Research*, 73 (4), 559-77.

Roberts, J., Yaya, L., & Manolis, C. (2014). "The invisible addiction: Cell-phone activities and addiction among male and female college students." *Journal of Behavioral Addictions*, 3(4), 254–265.

Sahami, A., Holleis, P., Schmidt, A., & Häkkilä, J. (2008). "Rich tactile output on mobile devices." *European Conference on Ambient Intelligence*, 210–221. Springer.

Saket, B., Prasojo, C., Huang, Y., & Zhao, S. (2013). "Designing an effective vibration-based notification interface for mobile phones." *Proceedings of the 2013 Conference on Computer Supported Cooperative Work*, 149–1504. ACM.

Salehan, M., & Negahban, A. (2013). "Social networking on smartphones: When mobile phones become addictive." *Computers in Human Behavior*, 29(6), 2632–2639.

Sartori, Luisa, Giulia Bucchioni, and Umberto Castiello (2013). "When emulation becomes reciprocity," *Social Cognitive and Affective Neuroscience, 8*(6), 662–669.

Semin, Gün R. and John T. Cacioppo (2009), "From Embodied Representation to Co-Regulation," in *Mirror Neuron Systems*, ed. J.A. Pineda: Humana Press, 107-20.

Sivanathan, Niro and Nathan Pettit (2010),"Protecting the Self through Consumption: Status Goods as Affirmational Commodities,"*Journal of Experimental Social Psychology*,46(3),564-70.

Spencer, S. J., Zanna, M. P., & Fong, G. T. (2005). "Establishing a Causal Chain: Why Experiments Are Often More Effective than Mediational Analyses in Examining Psychological Processes." *Journal of Personality and Social Psychology*, 89(6), 845-851.

Streicher, M. C., & Estes, Z. (2016)."Multisensory interaction in product choice: Grasping a product affects choice of other seen products." *Journal of Consumer Psychology*, 26(4), 558-565.

Sundar, A., & Noseworthy, T. J. (2014). "Place the logo high or low? Using conceptual metaphors of power in packaging design." *Journal of Marketing, 78*(5), 138-151.

Trope, Yaacov and Nira Liberman (2010). "Construal-Level Theory of Psychological Distance," *Psychological Review, 117*(2), 440–63.

Wilmer, H. H., Hampton, W. H., Olino, T. M., Olson, I. R., & Chein, J. M. (2019). "Wired to be connected? Links between mobile technology engagement, intertemporal preference and frontostriatal white matter connectivity." *Social Cognitive and Affective Neuroscience*, 14(4), 367–379.

Zhang, Yan, and Jane L. Risen (2014). "Embodied Motivation: Using a Goal Systems Framework to Understand the Preference for Social and Physical Warmth," *Journal of Personality and Social Psychology*, 107(6), 965–977.

Self-Brand Connection in the Age of Technology

Chair: Claire Linares, HEC Paris, France

Paper #1: We Can Look Like Our Brands: Facial Appearance

Anne-Laure Sellier, HEC Paris, France
Claire Linares, HEC Paris, France

Paper #2: From Sweetheart to Scapegoat: Brand Selfie-taking Shapes Consumer Behavior

Reto Hofstetter, University of Lucerne, Switzerland
Gabriela Funk, University of Lucerne, Switzerland
Leslie John, Harvard Business School, USA

Paper #3: When and Why Metaphors Affect Consumer–Brand Relationships

Alberto Lopez, Tecnológico de Monterrey, Mexico
Martin Reimann, University of Arizona, USA
Raquel Castaño, Tecnológico de Monterrey, Mexico

Paper #4: Hands off My Brand: Strong Self-Brand Connection and Psychological Threat

Nari Yoon, Indiana University, USA
Mansur Khamitov, Nanyang Technological University, Singapore

SESSION OVERVIEW

Consumers live in a digitalized environment in which they experience brands both on- and offline. Extensive research has studied self-brand connection offline, the extent to which brands overlap with the self, arguing that brands can be part of the self (Belk 1988) and showing that brands help consumers enact their social identities (Escalas and Bettman 2003). Further research is needed, however, to investigate how self-brand connection can form, how it can affect consumers in powerful ways, and what prospects it can open in an increasingly technological world.

This session explores different facets of self-brand connection. How can self-brand connection be reflected in our self and in our actions? How can perceptions of self-brand connection arise? How is self-brand connection further shaped in our technological environment? The four papers provide insight into these questions and more. In particular, they should foster a discussion about the interplay between self-brand connection and different forms of technology, such as facial recognition, selfies, apps and electronic word-of-mouth.

First, at a time when facial recognition technologies are ever more precise and pervasive, Sellier and Linares investigate if brands that consumers are loyal to can manifest in their faces. They find support for a *face-brand matching effect*, whereby a social perceiver can accurately match a person's perfume brand to their face, above chance level. This means that we can look like our brands.

Next, Hofstetter, Funk, and John show how a benign act such as taking a selfie with a brand can trigger self-brand connection and in turn impact brand preference. Eight studies provide evidence that consumers' brand preference is increased after taking a selfie with it, even if the brand is of lower utility than the alternative. Consumers' self-inferences account for this effect.

In a field study, and using a new app transmitting relationship metaphors and tracking real-time behavior, Lopez, Reimann, and Castaño explore the role of self-brand connection in the influence of relationship metaphors (e.g., complete a puzzle and breaking something) on brand relationships. They show that in the presence (absence) of a brand transgression, a negative (positive) metaphor will decrease (increase) the strength of a consumer's brand relationship.

Finally, contributing to expanding research on online reviews and electronic word-of-mouth, Yoon and Khamitov share an unexpected finding regarding highly self-brand connected consumers. Although one might expect such consumers to generate positive word-of-mouth, they show that highly self-brand connected consumers feel psychologically threatened when the brand is used by others. In turn, psychological threat leads participants who do not want to share the brand to engage in negative word-of-mouth.

Overall, these papers demonstrate how self-brand connection can unfold in rapid and fundamental ways, and particularly resonates in this age of technology. We believe this session can create a rich discussion, hopefully renewing interest for research on this topic. This session is likely to attract researchers working on a broad array of topics, brands, identity, the self, but also technology, face perception, embodied cognition, metaphors or word-of-mouth.

We Can Look Like Our Brands: The Manifestation of Adopted Brands in Facial Appearance

EXTENDED ABSTRACT

Considerable branding research suggests that brands can evoke general brand user human age and/or body type stereotypes (e.g., a brand user is a grandfather, Belk, Bahn, and Mayer 1982; Absolut Vodka is a hip 25-year old, Aaker 1997) and that possessions actively contribute to our identities (e.g., Belk 1988; Berger and Heath 2007; Escalas and Bettman 2003). We ask the reverse question: can consumers' faces evoke the brands they are loyal to? If the bulk of research on facial appearance has focused on how it influences social perceptions (e.g., Ballew and Todorov 2007), recent research shows that social perceptions can shape facial appearance. In particular, Zwebner, Sellier, Rosenfeld, Goldenberg, and Mayo (2017) demonstrated that given names produce a face-name matching effect, the finding that both a social perceiver and a computer can accurately match a person's given name to their face, above chance level. Zwebner et al. (2017) pinpoint the existence of shared face-name stereotypes (e.g., Gordon and Tanaka 2011; Tanaka 2001) to explain the effect. They suggest that we live up to these stereotypes to meet the social expectations of how someone with our given name should look.

The present research examines whether brands that consumers are loyal to can similarly manifest physically in our faces. In three studies, we find support for a *face-brand matching effect*, whereby a social perceiver can accurately match a person's perfume brand to their face, above chance level. We propose that brands that consumers actively link to their identities may similarly manifest in their faces. Unlike given names, brands are social tags that individuals choose to embrace. Considerable research suggests that consumer identity (both actual and ideal) markedly influences the connection to brands (e.g., Escalas and Bettman 2003; Levy 1959; Malär et al. 2011; McCracken 1986) and that brands actively help consumers build their self-identities (e.g., McCracken 1989; Escalas and Bettman 2019). It is the resulting interdependence between consumers and their brands that leads to the development of a proper relationship (e.g., Fournier 1998). It may be, then, that after enough time in a brand relationship, consumers begin to look like a stereotype of the brand user, if only to signal to others around them that they "carry" the social identities enacted by the brand.

The repeated finding of a face-brand matching effect means that some evocation of the perfume brand we have been loyal to for a long time may get tattooed in our faces. This means that a social tag may show up in our face more rapidly than was known to date. A second possibility is that people choose brands because they look like the brand user stereotype ex ante and self-select into brands that they can more easily live up to.

This research focuses on the case of perfume brands, as perfume users symbolically identify with their fragrances (Aaker 1997; Belk 1988), particularly in France, where our data was collected (Statista 2017). In each study, female participants saw the headshots of 10 to 30 targets that they did not know prior to the study. For each headshot, participants chose, out of two perfume brands, the one they thought was the target's actual perfume: one brand was the target's true perfume, the other was a filler. We consistently found evidence of a face-brand matching effect: Across all headshots in each study, participants picked the targets' true perfumes above chance level (here, 50%). We extensively calibrated the stimuli to minimize confounds such as brand familiarity, the perfume brands' release dates, ethnicity, socioeconomic factors, target age and any difference between the target and filler brands that we used.

In study 1, we photographed the faces of 10 Caucasian women who had been loyally wearing a well-known perfume for at least four and up to 15 years. In this study, the photographs were framed to include the face, the shoulders and the beginning of the chest. We paired their true perfumes with fillers that were perceived as equivalently well-known. All the perfumes were from the high-end perfume market and were overall in an equivalent price range. Results from a *t* test and a logistic mixed-effect regression that accounts for the random selection of faces showed that participants found the targets' true perfumes significantly more than random chance (50%).

In study 2, we further controlled for differences related to the two perfume options and for age. Headshots were also more tightly framed on the oval of the face. We developed two sets of 10 headshots, such that each headshot in set A had a counterpart in set B for whom the true perfume was the filler option of set A. With this design, an intrinsic preference or any other difference between the true perfume and the filler that might have caused an accurate face-brand matching in set A is controlled for by having set B. In particular, pooling the accuracy rates of the two corresponding faces in sets A and B effectively controls for any bias linked to the perfume options themselves. Headshots were also paired to minimize the age difference. Across the two sets of headshots, participants guessed the true perfumes above chance, controlling for socioeconomic, age and preference factors, as well as familiarity and release dates of the perfumes.

Study 3 provided an identical and conceptual replication of study 2 on a total of 30 headshots. Participants first saw the 20 headshots of study 2 in two different orders. They then saw 10 extra headshots. Across the two orders, the face-brand matching effect held once again.

In summary, our studies repeatedly support the existence of a face-brand matching effect, whereby social perceivers can accurately match a person's actual perfume brand to a headshot of their face, above chance level. Critically for marketing, a contribution of this research is to show that our faces *alone* can evoke a brand user stereotype. On a practical level, facial recognition systems may be able to push certain brands as a result of an estimated good match with targeted consumers' faces in the not so distant future.

From Sweetheart to Scapegoat: Brand Selfie-taking Shapes Consumer Behavior

EXTENDED ABSTRACT

Increasingly, consumers are taking self-photos and marketers, eager to capitalize on this trend, routinely encourage consumers to take "brand-selfies"—self-photos with a brand logo or product from that brand in tow. Despite the pervasiveness of selfie-taking, and marketers' attempts to promote brand selfie-taking in particular, little is known about the effect of this behavior on the selfie-takers themselves.

We suggest that consumers' compliance with such requests sparks a self-inferential process that leads the consumer to feel connected to the brand (e.g., "If I took the brand selfie, I must feel connected to this brand"). We base this on self-perception theory which holds that people have a tendency to infer *who they are* by looking to their behavior (Bem 1967; Chaiken and Baldwin 1981; Fazio, Zanna, and Cooper 1977). The theory has already been useful in explaining many consumer behavioral and social phenomena (e.g., Grewal et al. 2019; Summers, Smith, and Reczek 2016; Xu, Shen, and Wyer 2012). Building on prior findings, we propose that taking a self-photo together with a brand can trigger self-inferences that increase self-brand connection. Prior work in consumer behavior indicates that, in turn, feeling connected or attached to a brand can foster positive behaviors toward the given brand, for example increased purchase intention (Whan Park et al. 2010). However, based on attribution theory (Festinger 1957; Heider 1958) we further suggest that when a consumer encounters a less-than-stellar image of herself in a brand selfie, instead of revising her impression of her own attractiveness (downward)—a threatening undertaking because it could be damaging for the ego—she may instead use the brand as a *scapegoat*, projecting her personal dissatisfaction onto the brand.

Eight studies support this account. In a dataset of 283,140 user reviews from Yelp, study 1 documented a positive association between a reviewer's propensity to take a brand selfie and the star rating he gives the restaurant.

Studies 2a to 2c establish causality. Study 2a tests brand selfie taking vs taking no photo whatsoever on purchase intention and studies 2b and 2c test whether it is specifically *brand* selfie-taking, and not simply taking a selfie (without the brand), that affects brand choice. In all three studies we find a positive and significant effect of brand selfie-taking over the control on brand preference.

Study 3 tests the specificity of the effect and rules out the possibility that the effect is driven by the higher exposure to the brand in the brand selfie-condition. Therefore, in study 3, we added an additional control condition, in which participants were instructed to simply take a photo of the brand (without the self). Participants were assigned to one of three photo-taking tasks: selfie with the brand (brand selfie), a selfie without the brand (selfie) or a photo of the brand in front of a neutral background (brand photo). We still find, that purchase intention is higher for the brand selfie-takers relative to the mere selfie-takers and to the mere brand photo-takers. And that the effect is fully mediated by self-brand connection (indirect effect = .35, SE = .13, 95% CI [.10, .62]).

Study 4 was preregistered and designed in order to provide process evidence via serial mediation. Participants were instructed to take either a brand selfie or a selfie, and to then report their intention to purchase that brand. Critically however, in addition to assessing self-brand connection as we did in studies 2a, 2c and 3, we also assessed participants' propensity to look to their selfie-taking behavior to make self-inferences. In line with our conceptual framework we find that self-inferences and self-brand connection serially mediated

the relationship between brand selfie-taking and purchase intention (indirect effect = .402, BootSE = .111, 95% CI = [.197, .634]).

In study 5, instead of measuring self-inferences as in study 4, we sought to manipulate them, by varying participants' facial expressions in their selfies. Specifically, participants were instructed to either have a negative expression on their face (e.g., frown), a positive expression (e.g., smile), or, in a control condition, were given no instruction on how to appear. This manipulation was crossed with our standard manipulation of selfie type (brand selfie vs. selfie). We predicted and found an interaction such that the facial expression manipulation affects purchase intention only among those in the brand selfie condition, and not among those assigned to simply take a selfie (without the brand). Particularly, self-brand connection mediates the effect of brand selfies on purchase intention for those in the positive expression condition (conditioned indirect effect = .550, BootSE = .131, 95%CI = [.296, .801]) and for those in the control condition (conditioned indirect effect = .191, BootSE = .075, 95% CI = [.045, .336]) but not for those in the negative expression condition (conditioned indirect effect = -.168, BootSE = .111, 95% CI = [-.385, .053]; index of moderated mediation = .359 BootSE = .096, 95% CI = [.170, .549]).

Finally, study 6 tests whether satisfaction with the selfie moderates its effect on self-brand connection. Participants again took a brand selfie or a selfie, and in addition to assessing self-brand connection and purchase intention we also assessed participants' satisfaction with the selfie. We find that the effect of brand selfies on self-brand connection is moderated by the level of selfie satisfaction, i.e., the positive effect of brand selfie-taking on brand preference is attenuated by dissatisfaction with one's selfie (index of moderated mediation = .16, BootSE =.075, 95% CI = [.011, .305]).

By testing how a new form of user-generated content affects self-brand connection formation we contribute to the literature on brand relationship formation and to the literature on consumer photo-taking experiences, and branded user-generated content.

With respect to practice, our investigation offers guidance to marketers on when and why encouraging consumers to take brand selfies may augment or detract from attempts to foster a consumer-brand connection. Our findings imply that marketers may be over-concerned with the appearance of the brand in the photo, and under-concerned with helping the consumer to feel satisfied with her own appearance.

When and Why Metaphors Affect Consumer–Brand Relationships

EXTENDED ABSTRACT

In the interaction between brands and consumers, metaphors with relationship-related meanings often appear (e.g., in slogans, brand names, logos). Moreover, metaphors seem to be increasingly used by consumers themselves (Reimann, Nuñez, and Castaño 2017).

However, despite their common usage, it is unclear how exactly relationship-related metaphors affect consumer–brand relationships. Indeed, the extant literatures in psychology, linguistics, and consumer research are inconclusive regarding whether metaphors affect consumer–brand relationships. Classic views insist that metaphors represent the one universal way in which both language (Hawkes 1972; MacCormac 1985) and marketing (Bremer and Moonkyu 1997; Fournier 1998) work. However, recent investigations imply that the effectiveness of metaphors is uncertain (Landau, Meier, and Keefer 2010). We focus on *positive metaphors* associated with starting/maintaining a romantic relationship (i.e., the behavioral act

of "putting something together") and *negative metaphors* associated with ending a romantic relationship (i.e., the behavioral act of "breaking something"). We hypothesize that relationship metaphors' effect on consumer–brand relationships is contingent on the (non-)occurrence of a brand transgression, in that positive (negative) relationship metaphors affect the relationship only in the absence (presence) of a transgression. Furthermore, we hypothesize that the inclusion of a brand in the self mediates the relationship.

Study 1

We relied on archival data by scraping 1,000 reviews from the best-selling products on Amazon.com. Of these reviews, 418 were classified as containing metaphorical speech, in which consumers frequently utilized positive metaphors such as "[this brand] and I make a better couple than me and my boyfriend" and "I could marry [this brand]," as well as negative metaphors such "I am breaking up with [this brand]." Our data show that consumers actively and extensively use metaphors when referring to their brand-relationships.

Study 2

Study 2 employed a 3 (metaphor: positive, negative, absent) × 2 (brand transgression: present, absent) experimental design, with metaphor and brand transgression as between-subjects independent variables and brand relationship strength as dependent variable. A new brand called snapholio, a virtual portfolio app, was developed. After giving informed consent, 196 participants were randomly assigned to one of the six conditions. Participants in the brand transgression present conditions had to endure brand-transgressive events involving severe failures of the app. Participants in the negative metaphor condition were shown images of broken things and asked to write about times when they had broken something. Participants in the positive condition were asked to complete a series of simple puzzle tasks. Participants in the control condition were shown a neutral image and asked to write about their day (Larson and Billetera 2013; Marin, Reimann, and Castaño 2014). To measure brand relationship strength, we employed an established scale (Aaker et al. 2004), which was measured five times (T1-T5). Inclusion of brand in self was measured employing an established brand inclusion Venn diagram (Reimann et al. 2012). Data were submitted to a two-way repeated-measures ANOVA. Results revealed a significant interaction effect between metaphor and brand transgression on brand relationship strength, $F(2, 185) = 7.27$, $p < .01$, $\eta p2 = .073$. Direct effects of metaphor, $F(2, 185) = 20.70$, $p < .001$, $\eta p2 = .18$, and brand transgression, $F(1, 185) = 572.98$, $p < .001$, $\eta p2 = .76$ were also significant. At T1, all conditions were the same (baseline). At T2-T4, it was systematically found that the effect of relationship metaphors on consumer–brand relationships is contingent on the (non-)occurrence of a brand transgression, in that positive (negative) relationship metaphors affect the relationship only in the absence (presence) of a transgression (all p's of contrasts < .05). To test whether our hypothesized effects were short-lived or long-lasting, we collected additional measures (T5) four days after having the app was no longer required, revealing that metaphors have a lasting effect on consumers' brand relationships. Furthermore, in the presence of a brand transgression, only 13% of participants in the negative metaphor condition chose to share the brand (vs. 41%) p < .05. In the absence of a brand transgression, 42% of participants in the positive metaphor condition shared the brand (vs. 31%), p < .05. We also assessed whether or not participants had kept the app on their phones. In the presence of a brand transgression, only 9% of participants in the negative metaphor condition kept it (vs. 31%) p < .05. In the absence of a brand transgression, 73% of participants in the positive

metaphor condition kept it (vs. 47%) p < .05. Following mediation-testing guidelines by Hayes and Preacher (2014), we constructed three regression models that support our hypothesis that the inclusion of brand in self mediates the relationship.

Study 3

The goal of Study 3 was to test the effect of metaphors when consumers actively write (vs. are merely exposed to) metaphorical reviews. We employed the same measures as in Study 2. We presented participants with a positive or negative hypothetical brand interaction (Park and John 2018). Participants in the negative (positive) metaphor condition were instructed to write a metaphorical review of the brand using words like *break*, *breaking*, and *broken* (*match*, *matching*, and *together*). Data were submitted to an analysis of variance. Results revealed an interaction effect between metaphor and brand transgression on brand relationship strength, $F(1, 178) = 2.36$, $p < .09$, $\eta_p^2 = .026$. The direct effects of both metaphor, $F(1, 178) = 6.59$, $p < .01$, $\eta_p^2 = .071$, and brand transgression, $F(1, 178) = 34.68$, $p < .001$, $\eta_p^2 = .17$, were significant. The results suggest that the effect of metaphors on consumer–brand relationships holds regardless of the mode of exposure.

General discussion

In summary, across different methods (i.e., lab, longitudinal field experiment, archival study) and different dependent variables (i.e., psychometric measures, actual behaviors, written accounts from online reviews), the present research not only demonstrates that relationship metaphors depend on the (non-)occurrence of brand transgression in order to influence consumer–brand relationships but also provides insight into the mechanism underlying this effect. Our empirical investigations illustrate that the inclusion of the brand in the consumers' self represents a key explanation for the role of metaphors in consumer–brand relationships.

Hands off My Brand: Strong Self-Brand Connection and Psychological Threat

EXTENDED ABSTRACT

The dominant paradigm in the consumer-brand relationships research stream suggests that when consumers love the brand, they will do everything in their power to influence others to consider or buy the brand and happily spread positive word-of-mouth (WOM) about it (Batra et al. 2012; Fournier 1998; Park et al. 2010). The current work proposes that this may not always be the case. Specifically, we pose that when some consumers exhibit elevated self-brand connection (SBC), they would instead be more likely to willingly engage in negative WOM and feel unhappy about others trying the brand. We theorize that this "brand for me and not for you" effect should be driven by perceived psychological threat generated by the prospect of other consumers using the 'coveted' brand. That is, building on the self-expansion theoretical account (Aron et al. 1992; Reimann and Aron 2009), we anticipate that when highly self-brand connected consumers engage in self-expansion of their self-concept, once they deeply incorporate the brand into the sense of self, the prospect of other consumers trying the brand should result in a sense of psychological threat. This should in turn make such consumers more willing to engage in negative WOM, make them feel less happy, and prefer to selfishly keep the brand for themselves.

Experiment 1 assessed consumers' reactions to others using the brand which they got primed to perceive high connection with. Online participants (N=206) were asked to imagine that they have been using Rondo, a diary notebook brand. In high SBC condition, Rondo was framed very special to them personally because they have been using it for a long time since they received it from their grandparents, and because it fits their personal values very well. In control condition, the scenario did not reference SBC but mentioned they like the brand very much. We measured participants' psychological threat when Rondo is used by others. As predicted, participants who have a high SBC (vs. control) felt their bond with the brand is threatened (M_{sbc}=2.71 vs. $M_{control}$=2.15, p=.042) and their sense of identity was endangered (M_{sbc}=2.79 vs. $M_{control}$=2.06, p=.008). Importantly, there was no effect of uniqueness seeking (p=.18), ruling out the alternative explanation that people feel threatened because usage by others may take away their uniqueness.

Experiment 2 extended experiment 1 to real brands and examined whether consumers' perceived psychological threat translates into negative behavioral intentions. Students (N=358) wrote either about a brand which they like so much that they do not want to share with others (not share) or a brand they like so much (control). In addition to perceived psychological threat items (4 items, α=.903), we measured consumers' intention to say something negative about the brand just to make sure others do not try it. Participants in the not share condition exhibited greater psychological threat (M=2.25) compared to the control condition respondents (M=1.56; p<.001). Additionally, participants showed greater intention to spread negative WOM when they recalled the brand they did not want to share ($M_{not\ share}$=1.82 vs. $M_{control}$=1.48, p=.008). Mediation results revealed participants experienced greater psychological threat from sharing the brand which they like so much that they do not want to share versus the brand they simply like, which in turn led to greater negative WOM intentions (B=.36; 95% CI: .22, .52).

Experiment 3 extended our findings beyond physical possessions and examined feelings of happiness associated with sharing. Online participants (N=204) read a scenario about a café named Janko's that they either perceive high connection with or they enjoy visiting. Strong SBC consumers were marginally less likely to feel happy if others visit their café (M=5.88) compared to participants in the "enjoy visiting the café" condition (M=6.22; p=.055). Interestingly, participants felt less happy if their acquaintances (M_{sbc}=5.66 vs. $M_{control}$=5.99, p=.074) or random strangers (M_{sbc}=4.95 vs. $M_{control}$=5.49, p=.020) started going to Janko's, but it did not bother them if their family (p=.83) or friends (p=.74) started going there. This suggests interpersonal proximity plays a potential role.

We contribute to the literature on consumer-brand relationships (Fournier 1998; Escalas 2004; Khamitov et al. 2019). While the predominant paradigm within this research stream suggests that consumers who have a strong brand relationship would go to great lengths to support their favored brands and thus should be encouraged to become public brand advocates, our findings imply that high SBC individuals are likely reluctant to spread positive WOM to the extent that the prospect of other consumers laying hands on their brand comes across as threatening. While the extant literature tends to view high SBC levels as an invaluable asset (Escalas 2004; Escalas and Bettman 2003, 2005), the present research underscores an instance where typical benefits of high SBC are unlikely to accrue and instead may reverse. Last but not the least, our work adds a nuance to the brand community research stream (McAlexander et al. 2002; Muniz and O'Guinn 2001) by providing a conceptual and empirical account of what can be construed as the opposite notion of brand community where instead of a shared brand-enabled bond consumers appear to harbor a rather selfish and egoistic SBC they want to keep for themselves.

Prior WOM research established that when consumers feel favorably toward a product or a service, a number of them exhibit a

tendency to leave positive reviews, encourage their friends and acquaintances to give it a try, and put in a good word (Berger 2014; Lovett et al. 2013; Moore and Lafreniere 2020). Mapping our results on this literature, the findings nuance some of the WOM work by providing a type of boundary condition wherein instead of engaging in increased WOM, consumers with strongly favorable product and service opinions are actually engaging in more negative WOM. Lastly, we contribute to the related consumer research on secrecy (Rodas and Roedder John 2020; Thomas and Jewell 2019) that has largely focused on the desire to maintain secrecy before, during, or after consumption. To this end, our findings reinforce the value and importance of studying phenomena wherein consumers would rather keep their consumption objects private and for themselves.

REFERENCES

Session Overview

Belk, Russell W. (1988), "Possessions and the Extended Self," Journal of Consumer Research, 15(2), 139–168.

Escalas, Jennifer E. and James Bettman (2003), "You Are what They Eat: The Influence of Reference Groups on Consumers' Connections to Brands," Journal of Consumer Psychology, 13(3), 339–348.

We Can Look Like Our Brands: The Manifestation of Adopted Brands in Facial Appearance

Aaker, Jennifer L. (1997), "Dimensions of Brand Personality," Journal of Marketing Research, 34(3), 347–356.

Ballew, Charles C. and Alexander Todorov (2007), "Predicting Political Elections from Rapid and Unreflective Face Judgments," Proceedings of the National Academy of Sciences of the United States of America, 104(46), 17948–17953.

Belk, Russell W. (1988), "Possessions and the Extended Self," Journal of Consumer Research, 15(2), 139–168.

Belk, Russell W., Kenneth D. Bahn, and Robert N. Mayer (1982), "Developmental Recognition of Consumption Symbolism," Journal of Consumer Research, 9(1), 4–17.

Berger, Jonas and Chip Heath (2007), "Where Consumers Diverge from Others: Identity Signaling and Product Domains," Journal of Consumer Research, 34(2), 121–134.

Escalas, Jennifer E. and James Bettman (2003), "You Are what They Eat: The Influence of Reference Groups on Consumers' Connections to Brands," Journal of Consumer Psychology, 13(3), 339–348.

—————— and ——————— (2019), "Connecting With Celebrities: How Consumers Appropriate Celebrity Meanings for a Sense of Belonging," Journal of Advertising, 46(2), 297-308.

Fournier, Susan (1998), "Consumers and Their Brands: Developing Relationship Theory in Consumer Research," Journal of Consumer Research, 24(March), 343-373.

Gordon, Iris and James W. Tanaka (2011), "Putting a Name to a Face: The Role of Name Labels in the Formation of Face Memories," Journal of Cognitive Neuroscience, 23(11), 3280–3293.

Levy, Sidney J. (1959), "Symbols for Sale," Harvard Business Review, 37 (4), 117–24.

Malär, Lucia, Harley Krohmer, Wayne D. Hoyer, and Bettina Nyffenegger (2011), "Emotional Brand Attachment and Brand Personality: The Relative Importance of the Actual and the Ideal Self," Journal of Marketing, 75(July), 35-52.

McCracken, Grant (1986), "Culture and Consumption: A Theoretical Account of the Structure and Movement of the Cultural Meaning of Consumer Goods," Journal of Consumer Research, 13(June), 71–84.

——————— (1989), "Who Is the Celebrity Endorser? Cultural Foundations of the Endorsement Process," Journal of Consumer Research, 16(3), 310–21.

Statista (2017), "Vous Personnellement, Portez-Vous du Parfum? [Do You Personally Wear Perfume?]," Retrieved from https://fr.statista.com/statistiques/708172/utilisation-parfum-france/

Tanaka, James W. (2001), "The Entry Point of Face Recognition: Evidence for Face Expertise," Journal of Experimental Psychology: General, 130(3), 534–543.

Zwebner, Yonat, Anne-Laure Sellier, Nir Rosenfeld, Jacob Goldenberg and Ruth Mayo (2017), "We Look Like our Names: The Manifestation of Name Stereotypes in Facial Appearance," Journal of Personality and Social Psychology, 112(4), 527–554.

From Sweetheart to Scapegoat: Brand Selfie-taking Shapes Consumer Behavior

Bem, Daryl J. (1967), "Self-Perception: An Alternative Interpretation of Cognitive Dissonance Phenomena," Psychological Review, 74(3), 183-200.

Chaiken, Shelly and Mark W. Baldwin (1981), "Affective-Cognitive Consistency and the Effect of Salient Behavioral Information on the Self-Perception of Attitudes," Journal of Personality and Social Psychology, 41(1), 1-12.

Fazio, Russell H., Mark P. Zanna, and Joel Cooper (1977), "Dissonance and Self-Perception: An Integrative View of Each Theory's Proper Domain of Application," Journal of Experimental Social Psychology, 13(5), 464-79.

Festinger, Leon (1962), A Theory of Cognitive Dissonance, Stanford, CA: Stanford University Press.

Grewal, Lauren, Jillian Hmurovic, Cait Lamberton, and Rebecca Walker Reczek (2019), "The Self-Perception Connection: Why Consumers Devalue Unattractive Produce," Journal of Marketing, 83(1), 89-107.

Heider, Fritz (1958), "The Naive Analysis of Action," in The Psychology of Interpersonal Relations, Hoboken, NJ: Wiley, 79–124.

Park, C. Whan, Deborah J. MacInnis, Joseph Priester, Andreas B. Eisingerich, and Dawn Iacobucci (2010), "Brand Attachment and Brand Attitude Strength: Conceptual and Empirical Differentiation of Two Critical Brand Equity Drivers," Journal of Marketing, 74(6), 1-17.

Summers, Christopher A., Robert W. Smith, and Rebecca Walker Reczek (2016), "An Audience of One: Behaviorally Targeted Ads as Implied Social Labels," Journal of Consumer Research, 43(1), 156-78.

Xu, Jing, Hao Shen, and Robert S. Wyer Jr. (2012), "Does the Distance Between us Matter? Influences of Physical Proximity to Others on Consumer Choice," Journal of Consumer Psychology, 22(3), 418-23.

When and Why Metaphors Affect Consumer–Brand Relationships

Aaker, Jennifer, Susan Fournier, and Adam Brasel (2004), "When Good Brands Do Bad," Journal of Consumer Research, 31(1), 1–16.

Bremer, Kristine and Lee Moonkyu (1997), "Metaphors in Marketing: Review and Implications For Marketers," Advances in Consumer Research Volume, 24(1), 419–424.

Fournier, Susan (1998), "Consumers and Their Brands: Developing Relationship Theory in Consumer Research," Journal of Consumer Research, 24(4), 343–53.

Hawkes, Terence (1972), "Metaphor," London: Methuen and Co.

Hayes, Andrew F. and Kristopher J. Preacher (2014), "Statistical Mediation Analysis with a Multicategorical Independent Variable," British Journal of Mathematical and Statistical Psychology, 67(3), 451–470.

Landau, Mark J., Brian P. Meier, and Lucas A. Keefer (2010), "A Metaphor-Enriched Social Cognition.," Psychological Bulletin, 136(6), 1045–1067.

Larson, Jeffrey S. and Darron M. Billetera (2013), "Consumer Behavior in 'Equilibrium': How Experiencing Physical Balance Increases Compromise Choice," Journal of Marketing Research, 50(4), 535–547,

MacCormac, Earl (1985), "A Cognitive Theory of Metaphor," Cambridge, MA: MIT Press.

Marin, Alex, Martin Reimann, and Raquel Castaño (2014), "Metaphors and Creativity: Direct, Moderating, and Mediating Effects," Journal of Consumer Psychology, 24(2), 290–297.

Park, Ji Kyung and Deborah Roedder John (2018), "Developing Brand Relationships after a Brand Transgression: The Role of Implicit Theories of Relationships," Journal of the Association for Consumer Research, 3(2), 175–187.

Reimann, Martin, Raquel Castaño, Judith Zaichkowsky, and Antoine Bechara (2012), "How We Relate to Brands: Psychological and Neurophysiological Insights into Consumer-Brand Relationships," Journal of Consumer Psychology, 22(1), 128–142.

Reimann, Martin, Sandra Nuñez, and Raquel Castaño (2017), "Brand-Aid," Journal of Consumer Research, 44(3), 673–691.

Hands off My Brand: Strong Self-Brand Connection and Psychological Threat

Aron, Arthur, Elaine N. Aron, and Danny Smollan (1992), "Inclusion of Other in the Self Scale and the Structure of Interpersonal Closeness," Journal of Personality and Social Psychology, 63(4), 596-612.

Batra, Rajeev, Aaron Ahuvia, and Richard P. Bagozzi (2012), "Brand Love," Journal of Marketing, 76(2), 1-16.

Berger, Jonah (2014), "Word of Mouth and Interpersonal Communication: A review and Directions for Future Research," Journal of Consumer Psychology, 24(4), 586-607.

Escalas, Jennifer E. (2004), "Narrative Processing: Building Consumer Connections to Brands," Journal of Consumer Psychology, 14(1-2), 168-180.

Escalas, Jennifer E. and James R. Bettman (2003), "You Are what They Eat: The Influence of Reference Groups on Consumers' Connections to Brands," Journal of Consumer Psychology, 13(3), 339-348.

Escalas, Jennifer E. and James R. Bettman (2005), "Self-Construal, Reference Groups, and Brand Meaning," Journal of Consumer Research, 32(3), 378-389.

Fournier, Susan (1998), "Consumers and Their Brands: Developing Relationship Theory in Consumer Research," Journal of Consumer Research, 24(4), 343-373.

Khamitov, Mansur, Xin (Shane) Wang, and Matthew Thomson (2019), "How Well Do Consumer-Brand Relationships Drive Customer Brand Loyalty? Generalizations from a Meta-Analysis of Brand Relationship Elasticities," Journal of Consumer Research, 46(3), 435-459.

Lovett, Mitchell J., Renana Peres, and Ron Shachar (2013), "On Brands and Word of Mouth," Journal of Marketing Research, 50(4), 427-444.

McAlexander, James H., John W. Schouten, and Harold F. Koenig (2002), "Building Brand Community," Journal of Marketing, 66(1), 38-54.

Moore, Sarah G. and Katherine C. Lafreniere (2020), "How Online Word-of-Mouth Impacts Receivers," Consumer Psychology Review, 3(1), 34-59.

Muniz, Albert M. and Thomas C. O'guinn (2001), "Brand Community," Journal of Consumer Research, 27(4), 412-432.

Park, C. Whan, Deborah J. MacInnis, Joseph Priester, Andreas B. Eisingerich, and Dawn Iacobucci (2010), "Brand Attachment and Brand Attitude Strength: Conceptual and Empirical Differentiation of Two Critical Brand Equity Drivers," Journal of Marketing, 74(6), 1-17.

Reimann, Martin and Arthur Aron (2009), "Self-Expansion Motivation and Inclusion of Brands in Self: Toward a Theory of Brand Relationships," in Handbook of Brand Relationships, ed. Deborah J. MacInnis, C. Whan Park, and Joseph R. Priester (pp. 87-103), Armonk, NY: M. E. Sharpe.

Rodas, Maria A. and Deborah Roedder John (2020), "The Secrecy Effect: Secret Consumption Increases Women's Product Evaluations and Choice," Journal of Consumer Research, forthcoming.

Thomas, Veronica L. and Robert D. Jewell (2019), "I Can't Get You Out of My Head: The Influence of Secrecy on Consumers' Self-Brand Connections," Journal of Consumer Psychology, 29(3), 463-471.

Consumers and Politics: When Companies Take a Stance

Chair: Rhia Catapano, University of Toronto, Canada

Paper #1: Political Neutrality Aversion: When and Why 'Staying Out of It' Backfires

    Ike Silver, University of Pennsylvania, USA
    Alex Shaw, University of Chicago, USA

Paper #2: Chasing Political Review Storms

    Johannes Boegershausen, University of Amsterdam, The Netherlands
    Jared Watson, New York University, USA

Paper #3: The Changing Face of America: When Majority Group Consumers Prefer vs. Are Threatened By Ethnic Diversity in Advertising

    Steven Shepherd, Oklahoma State University, USA
    Tanya L. Chartrand, Duke University, USA
    Gavan J. Fitzsimons, Duke University, USA
    Aaron C. Kay, Duke University, USA

Paper #4: Support or Oppose? The Effects of Political Attitude Framing on Sharing Behavior

    Rhia Catapano, University of Toronto, Canada
    Zakary Tormala, Stanford University, USA

SESSION OVERVIEW

More and more, firms are taking public stances on political and social issues. In the past few years, Nike created an ad campaign centered around Colin Kaepernick, Dick's Sporting Goods and Delta publicly severed ties with the NRA, and dozens of CEOs from major companies made public statements opposing the 2017 immigration ban. Although firms have always been involved in politics, it has traditionally been behind the scenes (Lawton McGuire, and Rajwani 2013), rather than in public. Moreover, there is little precedent for firms taking stances on political and social issues that are not directly relevant to the firm's value proposition. For this reason, little is known about how taking a stance impacts consumer behavior. Do firms benefit from taking public political stances? What happens when firms do choose to take a stance? And, when they do choose to take a stance, how can they maximize the impact on consumers?

Our session sheds light on these questions. Paper 1 (Silver and Alex Shaw) explores why it may be beneficial for firms to take political stances, even at the risk of alienating some consumers. They find that despite its intuitive appeal, remaining neutral can harm trust, even relative to outright opposition. This effect occurs because consumers interpret neutrality as concealed opposition and therefore as a dishonest impression management tactic.

The next two papers explore what happens when companies do take a stance. Paper 2 (Boegershausen and Watson) focuses on what happens to reviews after a brand takes a political stance. They find that the resulting political review storms include reviews from supporters and opposers, leading to a set of reviews that provide very little information diagnostic of product quality. The authors investigate the downstream consequences for the brand involved, exploring the differential effects on liberals and conservatives. Paper 3 (Shepherd, Chartrand, Fitzsimons, and Kay) focuses on the impact of political ideology on how consumers respond to advertising that implicitly represents a political stance. Specifically, they find that conservative (liberal) ideology is associated with more negative (positive) attitudes and behavioral intentions when ads feature ethnic diversity/non-White actors. Symbolic threat (seeing the ethnic group as a threat to culture/values), product status, and actor-product fit mediate this effect.

Finally, Paper 4 (Catapano and Tormala) explores how companies should frame their stances in order to maximize impact. They find that consumers believe that expressing attitudes in terms of support, rather than opposition, is more expressive of their values, and will lead to more liking from others. Thus, when brands talk about the policies they support, rather than policies they oppose, consumers are more likely to propagate these messages through sharing.

Together, these papers provide multiple perspectives and enhance our understanding of when, why, and how, companies should weigh in on political issues in order to maximize benefits to their brand. Whereas limited research to date has explored the emerging trend of companies weighing in on political issues, the work presented in this session begins to address this gap, enhancing our understanding of consumers in a changing world.

Political Neutrality Aversion: When and Why 'Staying Out of It' Backfires

EXTENDED ABSTRACT

Business leaders, celebrities, and politicians wield significant influence over many facets of life, from the laws that pass to the products and ideas that spread. However, public figures derive much of their power from public opinion and consumer support. How do consumers decide whom to trust, buy from, or vote for?

One important consideration is a public figure's commitment to social causes. Indeed, consumers increasingly care where public figures and the organizations they represent stand on hot-button issues like abortion, climate change, and immigration, and they will boycott, condemn, and punish actors who take positions they deem unacceptable (Haidt 2012; Skikta 2010). Perhaps as a result, public figures frequently choose to remain neutral when asked to weigh in on such issues, citing the merits of each side or expressing a preference not to get involved at all (Shaw et al. 2017).

This paper explores how consumers react to political neutrality. We propose that despite its intuitive appeal, remaining neutral often resembles a 'false signal' (Jordan and Bloom 2017), which can undermine trust and erode support.

When public figures express political neutrality, consumers frequently have information about their intended audience (e.g., viewers of a particular media outlet, constituents from a particular political party). We hypothesize that this audience information can shift how neutrality is interpreted in predictable ways. Specifically, we predict that remaining neutral in front of a more liberal audience will signal underlying conservative convictions and vice versa.

Moreover, to the extent that expressing neutrality over a divisive issue seems like a form of strategic non-disclosure (John, Barasz, and Norton 2016), neutral public figures may seem insincere, dishonest, and untrustworthy. Indeed, remaining neutral (and signaling concealed opposition) may harm trust even relative to opposing a consumers' viewpoint directly, a phenomenon we term *political neutrality aversion*.

Study 1 (n=301) sought to demonstrate that audience information predictably shapes how expressions of neutrality are interpreted. Participants read one of three stimulus-sampled vignettes which each described a public figure expressing neutrality in a public forum. Between-subjects, we manipulated whether the actor was speaking to

a predominantly liberal or a predominantly conservative audience. Participants were then asked to make attributions about the neutral actor's personal beliefs on scales from -3 (holds strongly liberal beliefs) to +3 (holds strongly conservative beliefs). As predicted, we found a main effect of audience (F(1,295)=111.14, p<.001), such that participants believed an identical expression of neutrality to be concealing conservative beliefs when addressing a liberal audience, and liberal beliefs when addressing a conservative audience. This effect held separately in each vignette-condition (ps<.001).

Studies 2a-b (n=187, n=300) replicated the belief inference effects from Study 1 with real press video clips of public figures (A member of the Backstreet Boys, the owner of the Kansas City Chiefs) expressing neutrality in live answers to reporters' questions about divisive political issues (support for President Trump, NFL players kneeling during the national anthem). We again manipulated the actor's audience by describing the reporter in each clip as being from either a conservative or a liberal news outlet. Once again, participants saw neutrality as signaling conservative beliefs when addressing a liberal audience and vice versa (2a: t(185)=1.91, p=.058; 2b: t(298)=6.15, p<.001). Moreover, participants who agreed with the speaker's audience (and thus inferred that the neutral actor tacitly opposed their viewpoint) reported that they would find him *more* trustworthy if he had *explicitly* opposed their viewpoint instead of remaining neutral (3-item trust scale, αs>.75: -3: Much less trustworthy to +3: Much more trustworthy; 2a: t(96)=2.67, p=.009; 2b: t(146)=1.92, p=.057; vs. scale midpoint).

Study 3 (pre-registered, n=541) sought to demonstrate that neutrality harms trust, but only when it resembles strategic concealment, and not when it signals sincere middle-ground beliefs. Participants read a scenario in which a prominent businesswoman is asked to weigh in on immigration policy at a press conference. In all conditions, we described the businesswoman's audience as holding the same views on the issue as the participant. This time, we manipulated whether the businesswoman remains neutral (*public neutrality condition*) or sides against her audience (and the participant) outright (*opposition condition*). We also included a third condition in which the businesswoman remains neutral in public at the press conference, but later expresses a neutral viewpoint in private to her spouse (*private neutrality condition*). As predicted, public neutrality signaled concealed opposition, but private neutrality did not (F(2, 522)=114.44, p<.001). In turn, public neutrality was seen as less trustworthy than both outright opposition (t(347)=12.09, p<.001) and private neutrality (t(347)=10.61, p<.001).

Study 4 (pre-registered, n=600) aimed to examine neutrality's effects on trust in an incentive-compatible economic game. Participants first indicated their views about gun control in a forced binary choice and shared these beliefs with a partner. We manipulated whether the partner (a confederate) then signaled back agreement, opposition, or neutrality (a preference not to take sides). Finally, participants rated attitudinal trust (3-item scale, α>.9) and played an incentivized prisoner's dilemma game. Participants judged neutrality to be substantially less trustworthy than outright opposition (t(396)=6.98, p<.001). Additionally, although participants were significantly more likely to cooperate when their partner signaled ideological agreement (90% cooperation), they were no more likely to cooperate with a neutral partner (70%) than with one who opposed them outright (73%; Neutrality vs. Opposition: p>.5).

Finally, Study 5 (n=190) investigated whether participants would intuit neutrality's costs when asked to weigh in on a political issue themselves. They largely did not. Participants in a business school's behavioral lab were told to imagine that they were running for a leadership position in an organization and that they disagreed

with the majority of their peers on a divisive political issue. When asked which approach would effectively win trust and support from peers, the majority chose 'remain neutral' (66.8%), more than 'side-against' (24.2%) and 'side-with' combined (9.0%; p<.001).

Together, these studies illuminate the surprising costs of remaining neutral, and they reveal an attribution process which incentivizes side-taking and may ultimately instigate polarization. Furthermore, actors who do choose to remain neutral on important social issues may be inadvertently mismanaging their reputations.

Chasing Political Review Storms

EXTENDED ABSTRACT

Today, brands who take a political stance may receive reviews from supporters and opposers, resulting in a political review storm that provides the consumer very little information diagnostic of product quality. For example, a bakery in Colorado refused to bake a wedding cake for a same-sex couple resulting in a flood of 1-star reviews from liberals and 5-star reviews from conservatives (Gajanan 2018). Utilizing the accessibility-diagnosticity framework (Feldman and Lynch 1988) and moral foundations theory (Graham, Haidt, and Nosek 2009), we propose that liberals and conservatives will differentially respond to political review storms. While reviews are generally helpful in forming product quality inferences, like other attributes (Rao and Monroe 1989), we propose that product quality is not the only attribute that matters amidst a political review storm. Our theorizing suggests that liberals will attempt to utilize both product quality information and a brand's political ideology to form their decisions, whereas conservatives will rely on the brand's political ideology. To reconcile their need for ingroup loyalty, the review voice (i.e., is it written by a liberal or conservative) will lead conservatives to discount the credibility of reviews written by liberals. On the other hand, liberals will recognize the bias in both review voices as they sift through the reviews for diagnostic quality information. Across three studies, we begin by demonstrating the effect of political review storms on perceived review credibility, then ultimately the consequence of this on brand intentions.

Study 1 (N = 327) employed a 2(review voice: liberal, conservative) x 2(political ideology: liberal, conservative), between-subjects design. Participants were randomly assigned to the reviews factor and we measured their ideology with the item "with which political party do you most closely identify?". Participants were asked to view the information for a bakery on Yelp. The business was framed as being conservative and this was revealed through the voice manipulation. Review voice was manipulated with reviews that mentioned claims like "can't believe they support a conservative agenda [1-star]" (liberal voice) or "proud to have a local business fight back against corruptive liberal ideologies [5-star]" (conservative voice). When it came to the perceived review credibility, a 2x2 ANOVA yielded a significant interaction (F(1,323) = 28.709; p < .001), qualified by main effects of the review voice (F(1,323) = 11.518; p = .001) and political ideology (F(1,323) = 5.968; p = .015). For a conservative voice (e.g., 5-star reviews), conservatives found the reviews to be much more credible than liberals ($M_{conservatives}$ = 5.22, $M_{liberals}$ = 4.11; F(1,323) = 32.306; p < .001; partial η^2 = .162). Whereas for a liberal voice (e.g., 1-star reviews), liberals found the reviews to be more credible than conservatives ($M_{conservatives}$ = 3.97, $M_{liberals}$ = 4.39; F(1,323) = 4.016; p = .046; partial η^2 = .025). Importantly, we see a much smaller effect for liberal voices relative to conservative voices, suggesting that ideology impacts perceptions of credibility differentially.

In study 2 (N = 621), we sought to generalize our findings and determine downstream consequences of these political review storms. Study 1 positioned the brand as "promoting Conservative ideologies" or "opposing Liberal ideologies". However, we realize that these two positions are not equal (Catapano and Tormala, *working paper*). To avoid this potential confound, study 2's voice manipulation disclosed that the business refused to seat a member of the Republican [Democratic] congress. Thus, the political review voice was always negative (i.e., 1-star). We also included a control condition where none of the reviews had a political voice. Political ideology was assessed as in the prior study. We replicated the previous patterns on review credibility as we again found a significant interaction between voice and political ideology (F(2,616) = 6.60; p < .01), which qualified the main effect of voice (F(2,616) = 60.45; p < .001). The main effect of political ideology was not significant (F(1,616) = 2.47; p > .11). For conservative reviews, conservatives perceived the review significantly more credible ($M_{conservatives}$ = 4.65) than liberals ($M_{liberals}$ = 3.97; t(207) = 3.75; p < .001). In contrast, there were no significant difference between liberals and conservatives for liberal reviews ($M_{conservatives}$ = 4.23, $M_{liberals}$ = 4.33; t(206) = .50; p > .62) or non-politicized control reviews ($M_{conservatives}$ = 5.44, $M_{liberals}$ = 5.54; t(203) = .68; p > .49).

Lastly, study 3 employed a 2x2x2 design where we first measured political ideology (conservative or liberal), then manipulated overall quality (2- or 4-star average rating) and (review voice: conservative, liberal). We matched participants with a business that aligned with their ideology, then randomly assigned them to a review voice condition that supported their position (5-star) or opposed their position (1-star). A 2x2x2 ANOVA on brand intentions yielded a significant 3-way interaction (F(1,495) = 4.436; p = .036). Due to space constraints, we will not fully detail the patterns here, but we will summarize them by saying that when the rating was consistent with the reviews (e.g., 2-star business with 1-star reviews), liberals indicated directionally higher intentions than conservatives. However, when there was inconsistency (e.g., 2-star business with 5-star reviews), conservatives indicated greater intentions than liberals, suggesting that they will support a business with a Conservative agenda, regardless of brand quality.

Taken together, these studies demonstrate that liberals and conservatives are both influenced by their political identity; however, liberals will also use quality as diagnostic information when determining whether to engage with a brand. Conservatives, on the other hand, appear more concerned with ingroup loyalty than quality concerns, whereas Liberals place less concern on ingroup loyalty. More research is needed to determine if this stems from some relationship to perceived review credibility or reviewer intentions or if it arises from a tribe mentality given the perceptions of the political climate currently. This work is currently limited with its focus on the U.S. population, but we hope to expand the investigation to include other countries to disentangle these potential pathways.

The Changing Face of America: When Majority Group Consumers Prefer vs. Are Threatened By Ethnic Diversity in Advertising

EXTENDED ABSTRACT

By reflecting the diverse composition of American society, advertising has the potential to say something about society and culture (Pollay 1986). However, diversity in ads may take on political meanings given the recently stoked culture wars regarding ethnicity, immigration, and the call to "make America great again". At the same time, companies feel pressure to take a stance on social issues (Global Strategy Group 2012).

Drawing from work on ideology (Jost, Glaser, Kruglanski, and Sulloway 2003; Jost, Nosek, and Gosling 2008) and intergroup attitudes (Stephan and Stephan 2000), we posit that conservative ideology will be associated with more negative attitudes toward diversity in advertising, whereas liberals will actually prefer ads with (vs. without) ethnic diversity/non-White actors. We also test relevant moderators of this effect and offer process evidence, including the role of symbolic threat (i.e., seeing immigrants as a threat to one's culture), product status, and the product's cultural origins. We argue that our results are not explained by felt targetedness (Aaker, Brumbaugh, and Grier 2000; Grier and Brumbaugh 1999), or similarity to the target (Aaker et al. 2000).

In Study 1 (n = 170, White, US undergraduates), participants were asked to rate their attitudes toward a series of ads that either featured White or Non-White (Sikh or Muslim) actors. Participants completed a measure of symbolic threat (e.g., extent to which immigrants undermine or enhance core American values, American identity, etc.). After a delay, participants also completed a measure of support for the current sociopolitical status quo (system confidence; Kay and Jost 2003) as a measure of conservative ideology (Jost et al., 2003). The two-way interaction was significant; those higher in system confidence rated the non-White ads more negatively than the White ads, and the opposite was found for those low in system confidence. Higher system confidence scores were also associated with lower non-White ad evaluations. System confidence also predicted symbolic threat, and symbolic threat mediated the effect of system confidence on ad attitudes for the ads with non-White actors, but not when the ads had White actors (moderated mediation effect was significant).

Study 2 replicated the interactive effect of ad content and ideology on ad attitudes, but with ads for businesses and services ostensibly available around campus. Ads either featured all White actors or a diverse range of ethnicities (including White). Ideology was measured using the social dominance orientation (SDO) scale (Ho et al. 2015), which is a conservative ideology (Ho et al., 2015; Jost et al. 2003) where hierarchical differences and inequality between groups is seen as desirable. Those high (low) in SDO rated the diversity ads more negatively (positively) than the no-diversity ads. They also reported less likelihood of visiting the business.

To further test the role of symbolic threat in the relationship between ideology and attitudes toward diversity in ads, Study 3 (n = 395, White US residents) manipulated the description of an ostensibly real ethnic group (Camarians), such that their culture and values were described as either similar or dissimilar to American culture and values (adapted from Maio et al. 1994, Stephan et al. 2005). Participants viewed and rated three ads said to feature Camarians. The interaction between the symbolic threat manipulation and ideology (system confidence: low vs. high) was significant. Those high (vs. low) in system confidence reported more negative attitudes toward the ads when symbolic threat was high, but this effect was eliminated and ad attitude ratings were significantly higher when symbolic threat was low.

Conservative ideology is also associated with valuing vertical differentiation and status (Kim, Park, and Dubois 2018; Ordabayeva and Fernandes 2018). Given this, and given the relationship between conservative ideology and attitudes toward immigration and various ethnic groups (Esses, Jackson, and Armstrong 1998; Ho et al. 2015; Jost et al. 2003), we posited that conservatives would see the product in the non-White ad condition as lower status, which would then predict negative ad attitudes. Study 4 supported this. Partici-

pants (n = 243, White American residents) saw an ad for sweet tea that featured a White family or Sikh family. Participants rated ad attitudes, indicated their WTP ($0-$5), and rated the status of the product. Finally, they completed the SDO scale. The ad content X ideology interaction was significant. Those higher in SDO responded more negatively to the non-White ad (vs. White ad), whereas those low in SDO showed the reverse effect. Similar effects were observed on WTP and perceived status. Moderated mediation analysis found that those higher in SDO saw the product as lower in status in the non-White (vs. White) ad condition, which predicted more negative ad attitudes and decreased WTP.

Finally, we reasoned that if conservative ideology is associated with seeing various ethnic groups as a symbolic threat and maintaining boundaries between groups, then it follows that those higher in conservative ideology will particularly dislike ethnic diversity in ads for products that are associated with American culture compared to those that are not. Study 6 (n = 362 White American residents) tested this. Participants saw the same ad with a Sikh family from Study 4, except the ad was either for Southern Breeze sweet tea (American brand and product), or Southern Breeze bael fruit tea (American brand, Indian product). Actor-product fit (Pounders and Mabry-Flynn 2016) was also measured (e.g., "choosing this family for this product is appropriate"). High SDO was associated with seeing less actor-product fit particularly for the domestic product (vs. foreign product), and also liking the ad for the domestic product less (moderated mediation effect was significant). Thus, despite the foreign-origin product being unfamiliar to participants and not being targeted by the ad, the high SDO participants liked the ad for the foreign-origin product more. Although counterintuitive, this is consistent with conservative ideology as a hierarchy- and status quo-maintaining ideology.

Even though the US has long been a diverse society, ethnic diversity in ads is not ideologically neutral. We provide evidence for the role of ideology in shaping attitudes toward culturally diverse ads. Moreover, we find evidence for theoretically-relevant moderators and mediators that also have marketing implications.

Support or Oppose? The Effects of Attitude Framing on Sharing Behavior

EXTENDED ABSTRACT

What factors affect whether consumers share their views with others? We identify a novel determinant of whether consumers share—*attitude framing*, defined as whether consumers think of their own attitude in terms of what they support or what they oppose. Attitude framing is distinct from attitude valence, as the same attitude can be framed in terms of support (e.g., I support that this policy is bad) or opposition (e.g., I oppose that this policy is good).

Six preregistered experiments provide evidence for an attitude-framing effect, whereby consumers are more likely to share, or express, attitudes framed in terms of positions they support rather than positions they oppose. This effect occurs due to two interaction goals: value expression and impression management. In our final study, we show how brands can leverage this psychological tendency to encourage sharing on social media.

Study 1 examined the basic relationship between attitude framing and sharing across a variety of attitudes. We asked participants their attitudes toward seven statements regarding companies and company policies (e.g., "Facebook has had a negative effect on America), varying the valence of the statements in order to ensure that "support" was not consistently associated positive attitudes. For each statement, participants reported their attitudes towards the

statement (*Strongly Oppose* (0) and *Strongly Support* (100)), and their intentions to share their attitudes on a 3-item index (e.g., "How likely would you be to share your views on this topic with friends or family who disagree with you on this issue?"). This index was used across studies. Across topics, participants were more likely to share their views when they considered statements they supported rather than statements they opposed, $t(2172.02) = 17.00$, $p < .001$. This effect was consistent across statements, and we found no interaction between attitude framing and attitude valence ($p = .96$).

Study 2 aimed to provide causal evidence for the attitude-framing effect in a more controlled setting. Participants in the lab were assigned to either a support-framing or oppose-framing condition. We began by asking participants to select which statement best characterized their attitude towards gun control: "More gun control would be (helpful/harmful)." In the support-framing condition, participants were asked about the statement they supported (the one they selected), whereas in the oppose-framing condition, participants were asked about the statement they opposed (the one they did not select). Thus, in both conditions, participants were asked about an attitude position that was consistent with their own view. For example, a participant who indicated that more gun control would be beneficial would be randomly assigned to answer questions about either their support for the beneficial statement or their opposition to the harmful statement. Then, participants were then asked how likely they were to share their attitudes on the statement with another participant currently completing the study. Participants reported greater sharing intentions in the support-framing than in the oppose-framing condition, $t(206) = 2.13$, $p = .033$.

Study 3 aimed to provide evidence for the proposed value expression and impression management mechanisms. We manipulated attitude-framing as described in Study 2. After indicating their likelihood of sharing, participants were asked to imagine that they had decided to share their view, and reported their prediction for the message recipient's impression of them (2 items; e.g., "How positively do you think the message recipient would view you as a person") and how value expressive sharing this position would be (2 items, e.g., "How representative of your values is your attitude [in favor of/against] this statement?"). Participants reported greater sharing intentions when the issue was framed in terms that they supported relative to terms that they opposed, $t(823) = 4.68$, $p < .001$. In addition, support framing led to greater value expressiveness, $Z = 9.40$, $p < .001$, which in turn predicted greater sharing intentions, $Z = 4.69$, $p < .001$; *indirect effect* = .12, $Z = 4.28$, $p < .001$. Support framing also led to higher positive impression ratings, $Z = 2.53$, $p = .01$, which predicted greater sharing intentions, $Z = 7.64$, $p < .001$; indirect effect = .05, $Z = 2.35$, $p = .02$.

In Study 4, we replicated this effect, finding that the effect holds regardless of whether the target of sharing agrees or disagrees on a given topic. In Study 5, we replicated this effect with another topic, and showed that the effect is attenuated when individuals do not want to be liked.

How can companies leverage this knowledge? More and more, companies are weighing in on social issues through their advertising campaigns and social media, and consumers are deciding whether to share and propagate these messages. The current research suggests that if companies want consumers to share their messages on social media, it may be more beneficial to talk about what a company supports, rather than what they oppose – even when a tweet relays the same underlying message. To test this proposition, in Study 6 we asked participants their attitudes towards immigration ("Immigration policies should be implemented that decrease/increase the number of people coming into the US"), and used their answers to assign

participants to support- or oppose- framed messages, as in previous studies. Then participants saw a Tweet from Uber consistent with their own attitude, framed in terms of either what they supported (e.g., "We support policies that increase immigration") or what they opposed (e.g., "We oppose policies that decrease immigration."), modelled from corporate tweets after the 2017 immigration ban. We then asked participants how likely they would be to retweet, and asked them to give us their email address to contact them about retweeting tweets like this one. Support framing led to greater sharing intentions than oppose framing, $t(975) = 2.89$, p = .004. Participants who viewed support-framed attitudes were also more likely to agree to be contacted (27.5%) than participants who viewed oppose-framed attitudes (17.5%), $x2(2) = 13.92$, $p < .001$. Thus, the current research suggests that support-framing allows companies to best maximize their return on their investment for these sorts of decisions and tweets.

REFERENCES

Aaker, Jennifer L., Anne M. Brumbaugh, and Sonya A. Grier (2000), "Nontarget Markets and Viewer Distinctiveness: The Impact Of Target Marketing on Advertising Attitudes," Journal of Consumer Psychology, 9, 127—140.

Catapano, R. and Tormala, Z. (working paper). Do I Support Gun Control or Oppose Guns? Supporters are More Likely to Share than Opponents.

Esses, Victoria M., John F. Dovidio, Lynne M. Jackson, and Tamara L. Armstrong (2001), "The Immigration Dilemma: The Role of Perceived Group Competition, Ethnic Prejudice, and National Identity," Journal of Social issues, 57(3), 389-412.

Feldman, J. M., & Lynch, J. G. (1988). Self-generated validity and other effects of measurement on belief, attitude, intention, and behavior. Journal of Applied Psychology, 73(3), 421.

Gajanan, M. (2018). Yelp Reviews Have Tanked for the Colorado Bakery at Center of Same-Sex Wedding Cake Case. Fortune Magazine. (accessed on February 25, 2020 at: https://fortune.com/2018/06/05/masterpiece-cakeshop-anti-lgbt-supreme-court-yelp/).

Global Strategy Group (2012), "Business and Politics: Do They Mix," http://globalstrategygroup.com/wp-content/uploads/2014/10/2014-Business-and-Politics-Report.pdf.

Graham, J., Haidt, J., & Nosek, B. A. (2009). Liberals and conservatives rely on different sets of moral foundations. Journal of personality and social psychology, 96(5), 1029.

Grier, Sonya A. and Anne M. Brumbaugh (1999), "Noticing Cultural Differences: Ad Meanings Created by Target and Non-Target Markets," Journal of Advertising, 28 (1), 79—93.

Haidt, Jonathan (2012), The righteous mind: Why good people are divided by politics and religion, Vintage Press.

Ho, Arnold K., Jim Sidanius, Nour Kteily, Jennifer Sheehy-Skeffington, Felicia Pratto, Kristin E. Henkel, Rob Foels, and Andrew L. Stewart (2015), "The Nature of Social Dominance Orientation: Theorizing and Measuring Preferences for Intergroup Inequality Using the New SDO7 Scale," Journal of Personality and Social Psychology, 109(6), 1003-1028.

John, Leslie K., Barasz, Kate, and Michael I. Norton (2016), "Hiding personal information reveals the worst," Proceedings of the national academy of sciences, 113, 954-959.

Jordan, Jillian J., Sommers, Roseanna, Bloom, Paul, and Dave G. Rand (2017), "Why do we hate hypocrites? Evidence for a theory of false signaling," Psychological Science, 28, 356-368.

Jost, John T., Jack Glaser, Arie W. Kruglanski, and Frank J. Sulloway (2003), "Political Conservatism as Motivated Social Cognition," Psychological Bulletin, 129(3), 339-375.

Jost, John T., Brian A. Nosek, and Samuel D. Gosling (2008), "Ideology: Its Resurgence in Social, Personality, and Political Psychology," Perspectives on Psychological Science, 3 (2), 126–136.

Kay, Aaron C. and John T. Jost (2003), "Complementary Justice: Effects of 'Poor but Happy' and 'Poor but Honest' Stereotypes on System Justification and Implicit Activation of the Justice Motive," Journal of Personality and Social Psychology, 85(5), 823–37.

Kim, Jeehye Christine, Brian Park, and David Dubois (2018), "How Consumers' Political Ideology and Status-Maintenance Goals Interact to Shape Their Desire for Luxury Goods," Journal of Marketing, 82(6). 132-149.

Lawton, Thomas, Steven McGuire, and Tazeeb Rajwani. "Corporate political activity: A literature review and research agenda." International Journal of Management Reviews 15, no. 1 (2013): 86-105.

Maio, Gregory R, Victoria M. Esses, and David W. Bell (1994), "The Formation of Attitudes Toward New Immigrant Groups," Journal of Applied Social Psychology, 24 (19), 1762—1776.

Ordabayeva, Nailya, and Daniel Fernandes (2018), "Better or Different? How Political Ideology Shapes Preferences for Differentiation in the Social Hierarchy," Journal of Consumer Research, 45(2), 227-250.

Pollay, Richard W. (1986), "The Distorted Mirror: Reflections on the Unintended Consequences of Advertising," Journal of Marketing, 50 (2), 18—36.

Pounders, Kathrynn, and Amanda Mabry-Flynn (2016), "Consumer Response to Gay and Lesbian Imagery: How Product Type and Stereotypes Affect Consumers' Perceptions," Journal of Advertising Research, 56 (4), 426-440.

Rao, A. R., & Monroe, K. B. (1989). The effect of price, brand name, and store name on buyers' perceptions of product quality: An integrative review. Journal of Marketing Research, 26(3), 351-357.

Shaw, Alex, DeScioli, Peter, Barakzai, Anam, and Robert Kurzban (2017), "Whoever is not with me is against me: The costs of neutrality among friends," Journal of Experimental Social Psychology, 71, 96-104.

Skitka, Linda J. (2010), "The psychology of moral conviction," Social and Personality Psychology Compass, 4, 267-281.

Stephan, Walter G. and Cookie White Stephan (2000), "An Integrated Theory of Prejudice," in Reducing Prejudice and Discrimination: The Claremont Symposium on Applied Social Psychology, ed.S. Oskamp, Mahwah, NJ: Lawrence Erlbaum Associates.

Stephan, Walter G., C. Lausanne Renfro, Victoria M. Esses, Cookie White Stephan, and Tim Martin (2005), "The Effects of Feeling Threatened on Attitudes Toward Immigrants," International Journal of Intercultural Relations, 29 (1), 1—19.

When You Need a Crystal Ball: Factors that Affect the Riskiness and Accuracy of Consumer Predictions

Chairs: Uri Barnea, Bocconi University, Italy
Jackie Silverman, University of Delaware, USA

Paper #1: How Order Affects People's Choices in Sequences of Independent Predictions

Jackie Silverman, University of Delaware, USA

Uri Barnea, Bocconi University, Italy

Paper #2: Consumers are (Relatively) Risk Seeking in the Domain of Error

Berkeley J. Dietvorst, University of Chicago, USA

Lin Fei, University of Chicago, USA

Paper #3: Should Advisors Provide Confidence Intervals Around Their Estimates?

Celia Gaertig, University of Chicago, USA

Joseph P. Simmons, University of Pennsylvania, USA

Paper #4: A Prototype Theory of Consumer Financial Misprediction

Ray Charles "Chuck" Howard, University of British Columbia, Canada

David Hardisty, University of British Columbia, Canada

Dale Griffin, University of British Columbia, Canada

Marcel Lukas, Heriot-Watt University, Scotland

Abigail Sussman, University of Chicago, USA

SESSION OVERVIEW

Consumers often make choices with a high degree of uncertainty regarding the outcomes. For example, the decision to purchase an unfamiliar product could ultimately increase or decrease utility, and consumers typically do not know beforehand what that outcome might be. Similarly, consumers spend trillions of dollars each year on stocks, bonds, gambles, and other bets, which suggests that predicting what might occur in the future is a common – and potentially lucrative – aspect of consumers' lives.

When it comes to understanding consumers' predictions in these various contexts, two key questions stand out: what predictions do they actually make, and how accurate is that choice? The four papers in this session explore how different aspects of the prediction environment play an important role in consumers' actual choices regarding future events and the accuracy of such predictions.

The first two papers examine what factors affect consumers' predictions, and specifically, their willingness to choose more "risky" options. The first paper explores when people are more likely to choose the "risky" (i.e., less likely) outcome relative to the "safe" (i.e., more likely) outcome across a sequence of predictions; for example, when predicting outcomes in a sports tournament, when might consumers pick the "underdog" to win over the "favorite?" Five studies show that people more often predict that unlikely outcomes will occur later (versus earlier) in the series of predictions of independent events because they believe that the unlikely outcome must occur at some point even within a small sample. The second paper investigates how the potential to make forecasting errors, like choosing the wrong team to win by X points, affects willingness to select riskier gambles. Four studies show that because people have a diminishing sensitivity to this type of error, they are more likely to choose the riskier gamble or outcome when the gamble involves prediction error in addition to monetary consequences.

The last two papers examine what factors affect consumers' accuracy when making predictions of uncertain events. The third paper investigates what conditions lead people to follow advice for predicting future events. Seven incentive-compatible studies show that people are (significantly or directionally) more likely to follow advice that includes a confidence interval around the specific best guess. Thus, assuming that advisors give good advice, including confidence intervals when giving advice can improve the accuracy of consumers' predictions. Finally, the fourth paper focuses on the accuracy of more personal, financial predictions, such as consumers' expectations of their future expenses and income. Nine studies featuring unique field data (e.g., budget forecasts made with a personal finance app, longitudinal spending reports from credit union members), find that people rely on their "most common" past experience when making predictions, leading them to under-predict the magnitude of their upcoming expenses, but over-predict the magnitude of their earnings.

Taken together, these papers shed light on how consumers make predictions, and when such predictions may be suboptimal. Given the pervasiveness of uncertainty about the future, understanding consumer predictions and their accuracy is critical for consumers and marketers alike.

How Order Affects People's Choices in Sequences of Independent Predictions

EXTENDED ABSTRACT

How does the order in which consumers make predictions about independent events (e.g., gambles) affect those predictions? We find in five studies (four pre-registered) that consumers more often choose that an unlikely outcome will occur *later* (vs. earlier) in a sequence of predictions; that is, consumers more often choose the "underdog" over the "favorite" for their second, third, and/or fourth prediction (versus first).

We propose that when consumers predict the outcomes of multiple events, they make their first prediction without necessarily considering the other events for which they will make predictions, and thus rationally tend to predict that the more likely outcome will occur. However, because people often falsely perceive independent events as related to each other (i.e., the belief in the law of small numbers: Tversky and Kahneman 1971), they believe that the unlikely outcome is bound to happen at some point. This belief disproportionately affects predictions later in the sequence, making consumers more likely to predict that the unlikely outcome will occur later (versus earlier).

By demonstrating that the (arbitrary) order in which consumers make predictions affects their choices, this research contributes to work on the representativeness heuristic (Kahneman and Tversky 1972), and specifically its effects on sequential bets (gambler's fallacy: Croson and Sundali 2005) and predictions of multiple outcomes made simultaneously (probability matching: Gal and Baron 1996). We are the first to show that the representativeness heuristic applies to multiple sequential predictions for which the outcomes are unknown (as opposed to a prediction following a known sequence of outcomes, such as predicting "heads" after seeing several coin flip outcomes). Additionally, our findings contribute to the broad literature on variety seeking. The fact that consumers in our studies vary

their *predictions* over time suggests that people seek variety even in contexts in which satiation, preference uncertainty, and social pressure (e.g., Kahn 1995) are unlikely to play a role.

In Study 1 (N = 402), we show the predicted effect "within subject:" consumers are more likely to choose the underdog later in a sequence of predictions (compared to their first prediction). Participants predicted the outcomes of three randomly ordered hypothetical basketball games in which one team slightly outranked the other (e.g., Team A ranked 12th vs. Team B ranked 15th). A repeated measures logit model revealed that more participants predicted that the underdog would win in the second (38%) and third games (40%) they made predictions about (vs. the first: 31%; $ps < .003$).

Study 2 (N = 601) replicated this effect in a different paradigm with real incentive-compatible choices (making predictions about upcoming Rugby World Cup games). Participants predicted the outcomes of one close game (Wales, 5th vs. Australia, 6th) and two other games with clear favorites (e.g., Ireland, 1st vs. Russia, 20th). We randomized the order such that participants predicted the outcome of the close game either first or last. We also manipulated whether participants were incentivized to make correct predictions or not: half of the participants knew they would receive a bonus if they made a correct prediction, and the other half did not receive any bonuses. A logit model revealed a main effect of order condition, such that more participants chose Australia (i.e., the underdog) when they predicted that game's outcome last (59%) versus first (39%; $p < .001$). Separate chi-square analyses showed that the effect held both with and without incentives ($ps < .01$; ANOVA interaction $p > .40$). An additional study using four real NCAA "March Madness" tournament basketball games replicated this order effect (Study 3, N = 199: *first* = 31% vs. *last* = 49%, $p = .010$).

In Study 4 (N = 178), we examined the effect of choice order in a more generalizable, non-sports context: predictions about what color ball (red or black) would be drawn from an urn. As in Studies 2 and 3, participants predicted the outcome of a draw from a focal "close" urn (with 27 red balls and 23 black balls) either before or after predicting the outcomes of two draws from urns with a large majority of red balls (e.g., 43 out of 50). Again, more participants chose the unlikely option (black) when they made the focal prediction last (43%) versus first (6%; $p < .001$). We also found evidence of the psychological process driving this effect: we asked participants how much they were thinking about their other predictions when making their prediction for the focal urn. Participants in the *last* condition reported considering their other predictions more ($M = 5.21$) than in the *first* condition ($M = 3.10$; $p < .001$), which mediated the effect of order on prediction (Indirect effect = -0.05, SE = 0.03, 95% CI = [-0.13, -0.01]).

Study 5 (N = 2000) tested our theory through moderation. We hypothesized that if participants' belief that the unlikely outcome must occur at some point in the sequence drives the effect, then it should be attenuated when participants learn that the events are in fact independent. As in Study 4, participants predicted what color ball would be drawn from three different urns, with the same focal urn appearing either first or last. We also manipulated if, in the instructions phase, participants completed a short tutorial on how separate sequential events (e.g., coin tosses) are statistically independent or not. The order effect replicated for participants who did not do the tutorial (*last* = 8% vs. *first* = 36%; $p < .001$) and was still present but smaller among participants who did the tutorial (*last* = 8% vs. *first* = 25%; $p < .001$, interaction $p = .048$). Importantly, among participants who made the focal prediction *last*, participants who completed the tutorial were less likely to choose the black ball ($p = .001$).

From placing bets to predicting the weather for a multi-day vacation, consumers often have to make predictions about multiple future events. Thus, our finding – that the order in which consumers make predictions has a systematic effect on their choices – is important for marketers and consumers alike.

Consumers are (Relatively) Risk Seeking in the Domain of Error

EXTENDED ABSTRACT

In most theories of choice under risk, preferences are elicited over prospects (outcomes and associated probabilities; see Starmer, 2000). When testing these theories, most researchers have used purely monetary gambles (e.g. 50% chance of $1,000 vs 100% chance of $450; Kahneman & Tversky, 1979). People's choices over these prospects are supposed to inform us about their choices in the real world. However, real world prospects usually have outcomes that are not purely monetary. Namely, they also produce an error – the difference between a prediction and the realized outcome. For example, betting that a die will land on "6" when it actually lands on "4" produces an error of two. Sports betters' realize an error when betting on a spread, manufacturers realize an error when deciding how much of a good to produce, and investors realize an error when selecting assets based on projections. If this context affects people's appetite for risk, then people's preferences in the abstract scenarios used in past research may not accurately represent consumer's preferences in the real world.

In this project, we find that consumers make fundamentally different choices when gambles produce an error in addition to a monetary outcome. Recent work has found evidence that people have diminishing sensitivity to forecasting error, which makes them risk seeking over forecasting error (Dietvorst, & Bharti, 2019). Following this work, we predict that people will be significantly more risk seeking when their choice in a gamble will produce an error in addition to a monetary gain or loss.

In Study 1, 755 participants chose between safe and risky options and we manipulated whether their choice produced an error. Participants in the "Gain" chose between a 50% chance of $0.30 and $0.12 for sure. They learned that the computer would flip a coin to determine the outcome, but they did not learn how this process would work. Thus, their choice did not produce an error because it was not clear what outcome they were betting on when they chose the risky option. Participants in the "Heads" chose between a gain of $0.30 if the coin landed on heads (50% chance), and $0.12 for sure. Participants in the "Choice" condition faced the same gamble, but could choose whether heads or tails resulted in the $0.30 gain. Thus, the risky option in the Choice and Heads conditions produced an error because participants knew what outcome they were betting on. We found that participants in the Gain condition were significantly more likely to pick the safe option (44%) than participants in the Heads (31%, $X^2(1, n=504)=9.34$, $p=.002$) and Choice (25%, $X^2(1, n=504)=20.43$, $p<.001$) conditions. We replicate this effect in Study 2, with a different coin flip gamble.

In Study 3, 401 participants bet on a gamble that would be resolved with a die roll. Participants in the Gain condition chose between three options without learning how the outcomes would be determined. The two riskier options each offered a 40% chance of $0.30, a 20% chance of $0.10, and a 40% chance of $0; the safer option offered a 20% chance of $0.30 and an 80% chance of $0.10. Participants in the Error condition learned how these gambles corresponded to the outcome of the die roll: 1) the die was 5-sided and displayed the numbers "1, 1, 2, 3, 3", 2) they could bet on "1", "2",

or "3", and 3) they would earn $0.30 for a perfect prediction, $0.10 for a prediction off by 1, and $0 for a prediction off by 2. Thus, the two riskier options corresponded to betting on "1" and "3", while the safer option corresponded betting on "2". We displayed the odds of each monetary outcome the same way to both groups to ensure that they had the same information about the monetary gamble. We found that participants were significantly more likely to pick the safer option in Gain condition (56%) than the Error condition (39%, $X^2(1, n=401)=11.89$, $p=.001$).

In Study 4, we explore this phenomenon in a completely different context. Participants saw two different forecasting options (Option E and Option S) make 20 trial forecasts in a prediction task, and then chose between those options for a final incentivized forecast. Participants earned $0.50 for a prefect forecast, and this bonus decreased by $0.10 for each unit of error in the forecast. Unlike the previous studies, participants only learned about the odds and outcomes associated with their options through experience. We configured the predictions so that Option E was always off by 1, and Option S was equally likely to be perfect or off by 2. Thus, Option E was a safe option that always produced $0.40, and Option S was a risky option that produced $0.50 and $0.30 with equal probability. We manipulated the instructions and feedback that participants got between conditions. Participants in the Gain condition never learned about the prediction component of the task – they only saw the gains that the two options generated in each of the 20 trials. Participants in the Error condition only learned about the prediction task; they saw the predictions, the gains, and the correct answers in each trial. We found that participants were significantly more likely to pick the safe option (Option E) in the Gain condition (53%) than the Error condition (40%, $X^2(1, n=401)=6.59$, $p=.010$).

These results suggest that consumers are more likely to make risky choices when their choices produce an error in addition to a monetary gain or loss. These results can help to explain how the same consumer can simultaneously buy insurance (a choice without a clear prediction component) and gamble on sports (choices with a clear prediction component) – two actions that suggest very different risk preferences. Further, they suggest that marketers can manipulate people's tolerance for risk by highlighting or hiding the prediction component of a risky choice. For example, consumers may value uncertain promotions (see Mazar, Shampanier, & Ariely, 2017) more when those promotions generate an error in addition to a monetary outcome.

Should Advisors Provide Confidence Intervals Around Their Estimates?

EXTENDED ABSTRACT

Many of a consumer's everyday decisions require them to make accurate predictions about inherently uncertain events. For example, consumers may need to forecast how likely it is that the price of a product will fall, that a new model for a product will be released, or that their investment will be profitable. To navigate such uncertainties, consumers often ask for and rely on advice. Despite the potential perils of following overly precise advice, advice is often given with too much certainty (Moore and Healy 2008; Moore, Tenney, and Haran 2016; Radzevick and Moore 2011; Soll and Klayman 2004).

Recent research suggests that consumers actually do not inherently dislike uncertain advice, as they do not judge advisors more negatively when these advisors include uncertainty into their advice (Gaertig and Simmons 2018). However, we do not yet know (1) whether people are more likely to *follow* uncertain advice, and (2) how advisees react to uncertain advice in the form of confidence intervals.

In the current project, we set out to test whether people are more or less likely to follow advice that is accompanied by a confidence interval. For example, the website Kayak.com may recommend to buy a flight ticket now because "prices will rise in the next two weeks" (certain advice) or because "there is a 90% chance that prices will rise between $20 and $30 in the next two weeks" (uncertain confidence-interval advice). We tested participants' reactions to these different types of advice in the domain of sports predictions, as this allowed us to incentivize participants for accurate predictions and to give them high-quality advice.

Across seven studies ($N = 9,471$), we found that participants are directionally *more* likely to follow advice that is accompanied by a confidence interval. The effect was significant in four of the seven studies, and non-significant in the other three studies. Our results suggest that advisors may be more persuasive if they provide confidence intervals around their estimates.

In Study 1 ($N = 399$), we asked participants to predict the outcomes of upcoming NBA basketball games. We presented participants with 9 different games, and, for each game, we asked them to predict how many points one of the teams would score in the game (e.g., "How many points will the Philadelphia 76ers score in this game?"). Participants first made a prediction for each of the games. Then, we asked them to choose whether they would want to submit their own prediction or a prediction made by an algorithm as their official, incentivized prediction. Before making their choice, participants saw how the algorithm had performed in the past. For each game, participants were then shown the algorithm's prediction alongside their own prediction, and were asked to choose which they would like to submit as their official, incentivized prediction.

We manipulated the certainty of the algorithm's advice by manipulating whether or not the advice was accompanied by a confidence interval. In the certain advice condition, participants only saw the algorithm's best guess (e.g., "The statistical model's best guess is that the Philadelphia 76ers will score 111 points."). In the uncertain advice condition, the best guess was accompanied by a confidence interval (e.g., "According to the statistical model, there is a 90% chance that the Philadelphia 76ers will score between 84 and 118 points. Its best guess is that the Philadelphia 76ers will score 111 points."). We found that participants were more likely to follow the algorithm's advice when it was accompanied by a confidence interval than when it was not accompanied by a confidence interval. Specifically, in Study 1, 25% of participants followed the algorithm's advice when it was accompanied by a confidence interval, but only 18.7% of participants followed the advice in the certain advice condition, $b = .063$, $SE = .026$, $p = .015$.

In six additional studies, we replicated this procedure using different incentives and different sports prediction tasks. In all of our studies, participants were directionally more likely to follow the algorithm's advice when it was accompanied by a confidence interval than when it was not accompanied by a confidence interval. This effect was significant in three of the additional six studies ($p = .032$, $p = .004$, and $p = .007$), and non-significant in the remaining three studies ($p = .112$, $p = .314$, and $p = .439$).

Taken together, our results suggest that presenting a confidence interval alongside advice may be appealing to customers. Our results have important practical implications and are relevant to any company or individual who seeks to effectively communicate their advice.

A Prototype Theory of Consumer Financial Misprediction

EXTENDED ABSTRACT

Consumers frequently make financial predictions (Peetz et al. 2016, Zhang and Sussman 2018), and the accuracy of these predictions can be consequential for their financial well-being. For example, *under*-predicting future *expenses* is associated with high-interest payday loan use (Pew 2012) and revolving credit card debt (Yang et al. 2007). Similarly, *over*-predicting future *income* may lead consumers to over-spend because expected income growth typically leads to increased spending (e.g., Berman et al. 2016; Carroll et al. 1994). However, relatively little is known about the prevalence and magnitude of expense and income prediction biases, why these biases occur, and how these biases can be neutralized.

In the present research we develop a prototype theory of consumer financial misprediction that helps explain: 1) why consumers display an *expense prediction bias* in which they *under*-predict their future spending, 2) why consumers who face variable income display an *income prediction bias* in which they *over*-predict their future income, and 3) how consumers' expense and income prediction accuracy can be improved. The logic of the prototype theory is that financial predictions are based on prototype attributes that come to mind easily when predictions are being constructed. These attributes represent a consumer's average spending or income, where "average" refers to the mode of the relevant distribution rather than the mean. This leads consumers to under-predict expenses because expenses are positively skewed with mode < mean, and over-predict income when it is negatively skewed with mode > mean. One important implication of this framework is that predictions will be more accurate when the relevant distribution is approximately normal (with mode = mean) than when it is skewed (H1). A second key implication is that when outcomes are naturally skewed prediction accuracy can be improved by prompting consumers to consider reasons why their expenses (income) might be *different* than usual because most values in a positively (negatively) skewed distribution that are different from the mode are also higher (lower) than the mode (H2).

In Studies 1–3 we test H1 in the context of expenses. In Study 1 we use longitudinal data from a popular personal finance app (+400 million transactions across +65,000 users from 2014 to 2018) to examine monthly prediction accuracy across expense categories that naturally vary in terms of skew. On average, consumers under-predict their monthly spending by 21.1% ($p < .001$). However, supporting H1, prediction accuracy is higher in expense categories characterized by more normally distributed spending (e.g., Fuel: Skew = .10, Mean under-prediction = .03%, n.s.) and lower in categories characterized by more positively skewed spending (e.g., Dining and Drinking: Skew = .38, Mean under-prediction = 34.22%, $p < .001$).

Study 2 extends the descriptive findings of Study 1 by examining the causal effect of skew on expense predictions. Participants viewed 52 weekly expense values in quick succession (Andre et al. 2017), then predicted their spending for the next week. The experimental manipulation was that the values were drawn in random order without replacement from either a positively skewed distribution with mode < mean (Mode = $180, Mean = $200, SD = 38.14, Skew = 3.13) or a normal distribution with mode = mean (Mode = $200, Mean = $200, SD = 28.14, Skew = 0.00). Supporting H1, and consistent with the descriptive results of Study 1, predictions in the normal distribution condition were remarkably close to the $200 mean of the underlying distribution ($M = $200.32, p = .83$), but predictions in the positive skew condition were significantly lower than $200 ($M = $195.14, p < .02$). Study 3 directly replicates Study 2 and also shows

that the effect of distribution condition on predictions is mediated by what participants perceive to be their "average" spending (indirect effect = 3.41, SE = 1.32, 95% CI = [1.05, 6.37]).

In Studies 4–5 we test H2 in the context of expenses. In Study 4 we partnered with Canada's largest credit union to run a five week longitudinal field study with 187 of its members. In weeks one through four participants were asked to predict their spending at the beginning of the week then report their actual spending at the end of the week. In the fifth week of the study participants were randomly assigned to predict their expenses in a control condition or an intervention condition that prompted them to consider three reasons why their spending for the next week would be *different* from a typical week before they made their prediction. During the first four weeks of the study participants under-predicted their weekly spending between 11% and 19% (p's $< .01$). During the fifth week of the study participants in the control condition once again under-predicted their weekly spending (mean bias = 18%, $p < .01$). However, supporting H2, under-prediction was virtually eliminated in the intervention condition (mean bias = -1.3%, $p = .85$). Study 5 (n = 1,048, nationally representative sample of US consumers) extends Study 4 by demonstrating that the intervention makes it easier to think of atypical expenses when predicting, and that the number of atypical expenses that come to mind mediates the effect of the intervention on predictions (indirect effect = .05, SE = .02 95% CI = [.02, .09]).

In Studies 6–9 we test H1 and H2 in the context of income predictions. Our primary expectations were that consumers who work in the gig economy tend to *over*-predict their future earnings because gig income is often negatively skewed with mode > mean (Hall and Krueger 2018), and that our "atypical" intervention would therefore make income predictions more accurate by making them lower. To briefly summarize the results of these studies: 1) Uber drivers (n = 57) and Mturkers (n = 200) over-predict their weekly gig income by as much as 61% (p's $< .001$), 2) Income predictions are more accurate when income is normally distributed than when it is negatively skewed, and 3) Prompting people to consider reasons why their gig income for the next week might be different than usual reduces over-prediction.

REFERENCES

André, Quentin, Nicholas Reinholtz, and Bart de Langhe. "Variance Spillover in Intuitive Statistical Judgments." *ACR North American Advances* (2017).

Berman, Jonathan Z., An TK Tran, John G. Lynch Jr, and Gal Zauberman. "Expense neglect in forecasting personal finances." *Journal of Marketing Research* 53, no. 4 (2016): 535-550.

Carroll, Christopher D., Jeffrey C. Fuhrer, and David W. Wilcox (1994), "Does Consumer Sentiment Forecast Household Spending? If So, Why?" *American Economic Review*, 84 (December), 1397–1408.

Croson, Rachel, and James Sundali (2005) "The Gambler's Fallacy and the Hot Hand: Empirical Data from Casinos." *Journal of risk and uncertainty*, 30 (3),195-209.

Dietvorst, B., & Bharti, S. (2019). People Reject Algorithms in Uncertain Decision Domains Because They Have Diminishing Sensitivity to Forecasting Error. Available at SSRN 3424158.

Gaertig, Celia and Joseph Simmons (2018). "Do People Inherently Dislike Uncertain Advice?" *Psychological Science*, 29(4), 504-520.

Gal, Ido, and Jonathan Baron (1996), "Understanding Repeated Simple Choices," *Thinking and Reasoning*, 2, 81–98.

Hall, Jonathan V., and Alan B. Krueger. "An analysis of the labor market for Uber's driver-partners in the United States." *ILR Review* 71, no. 3 (2018): 705-732.

Kahn, Barbara E. (1995), "Consumer Variety-Seeking Among Goods and Services: An Integrative Review," *Journal of Retailing and Consumer Services*, 2 (3), 139–148.

Kahneman, D., & Tversky, A. (1979). Prospect theory: An analysis of decision under risk. *Econometrica*, 47, 263–291.

Kahneman, Daniel, and Amos Tversky (1972) "Subjective Probability: A Judgment of Representativeness," *Cognitive Psychology*, 3 (3), 430-454.

Mazar, N., Shampanier, K., & Ariely, D. (2017). When retailing and Las Vegas meet: Probabilistic free price promotions. *Management Science*, 63(1), 250-266.

Moore, Don A., Tenney, Elizabeth R., and Uriel Haran (2016). "Overprecision in Judgment." In G. Wu & G. Keren (Eds.), *Handbook of Judgment and Decision Making* (pp. 182–212). New York: Wiley.

Moore, Don and Paul J. Healy (2008). "The Trouble With Overconfidence." *Psychological Review*, 115(2), 502-517.

Peetz, Johanna, Melanie Simmons, Jingwen Chen, and Roger Buehler. "Predictions on the go: Prevalence of spontaneous spending predictions." *Judgment and Decision Making* 11, no. 1 (2016): 48.

Radzevick, Joseph R. and Don A. Moore (2011). "Competing to Be Certain (But Wrong): Market Dynamics and Excessive Confidence in Judgment." *Management Science*, 57(1), 93-106.

Soll, Jack B. and Joshua Klayman (2004). "Overconfidence in Interval Estimates." *Journal of Experimental Psychology: Learning, Memory, and Cognition*, 30(2), 299-314.

Starmer, C. (2000). Developments in non-expected utility theory: The hunt for a descriptive theory of choice under risk. *Journal of economic literature*, 38(2), 332-382.

Trusts, Pew Charitable. "Payday lending in America: Who borrows, where they borrow, and why." *Washington, DC: Pew Charitable Trusts* (2012).

Tversky, Amos, and Daniel Kahneman (1971), "Belief in the Law of Small Numbers," *Psychological Bulletin*, 76 (2), 105.

Yang, Sha, Livia Markoczy, and Min Qi. "Unrealistic optimism in consumer credit card adoption." *Journal of Economic Psychology* 28, no. 2 (2007): 170-185.

Zhang, C. Yiwei, and Abigail B. Sussman. "Perspectives on mental accounting: An exploration of budgeting and investing." *Financial Planning Review* 1, no. 1-2 (2018): e1011.

When Beneficence Backfires: Negative Consequences of Doing Good

Chairs: Yonat Zwebner, The InterDisciplinary Center (IDC) Herzliya, Israel
Shalena Srna, University of Michigan, USA

Paper #1: Unable to Rebound: The Downside of Being a Nonprofit That Errs

Shalena Srna, University of Michigan, USA
Yonat Zwebner, Interdisciplinary Center (IDC), Israel

Paper #2: Doing Good for (Maybe) Nothing: How Reward Uncertainty Shapes Consumer Responses to Prosocial Behavior

Ike Silver, University of Pennsylvania, USA
Jackie Silverman, University of Delaware, USA

Paper #3: Damned Either Way: Hypocrisy Judgments When Goals and Commitments Conflict

Jonathan Z. Berman, London Business School, UK
Graham Overton, Bocconi University, Italy
Daniel A. Effron, London Business School, UK

Paper #4: The Cost of Opposition: Preferring to Punish our Own Rather than Help our Opponent

Rachel Gershon, University of California, San Diego, USA
Ariel Fridman, University of California, San Diego, USA

SESSION OVERVIEW

Doing good is generally beneficial in terms of reputation and status (Flynn 2003; Flynn et al. 2006; Hardy and Van Vugt 2006). Further, people not only have greater goodwill towards prosocial agents, but also evaluate these agents more positively in unrelated domains (i.e., a moral halo effect; Chernev and Blair 2015). However, when might consumers respond negatively to do-gooders? In this session, we focus on instances when beneficence backfires. Specifically, four papers identify cases in which people respond negatively towards those who do good (in terms of willingness-to-spend, consumer decisions, judgments, and monetary allocations). This novel experimental work highlights the importance of understanding responses to do-gooders and contributes to the literature on altruism, prosociality, CSR, and social and political causes.

The first two papers show how beneficence backfires when prosocial actors behave in a manner that is seemingly inconsistent with their mission. Despite generally positive perceptions of nonprofits relative to for-profits, Paper 1 shows that people are actually more resentful and less forgiving of a nonprofit than a for-profit that commits the same wrongdoing. These findings are particularly important as evident by the dramatic decrease in Red Cross donations following news that it mismanaged Haitian relief money. Consistent with past work, Paper 2 finds that actors who do good in exchange for certain rewards suffer negative consequences because they are judged as less purely motivated. However, interestingly, this paper finds that this effect is attenuated when rewards for doing good are uncertain; for example, consumers prefer to buy products from and write more positive reviews of companies whose prosocial initiatives face uncertain profit outlooks (i.e., they may earn no profit at all) versus certain profits of equivalent expected value.

The last two papers examine how identity plays a role in negative responses to those who do good in the context of social and political causes, an area particularly relevant in today's ideologically charged world. Paper 3 examines situations in which do-gooders are faced with a tradeoff between acting inconsistently with their past behavior versus acting inconsistently with their underlying values, and finds that in these situations actors are condemned to be judged as hypocrites regardless of what is chosen. Paper 4 demonstrates that

do-gooders themselves may act in a way that harms their side of a political cause (e.g., gun control). Counterintuitively, when faced with the choice between taking money from their side of a cause or allocating money to the opposing side, people take money from their own side. In fact, the more one cares about their cause, the more likely they are to harm their side rather than help the opposition, undermining their ability to do good for their cause.

Taken together these four projects highlight the importance of understanding the negative responses to actors who aim to do good. Counterintuitively, this session identifies that beneficence can backfire and reveals the potential negative consequences of doing good. In line with the conference theme, the impact and widespread applicability of these papers' findings could attract researchers, practitioners, and policy-makers.

Unable to Rebound: The Downside of Being a Nonprofit That Errs

EXTENDED ABSTRACT

Organizations often err. Understanding peoples' responses to organizational mistakes and apologies is of utmost managerial importance (Koehn 2013; Pace et al. 2010). Previous work examining these responses has focused on for-profits and not nonprofits (e.g., Grégoire and Fisher 2008; Joireman et al. 2013; Reimann et al. 2018). Yet, how do consumers respond to a *nonprofit* that errs and apologizes?

Nonprofits are generally perceived more positively than for-profits (Aaker et al. 2010). Indeed, Bhattacharjee, Dana, and Baron (2017) document that people hold anti-profit beliefs such that nonprofits are judged as doing less harm and more societal good than for-profits. Further, prosocial actors receive reputational benefits such as high status (Flynn 2003; Hardy and Van Vugt 2006), and a benevolent halo effect (Chernev and Blair 2015; Sen and Bhattacharya 2001). Given these findings, one would expect that people would be more forgiving towards a nonprofit than a for-profit that transgresses. Counter to this, we find that consumers are more resentful of an organization that transgresses when it is a nonprofit than when it is a *for-profit*. Further, consumers feel more exploited by a nonprofit that errs than when a for-profit errs. Therefore, even after apologizing, nonprofits still have a harder time rebounding than for-profits.

Study 1 (N=501, MTurk) was a 2(between: nonprofit vs. for-profit) x 3(within: wrongdoing) design. Participants evaluated 3 different organizations that had done wrong (released pollutants, published inaccurate information on its website, had misleading ads). The organizations were described identically except they were either nonprofits or for-profits. Across all 3 wrongdoings, participants who evaluated nonprofits were less likely to continue donating/spending and perceived the organization more negatively than those who evaluated for-profits ($ps<.01$). Thus, nonprofits that transgress are penalized more than for-profits for the same transgression.

Study 2 (N=200, Mturk) builds on Study 1 by examining responses towards an organization that has not only erred (misleading ads) but also apologized. We find that people are less forgiving of a nonprofit than a for-profit. Specifically, participants were still more likely to avoid donating/spending at a nonprofit (M=5.33) than at a for-profit (M=4.48) after the organization apologized for their mistake ($p<.001$).

Study 3 (N=167, lab) ensures that differences in baseline willingness to donate/spend cannot explain the effect. After reading a description about the organization (nonprofit or for-profit), participants were equally likely to give to/spend at the organizations (M=5.50 vs. 5.23, $p = .18$). However, after they learned about the wrongdoing and apology, participants were less willing to give to/spend at the nonprofit than the for-profit (M=3.25 vs. 4.42, $p<.001$; interaction: $p<.001$).

Next, we examined *why* consumers have more negative responses towards nonprofits who erred and apologized compared to for-profits who did the same. Consistent with Expectation-Disconfirmation Theory (Oliver 1977), we reason that consumers feel exploited by a nonprofit that errs because they expect the organization to do good in exchange for their money, while this expectation does not exist for for-profits. In Study 4 (N=404, lab), after reading about an organization that donates (vs. sells) warm clothing and had apologized for doing wrong (misleading ads), participants again indicated they were less likely to continue donating/spending at the nonprofit (M=3.57) compared to the for-profit (M=4.90; $p<.001$). Furthermore, participants also felt more exploited by the erring organization when it was a nonprofit (M=4.60) than when it was a for-profit (M=3.85; $p<.001$). Importantly, this reduced forgiveness towards the nonprofit (vs. the for-profit) was mediated by how exploited participants' felt (B=-.62; 95% CI [-.85, -.39]). Lastly, participants were asked whether they would prefer to transact with a different organization, as opposed to the erring organization, that has lower quality of clothing but has never erred. Consistent with our main finding, 56.9% of participants in the nonprofit condition preferred to switch to the organization that had never erred, while only 7.4% indicated they would switch in the for-profit condition ($p<.001$).

Finally, we rule out an alternative account. Specifically, if the unfavorable responses towards nonprofits that err are because people feel *personally* exploited by the organization, then we should not observe these unfavorable responses towards nonprofits when advising *someone else* on whether or not to continue transacting with the organization. Accordingly, in Study 5 (N=603, Mturk) we employed a 2(organization type: nonprofit vs. for-profit) x 2(self vs. other) between-subjects design. Similar to the previous studies, the organizations were described identically except they were either nonprofits or for-profits. Participants were asked whether they would (vs. advise their friend to) continue donating to/shopping at an organization. We found a main effect for organization type (nonprofit: M=4.05 vs. for-profit: M=4.74, $p<.001$), and no significant interaction ($p=.304$). Replicating the effect observed in the previous studies, participants who were asked about their own money, were less willing to keep donating at a nonprofit (M=4.20) than they were to keep spending at a for-profit (M=5.03) after the organization apologized for their mistake ($p<.001$). Furthermore, this effect was also observed in the *other* condition in which participants advised their friend (nonprofit: M=3.91 vs. for-profit: M=4.46; $p=.003$). Unexpectedly, we also observed a main effect for self vs. other (self: M=4.61 vs. other: M=4.18, $p=.001$) suggesting people in general are less willing to advise others to transact with an organization after it errs. Together, these results suggest that feeling exploited towards the nonprofit is not because of a deeper personal connection with an organization.

In sum, previous research has mostly focused on corporate reputations and consumers' reactions to for-profits who err; however, less is known about how people respond to nonprofits that err. Our findings suggest that, instead of giving nonprofits that transgressed slack the opposite is true: after erring, consumers are more resentful and less forgiving of nonprofits than for-profits. This has important social and financial implications. For instance, the Red Cross was vilified after it mismanaged and misrepresented the use of donation money intended to support the victims of the 2010 Haiti earthquake. Following news of the scandal, the Red Cross had the lowest amount of donations in over 15 years (*The Washington Post* 2015). Thus, paradoxically, those who do good have trouble rebounding after they transgress.

Doing Good for (Maybe) Nothing: How Reward Uncertainty Shapes Consumer Responses to Prosocial Behavior

EXTENDED ABSTRACT

Scholars have long studied decision-making under reward uncertainty (i.e., when there is an *ex ante* chance of no reward at all; Kahneman and Tversky 1979). Here, we examine how people evaluate the decisions of *others* in response to reward uncertainty. Specifically, we hypothesize that actions taken when rewards are uncertain seem more purely (i.e., intrinsically) motivated, whereas actions taken when rewards are certain seem more tainted by extrinsic benefits, holding reward value constant.

We investigate this effect in the domain of prosocial behavior, where inferences about motive purity powerfully guide judgment and evaluation (Critcher and Dunning 2011). Although prosocial behavior can lead to substantial reputational benefits for the actor, good deeds can backfire if they appear tainted by extrinsic benefit (Small and Cryder 2016). In extreme cases, doing good and turning a profit can provoke stronger backlash than doing no good at all (Newman and Cain 2014).

We theorize that when selfish rewards for doing good are uncertain *ex ante*, observers infer that prosocial actors *would have been willing* to do good for nothing. For example, an individual who volunteers in exchange for a raffle ticket with a large (but unlikely) payout seems like she *would have* volunteered for free (even if she wins); a volunteer receiving a smaller sure reward enjoys no such inference. Analogously, a brand that launches a sustainability initiative despite an uncertain profit outlook seems more praiseworthy than one that launches an identical initiative with a certain profit outlook.

Studies 1a-b (n=128, n=199) test our prediction in the context of product choices and customer reviews. In Study 1a, participants read about two chocolate brands which recently switched to fair-trade cacao beans. For one brand, the fair-trade program was sure to boost profits by $100,000 (certain reward). For the other, the program had a 25% chance of boosting profits by $400,000 (uncertain reward; equivalent in expectation). Participants subsequently evaluated the brand facing uncertain profits as more purely motivated ($p<.001$, $d=.87$), and 64% preferred to take home a chocolate from that brand (Z=3.18, $p<.01$). In Study 1b, participants read a press release about a new corporate philanthropy project from a major wireless provider. We manipulated, this time between-subjects, industry reports about the project's likely impact on the brand's bottom line (certain reward: 100% chance of $100,000 profit, uncertain reward: 10% chance of $1,000,000 profit). Participants again rated the brand facing uncertain rewards as more purely motivated ($p<.01$, $d=.43$), and this time they also wrote more positive customer reviews ($p=.001$, $d=.48$).

Studies 2a-b (n=150, n=301) replicate this effect of reward uncertainty on motive inference across different profit magnitudes and prosocial acts. These studies also find effects of reward uncertainty on downstream inferences about moral character, likeability, and predictions about future good behavior ($ds>.20$).

Study 3 (n=248) asks whether these effects can be explained by an alternative mechanism: differences in perceived value between

certain and uncertain rewards. We first asked participants to imagine receiving a raffle ticket with a 10% chance of winning a $250 gift card and to indicate how much sure compensation they would require to trade in the ticket. Two weeks later, we invited the same participants back for our main study. Returning participants read about a donor who gives blood either in exchange for the same raffle ticket (uncertain reward) or a gift card in the value the participant had previously indicated (certain reward). Although the rewards received were matched on participants' perceived value, the donor in the uncertain reward condition was still seen as more purely motivated ($p<.001$, $d=.56$) and likely to donate blood again in the future ($p<.001$, $d=.64$).

Study 4 (n=605) tests whether the impact of reward uncertainty on motive inference is robust to *ex post* reward outcomes. Participants were asked to evaluate a manufacturing company that launched a new recycled product with either a certain profit forecast (100% chance of $100,000) or an uncertain profit forecast (10% chance of $1 million). This time, participants also learned about profit outcomes, yielding a three-condition design (certain reward, realized uncertain reward, and unrealized uncertain reward). The brand was judged to be more purely motivated in both uncertain reward conditions relative to the certain reward condition ($ps<.001$, $ds>.70$). Here, even if a prosocial initiative turned a 10x profit *ex post*, it was still seen as more purely motivated.

Studies 5a-b (n=369, n=1,419) explore boundary conditions based on reward probability. Study 5a finds that the effect is specific to situations in which uncertain profits include a chance of earning nothing, and not present in broader cases of risk over multiple possible outcomes (i.e., a chance of either a smaller or larger profit). Study 5b tests the effect over seven profit probabilities, finding that motives begin to appear substantially less tainted when the chance of no reward reaches 50%.

Study 6 (n=1,007) finds that the effect is attenuated if we make salient that the actor needs the large possible reward in the uncertain condition. Participants read about a student who volunteers in exchange for a raffle ticket with a 5% chance at $400 (uncertain reward) or a sure payment of $20 (certain reward). As we found previously, participants judged the volunteer as having less tainted motives in the uncertain reward condition ($p<.001$, $d=.40$). However, this result actually reversed when we told participants that the student was $400 short on his rent ($p<.01$, $d=.27$; interaction $p<.001$). Presumably, this additional information attenuated the inference that the student would have been willing to volunteer if no reward were offered.

Finally, Study 7 (n=449) asks whether revealing a prosocial initiative's uncertain profit outlook can earn more credit than not mentioning profits at all. Here, participants rated a bank's decision to invest in urban revitalization as more purely motivated when it faced an uncertain profit forecast relative to both a certain profit forecast ($p<.001$, $d=.57$) and no mention of profits whatsoever ($p<.01$, $d=.38$).

Our findings challenge conventional wisdom that extrinsic benefits always lead to cynical motive inferences and deepen our understanding of how observers evaluate actions taken when rewards are uncertain.

Damned Either Way: Hypocrisy Judgments When Goals and Commitments Conflict

EXTENDED ABSTRACT

While those who behave ethically are often rewarded with reputational benefits (e.g., Flynn et. al. 2006), behaving ethically can be socially risky. For instance, individuals often denigrate the character of do-gooders if those prosocial others are seen as implicitly impugning the character of the self (Minson and Monin 2012). More generally, people tend to be suspicious that prosocial actors harbor self-interested motives (Berman, et al. 2015; Critcher and Dunning 2009; Miller 2001). Such suspicions can grow into perceptions that the actor is a hypocrite – someone who benefits from *appearing* virtuous without paying the price of actually *being* virtuous (e.g., Monin and Merritt 2012).

Hypocrisy often involves inconsistency but not all inconsistent behavior is labeled hypocrisy. To perceive hypocrisy, an audience must interpret inconsistency as signaling that a person appears or feels more virtuous than they deserve (Effron et al. 2018). However, the conditions under which inconsistency invites this interpretation are poorly understood.

We investigate how people perceive two types of inconsistency that a prosocial consumer could display: *commitment-based inconsistency*, whereby the consumer's present actions are inconsistent with past commitments made; and *goal-based inconsistency*, whereby the consumer's actions fail to maximize the stated ethical goal they are trying to achieve.

Consumers sometimes must choose between acting inconsistently with their past commitments or their stated goals. Consider someone who adopts vegetarianism to benefit the environment. Now imagine an invasive fish species is destroying local habitats, and environmentalists recommend sell the fish commercially for consumption in order to limit the damage. Suppose the consumer is offered the invasive fish for dinner. She must choose between acting inconsistently with her commitment to avoid meat versus acting inconsistently with her goals to help the environment.

Across four studies, we find evidence for a "Damned Either Way" effect such that consumers are labeled hypocrites for displaying either commitment- or goal-based inconsistency (Studies 1-4). Study 1 presents an initial demonstration of the effect and Study 2 assess its robustness. Study 3 shows that this effect occurs when evaluating consumers who provide a reason for their commitment, but not for those who believe that a given behavior represents a categorical imperative (Kant, 1781/1908). Finally, Study 4 finds that motivated reasoning determines which form of inconsistency that evaluators evoke when making hypocrisy judgments.

Study 1's participants (N = 301) read a scenario involving a consumer, Jeff, who became a vegetarian for environmental reasons. In the Control condition, the scenario simply ended. In the other two conditions, participants read that Jeff learns that environmentalists recommend the public eat a specific invasive fish species in order to protect local habitats. Shortly thereafter, Jeff finds himself at a restaurant that has this fish species on the menu. In the Commitment-based inconsistency condition, Jeff orders the fish, thereby acting in a manner inconsistent with his past commitment to vegetarianism. In contrast, in the Goal-based inconsistency condition, Jeff orders the vegetarian option, thereby failing to maximally help the environment. Consistent with a "Damned Either Way" effect, we find that, relative to the control condition (M = 1.96), participants judged Jeff to be more of a hypocrite regardless if he ordered the fish (M = 2.79, $p < .001$) or the vegetarian option (M = 2.76, $p < .001$).

In Study 2 (pre-registered: https://aspredicted.org/blind.php?x=m6ab5q, N = 311), we replicate these findings in a within-subjects design and utilizing three different scenarios to test the effect. In all three scenarios, we find a significant effect that behavioral-based inconsistency leads to judgments hypocrisy relative to control (ps < .001), while in two of the three scenarios we find a

significant effect of goal-based inconsistency leading to attributions of hypocrisy relative to control (ps < .001).

In Study 3 (pre-registered: http://aspredicted.org/blind.php?x=3uf789, N = 600), we ask whether the Damned Either Way effect depends on the stated goal. In particular, we compared reason-based goals (e.g., eating fish to reduce environmental harm) versus categorical imperatives (e.g., refusing to eat fish because it is inherently wrong to do so). Consistent with our pre-registered hypothesis, we replicate the DEW effect in the reason-based goal condition: relative to the control (M = 1.86), the actor was again judged to be a more of a hypocrite regardless if he ate the meat (M = 3.24, p < .001) or the vegetarian (*M* = 2.52, *p* < .001) option. However, we do not find a DEW effect when the actor's behavior is driven by a categorical imperative. In this case, relative to the control (M = 2.20), he was only considered a hypocrite when he chose to eat meat (M = 4.16, p < .001), but not when he ate the vegetarian option (M = 1.99, p = .30).

In Study 4 (pre-registered: http://aspredicted.org/blind.php?x=cp87p5, N = 806) we test the Damned Either Way effect in a new context, and further show that both commitment- and goal-based hypocrisy judgments are shaped by motivated reasoning. Participants first reported attitudes towards illegal immigrants. They then evaluated a scenario in which a man who commits to opposing immigration for economic reasons learns that immigrants in fact benefit the economy. A canvasser accepting donations in support of immigrant rights then approaches him. The individual either donates (commitment-based inconsistency) or does not donate (goal-based inconsistency). A control condition was also included to assess baseline ratings of hypocrisy. We additionally reversed the scenario such that the individual who supports immigrant rights for economic reasons learns that immigrants are harmful to the economy. A canvasser accepting donations in support of deporting illegal immigrants then approaches him.

Results show a Damned Either Way effect across both versions of the scenario (ps < .03). We further find that judgments of hypocrisy were moderated by participants' own attitudes about immigration. Specifically, participants were more likely to judge the actor as a hypocrite if his final actions contradicted their personal beliefs regardless of the nature of the inconsistency they judged (ps < .06).

In sum, we find evidence that both commitment-based and goal-based inconsistency leads ethical actors to be judged as hypocrites.

The Cost of Opposition: Preferring to Punish our Own Rather than Help our Opponent

EXTENDED ABSTRACT

Imagine that you are pro-choice and are given two options: add $5 to a donation going to a pro-life organization or subtract $5 from a donation going to a pro-choice organization. Would you choose to help the opposing group or harm your own? In three studies (and two supplementary studies), we find that when given two options – to help the opposition through greater funding or hurt one's own side through diminished funding – research participants consistently choose to harm their own cause. This replicates across polarized contexts: abortion access, gun control, and political affiliation. Moreover, we find that individuals prefer to harm their own interests despite the fact that they generally believe their own cause is more effective with funds.

We propose that that the preference to harm one's own group rather than help an opposing group stems from the belief that helping the opposition is a stronger violation of group norms. We find evidence that individuals act in accordance with their beliefs about group norms – those who chose to harm their own group rather than concede resources to the opposition believed others in their group would do the same. Changing individuals' beliefs about the norm changed their behavior.

In our primary study (preregistered: http://aspredicted.org/blind.php?x=sx6vb7, N = 800, MTurk), participants were asked to modify donation amounts for three important and polarizing causes: abortion access, gun control, and political parties. We first measured the degree to which participants identified with each side of the three issues. Participants in the counter-attitudinal condition were asked to choose between subtracting $1 from a donation to an organization on their side of the cause or adding $1 to a donation to an organization on the opposing side. Given these two unfavorable options, most participants (71%) chose to subtract $1 from the organization on their side. This choice to hurt one's own organization, rather than help an opposing organization, conflicts with a harm minimizing strategy, as individuals rate organizations on their side as more effective with funds (*p* < .001). The implication is that the participants' own cause suffers greater overall harm when their organization is deprived of funding than when the opposing organization is given that same funding.

Participants in the pro-attitudinal condition were given opposite choices: to add $1 to a donation to an organization on their side of the cause or to subtract $1 from a donation to the opposing side. The majority of participants (75%) chose to help their own side, indicating that choices do not stem from a preference to simply hinder the opposition above all else. The results from both conditions also hold at various levels of aggregation, including for each of the three causes individually, as well as for both sides of each cause. We find that the choice to help (vs. harm) is moderated by the strength of participants' attitudes toward the cause – those with stronger attitudes are more likely to choose to harm their side (vs. help the other) in the counter-attitudinal condition, and help their side (vs. harm the other) in the pro-attitudinal condition.

An additional study (N = 403, MTurk) elicited the amount of money participants would prefer to be subtracted from a donation to their side of a cause, in order to feel indifferent towards a $1 increase in a donation to the opposing side. After removing large outliers, we conservatively estimated the average amount to be $2.33 (compared to $1: *p* < .001), suggesting a preference to harm one's side to a greater magnitude than helping the opposition.

To investigate the role of group norms in counter-attitudinal choices, we ran a study (N = 653, MTurk) manipulating the norms towards helping the opposition. In the control condition, participants were informed that the experimenter would be making a donation to a pro-life and a pro-choice organization, and that they would have to choose how to alter the amount. In the norm-add condition, participants were also told that in a previous study, 70% of MTurkers on their side of the cause chose to add to the opposing group rather than subtract from their own. In the norm-subtract condition, participants were instead told that 70% of previous participants on their side of the cause had chosen to subtract from their own group rather then add to the opposing group. The proportion of participants choosing to add $1 was less than 50% in the control group (39.2%, *p* =.002), and was not significantly different from the proportion in the norm-subtract group (36.7%, *p* = .68), suggesting that subtracting is the norm. However, there was a significant increase in the proportion of participants choosing to add $1 in the norm-add group, relative to both the control and norm-subtract conditions (57.7%, *p*s < .001), suggesting that behavior in this context is guided by perceptions of group norms.

When making decisions in polarized contexts, individuals do not always make choices to minimize harm. Our findings add to a literature on the power of social influence and how psychological barriers can impede the advancement of a cause. In contexts in which accommodating two groups' desires is crucial for progress, how do we compromise when both sides would rather harm their own cause than make concessions in which the opposition benefits? Given our highly polarized political system, determining how to shift these norms is critical. Otherwise, paradoxically, the individuals who care the most may be most likely to forestall the other group's progress at the expense of their own cause.

REFERENCES

Aaker, Jennifer, Kathleen D. Vohs, and Cassie Mogilner (2010), "Nonprofits Are Seen as Warm and For-Profits as Competent: Firm Stereotypes Matter," Journal of Consumer Research, 37(2), 224-237.

Bhattacharjee, Amit, Jason Dana, and Jonathan Baron (2017), "Anti-Profit Beliefs: How People Neglect the Societal Benefits of Profit," Journal of Personality and Social Psychology, 113(5), 671-696.

Berman, Jonathan Z., et al. (2015), "The Braggart's Dilemma: On the Social Rewards and Penalties of Advertising Prosocial Behavior," Journal of Marketing Research, 52(February), 90-104.

Chernev, Alexander and Sean Blair (2015), "Doing well by doing good: The benevolent halo of corporate social responsibility," Journal of Consumer Research, 41(6), 1412-1425.

Critcher, Clayton R. and David Dunning (2011), "No Good Deed Goes Unquestioned: Cynical Reconstruals Maintain Belief in the Power of Self-Interest," Journal of Experimental Social Psychology, 47(6), 1207–1213.

Effron, Daniel A., et al. (2018), "From inconsistency to hypocrisy: When does "saying one thing but doing another" invite condemnation?" Research in Organizational Behavior, 38, 61-75.

Flynn, Francis J. (2003), "How much should I give and how often? The effects of generosity and frequency of favor exchange on social status and productivity," Academy of Management Journal, 46(5), 539-553.

Flynn, Francis J., Ray E. Reagans, Emily T. Amanatullah, and Daniel R. Ames (2006), "Helping One's Way to the Top: Self-Monitors Achieve Status by Helping Others and Knowing Who Helps Whom," Journal of Personality and Social Psychology, 91(6), 1123–37.

Grégoire, Yany, and Robert J. Fisher (2008), "Customer Betrayal and Retaliation: When Your Best Customers Become Your Worst Enemies," Journal of the Academy of Marketing Science, 36 (June), 247–61.

Hardy, Charlie L., and Mark Van Vugt (2006), "Nice guys finish first: The competitive altruism hypothesis," Personality and Social Psychology Bulletin, 32(10), 1402-1413.

Holly, Peter (2015), "The Red Cross Had $500 Million in Haitian Relief Money, but It Built Just 6 Houses," The Washington Post, https://www.washingtonpost.com/news/morning-mix/wp/2015/06/04/the-red-cross-had-500-million-in-haitian-relief-money-and-it-built-just-6-houses/.

Joireman, Jeff, Yany Grégoire, Berna Devezer, and Thomas M. Tripp (2013), "When Do Customers Offer Firms a 'Second Chance' Following a Double Deviation? The Impact of Inferred Firm Motives on Customer Revenge and Reconciliation," Journal of Retailing, 89(3), 315– 37.

Kahneman, Daniel and Amos Tversky (1979), "Prospect Theory: An Analysis of Decision under Risk," Econometrica, 47(2), 263-292.

Kant, Imannuel. (1908). Critique of pure reason. 1781. Modern Classical Philosophers, Cambridge, MA: Houghton Mifflin, 370-456.

Koehn, Daryl (2013), "Why Saying "I'm Sorry" Isn't Good Enough: The Ethics of Corporate Apologies," Business Ethics Quarterly, 23(2), 239-268.

Miller, Dale T. (1999), "The Norm of Self-Interest," American Psychologist, 54 (12), 1053–60.

Minson, Julia A. and Benoit Monin (2012), "Do-gooder derogation: Disparaging morally motivated minorities to defuse anticipated reproach," Social Psychological and Personality Science, 3(2), 200-207.

Monin, Benoit and Anna Merritt, A. (2012), "Moral hypocrisy, moral inconsistency, and the struggle for moral integrity."

Oliver, Richard L. (1977), "Effect of Expectation and Disconfirmation on Postexposure Product Evaluations - an Alternative Interpretation," Journal of Applied Psychology, 62(4), 480–486.

Pace, Kristin M., Tomasz A. Fediuk, and Isabel C. Botero (2010), "The Acceptance of Responsibility and Expressions of Regret in Organizational Apologies After a Transgression," Corporate Communications: An International Journal, 15(4), 410-427.

Reimann, Martin, Deborah J. MacInnis, Valerie S. Folkes, Arianna Uhalde, and Gratiana Pol (2018), "Insights into the Experience of Brand Betrayal," Journal of the Association for Consumer Research, 3(April), 240–54.

Sen, Sankar, and Chitra Bhanu Bhattacharya (2001), "Does Doing Good Always Lead to Doing Better? Consumer Reactions to Corporate Social Responsibility," Journal of Marketing Research, 38, 225–243.

Small, Deborah A., and Cynthia Cryder (2016), "Prosocial consumer behavior," Current Opinion in Psychology, 10, 107-111.

Unanticipated Consequences of Constraining Behavior

Chairs: Jackie Silverman, University of Delaware, USA
Shalena Srna, University of Michigan, USA

Paper #1: When Limits Backfire: The Ironic Effect of Setting Limits on Entertainment Consumption

Shalena Srna, University of Michigan, USA
Jackie Silverman, University of Delaware, USA
Jordan Etkin, Duke University, USA

Paper #2: Spending Gained Time

Selin Malkoc, Ohio State University, USA
Gabriela Tonietto, Rutgers University, USA

Paper #3: Loss Booking: Mental Accounting Facilitates Consumer Spending

Chang-Yuan Lee, Boston University, USA
Carey Morewedge, Boston University, USA

Paper #4: Save More Later? The Roles of Present Bias and Perceived Urgency

Joseph Reiff, University of California, Los Angeles, USA
John Beshears, Harvard University, USA
Hengchen Dai, University of California, Los Angeles, USA
Katherine Milkman, University of Pennsylvania, USA, USA
Shlomo Benartzi, University of California, Los Angeles, USA

SESSION OVERVIEW

Consumers have limited time and money that they can spend in an infinite number of ways. Deciding how to best spend one's resources involves tradeoffs between short-term desires and long-term investments. To help people make better choices, individuals and firms frequently impose constraints on how consumers spend their time and money (Cheema and Soman 2006; Gollwitzer and Sheeran 2006; Shefrin and Thaler 1988; Thaler and Bernartzi 2004). For example, people often self-impose deadlines to reduce procrastination or create budgets to encourage fiscal responsibility (e.g., Ariely and Wertenbroch 1999; Cheema and Soman 2006). This session seeks to better identify and understand the unanticipated consequences of constraining such behaviors. Four papers answer questions about how different types of constraints (i.e., time limits, schedules, budgets, and pre-commitment devices) can have unanticipated and even negative outcomes for how consumers spend their time and money.

The first two papers investigate how consumers seek and manage time spent on "leisure," exploring how constraining time spent through setting limits and scheduling can have surprising consequences. Paper 1 examines how a common time management tool—setting an alert after a pre-determined amount of time spent (akin to the option on most smartphones)—affects how much time people spend on the activity. Results show that setting such non-binding time limits on entertaining activities, like social media or games, counterintuitively increases the time spent on them. Paper 2 finds that, even though consumers desire more leisure time, when they actually gain time that could be spent on leisure activities, they show more interest in work. This is because gaining time (versus having free time) prompts individuals to question how to best allocate their time, leading them to consider – and address – their "to-do" list more.

The next two papers examine counterintuitive effects of constraining another important resource – money – by exploring how budgeting money and pre-committing to future savings can backfire, increasing spending and reducing savings. Paper 3 finds that mental budgeting, which is intended to inhibit spending, actually encourages it. Results show that consumers are more inclined to spend money

that has been budgeted for a specific purpose than money that has not been budgeted because the loss is psychologically realized when the money is initially mentally allocated. Finally, Paper 4 explores the effects of having the choice to pre-commit to a savings program. Specifically, a field experiment finds that allowing employees to choose between immediate or delayed enrollment (vs. immediate enrollment only) did not affect enrollment rates but led employees to delay enrollment, thus saving less overall.

Together, these four papers highlight the importance of understanding how consumers manage their time and money, documenting ironic psychological processes and unintended negative consequences of multiple popular resource management tools. In line with the conference theme, the differing experimental approaches and research questions addressed within this session would provide a "rendez-vous" for researchers, policy-makers, and practitioners who are interested in a wide variety of topics, including time management, mental accounting, savings, goals, and how new technologies impact wellbeing and decision-making.

When Limits Backfire: The Ironic Effect of Setting Limits on Entertainment Consumption

EXTENDED ABSTRACT

New technologies have made it easier than ever before to consume entertaining content. On average, people spend nearly 2.5 hours per day on social media alone—over half of which occurs during the workday. To help people better manage their time, many technological devices (e.g., iPhones; Nintendo Switch) and popular apps (e.g., Facebook, Instagram, YouTube) have introduced time-tracking tools, providing consumers with the option to set costless, non-binding time limit reminders on entertaining activities. These reminders alert consumers to having spent a pre-determined amount of time on an activity or platform each day (e.g., 45 minutes on Instagram).

Presumably, people set time limits on entertaining, but unproductive, activities in order to encourage themselves to spend less time on those activities (and more time on productive work). Contrary to this intended effect, we propose that such limits can backfire, increasing, rather than decreasing, time spent on the activities they are meant to constrain. We argue that this counterintuitive effect occurs because, much like when consumers set goals (e.g., Heath, Larrick and Wu 1999; Wallace and Etkin 2018), setting limits changes salient reference points. Without a time limit, consumers use their starting point (i.e., spending no time on the activity) as the reference point by which to judge their (dis)satisfaction with the time spent. Once a time limit has been set, however, the focal reference shifts to this limit amount (e.g., 45 minutes), making any time spent under the limit amount feel more acceptable (i.e., less like a loss or a waste of time) and overall discouraging restraint. Five pre-registered studies examining both external and self-set time limits on different entertaining activities (browsing social media, playing an online game) support these predictions.

In Study 1a (N = 208), participants imagined that they were regular users of a social media app and that they had spent 52 minutes on the app yesterday. Participants were randomized to either imagine that they had set a limit on their phones, such that they would see a reminder of their time spent at 60 minutes, or not. We then asked participants to rate on -10-to-10 scales their satisfaction with how they

had spent their time yesterday (4 items: how happy they felt about the time they spent on the app, how much they felt they had lost/gained time, how well they used their time, and how much they felt they had wasted their time [reverse-coded]). A one-way MANOVA found a main effect of condition across these four items (F(4, 203) = 6.27, $p < .001$). An independent t-test revealed that participants who set a limit reported felt significantly better about how they spent their time ($M = 0.01$) than participants who did not set a limit ($M = -1.60$; t(206) = 3.46, $p < .001$). Study 1b (N = 807) replicates this effect; participants felt better about the time they spent on smartphone games (either 18 or 52 minutes) when they imagined having set a daily limit of 60 minutes ($M = 2.97$) versus when they did not imagine setting a limit ($M = 0.91$; t(805) = 7.06, $p < .001$). Together, Studies 1a and 1b suggest that people do indeed shift their reference point regarding how much time they should spend on entertainment in response to setting a limit.

Our remaining studies directly test the effects of setting a limit (versus not) on real consumption behavior (i.e., actual time spent on an entertaining activity). In Study 2, participants (N = 199) were given a total of 5 minutes to spend on an entertaining activity (a bubble shooter game) and a paid work task (transcribing text strings). They could spend as much time as they wanted on the game before switching to the work task. Half of participants read that, to help them manage their time, a reminder would appear after spending three minutes on the game. Importantly, after seeing the reminder, they could continue to engage in the game for as long as they liked. The other half of participants did not read about or receive such a limit. As predicted, an independent t-test on log-transformed time spent revealed that participants in the limit condition spent more time on the game ($M = 117.21$ seconds) than those in the control ($M = 94.77$; t(197) = 2.59, $p = .010$).

Study 3 (N = 192) replicated Study 2 with a different entertaining activity (scrolling through Pinterest), again finding that setting a limit increased the time spent compared to the control ($M_{limit} = 24.48$ seconds vs. $M_{control} = 15.88$; t(190) = 2.63, $p = .009$).

Study 4 (N = 201) tested if self-set limits would have a similar effect on behavior. It used the same design as Study 3, but allowed participants to choose their own limit. In particular, participants were told that, to help them manage their time during the study, they could set a non-binding time limit, which would appear as a reminder during the Pinterest activity. The limit could be set in 15-second increments for up to the full 5 minutes (i.e., the equivalent of not setting a limit; $M_{self-set\ limit} = 83.96$ seconds, SD = 92.65, Median = 60). As predicted, participants in the limit condition spent significantly longer browsing Pinterest ($M = 23.52$ seconds) than those in the control ($M = 14.84$; t(199) = 2.03, $p = .044$). Importantly, this effect casts doubt on a potential alternative explanation based on externally imposed limits signaling how long people *should* spend on the task.

In sum, despite intending to reduce the time spent, setting limits can ironically increase time spent on unproductive entertaining activities (over paid work). This occurs because limits change consumers' salient reference point when evaluating their use of time. Our findings contribute to emerging research on the unintended consequences of tracking behavior (Etkin 2016; Soman and Cheema 2004) and how new technologies impact wellbeing and decision-making (e.g. Melumad and Pham 2020).

Spending Gained Time

EXTENDED ABSTRACT

Working hours have steadily declined over the last century (Huberman and Minns 2007), and consumers increasingly outsource

their unpaid work, buying services like childcare and housekeeping (Whillans et al. 2017). These trends imply an increase in leisure consumption. However, hours dedicated to socializing have decreased over the last decade (ATUS 2017), potentially because when feeling busy, leisure activities are often jettisoned (Southerton 2003). We study this paradox by examining how people consume gained time (due to a cancelation or plan change) and propose that despite a desire for more leisure, consumers may choose to work when they actually gain time.

Consumers desire free time, which often means time free from obligations or generally "leisure" (Unger and Kernan 1983). However, we argue that despite being objectively free of obligations, gained time is not automatically classified as "free." Instead, it is assigned to an "available" time account, which spurs consumers to question how to allocate that time. In doing so, consumers turn to their running list of tasks requiring their time (i.e., to-do list), which are usually work-oriented. As an outcome, the more salient work-like tasks take precedence and otherwise desired leisure activities are abandoned.

Study 1 demonstrates this paradox of desiring leisure, but choosing work during gained time. We compared chosen tasks during a gained time with those for an unspecified future date. Unlike the present or near future, the (unspecified) future is often decontextualized from our daily demands (Zauberman and Lynch 2005). As such, we expected participants to treat an unspecified future time as free (and meant for leisure), while treating a particular gained hour as simply unaccounted (prompting a need to account for it).

175 undergraduates imagined either gaining a few hours in the next couple of weeks or later in the same day and indicated how they would spend this time (1=definitely leisure; 9=definitely work). We also measured participants' perceived time famine and their desire for more work and leisure in their life. Unsurprisingly, participants reported experiencing time famine (M=4.79; $p<.01$ compared to the scale midpoint) and wished they had more leisure (M=5.06) than work (M=3.83, $p<.01$). Further, reported time famine was positively correlated with desire for more leisure ($r = .28$, $p < .01$), but uncorrelated with desire for more work ($r = -.03$, $p = .63$). Thus, it appears that participants crave more time to increase leisure consumption. However, we found that when participants considered gaining a particular period of time, they preferred work-like tasks (M=7.27) compared to those who considered gaining an unspecified future time (M=5.27, $p<.01$). Importantly, participants' desire for more leisure did not predict their intended behavior in either condition (both p's>.90).

In Study 2 we directly compared *having* 1.5 hours of free time to *gaining* 1.5 hours. 153 MTurkers reported how they would consume this time (1=fun and enjoyable task; 9=work-related task). As expected, we found that participants were more likely to choose work-like tasks during gained time (M=3.17) than free time (M=2.44, p<.05).

In Study 3, we examined whether differences in construal level (Trope and Liberman 2010) account for our results by manipulating temporal distance. 342 undergraduates imagined having/gaining 1.5 hours either that evening or the same evening in one week and indicated their task preference (1=catch up with friend/family/neighbor; 9=catch up on errands/housework/chores). We predicted that a particular period of time gained in distant future is similar to time gained sooner as they both define a specific time period and require its accounting. As expected, participants who gained time preferred a work-like task (M = 5.46) compared to those who had time free (M=4.71, $p<.01$). Importantly, there was no main effect nor interaction of temporal distance (both p's>.2).

The remaining studies test our proposed framework: gaining time prompts individuals to account for this time, leading them to reference their to-dos, and to choose work. First, in Study 4, we added a third condition in which participants were told that a unit of free time was "unaccounted." In line with the idea that free time is often equated with leisure, but that prompting consumers to think of how to account for time increases propensity to choose work, participants in both the gained time (M=3.68) and unaccounted time conditions (M=3.89) were more likely to choose work than the free time condition (M=2.82, ps<.05).

Importantly, if gaining time indeed increases prioritization of work, then the effect should be exaggerated for consumers who have a tendency to work first and save leisure for later. Testing this, in Study 5, 202 participants imagined having or gaining 3 hours and indicated their activity preference (1=fun and enjoyable task; 9=work-related task) and their desire to prioritize work (e.g., I'd rather get some work tasks out of the way). As before, participants who gained time were more likely to prefer a work-like task (M=2.83) than those who had time (M=2.17, p < .05). Importantly, this was moderated by participants' desire to prioritize work, where participants who prioritize work to a greater extent (-.27 standard deviations from the mean or higher) showed greater preference to work during gained (vs. free) time.

Finally, in Study 6, we tested the proposed role of to-do lists. In addition to indicating how they would spend gained versus free time (1=definitely leisure/fun; 7= definitely work/productive), participants (N=374) also provided their running to-do list for the day. Analyses revealed a main effect of gained time, whereby participants were more likely to choose work during gained (M=6.98) compared to free time (M=6.31, p=.004). There was also a significant interaction with the number of to-dos. Those with more tasks on their to-do list (-.40 standard deviations from the mean or higher) showed greater propensity to choose work during gained (vs. free) time.

In sum, despite their desire for more leisure, consumers may paradoxically prefer to work when they gain time. This is because while gaining time creates free time, gained time is categorically different from free time.

Loss Booking: Mental Budgeting Facilitates Consumer Spending

EXTENDED ABSTRACT

Budgeting is a common money management practice. Approximately 41% of Americans prepared a written or computerized budget every month (U.S. Bank Possibility Index, 2016). It has a mental analog, mental budgeting, whereby mental labels associated with money change how it is spent (Heath and Soll 1996; Thaler 1985). People create spending plans, for example, by earmarking funds into various mental accounts (e.g., groceries, clothing). Once money is budgeted into mental accounts, it is no longer perfectly fungible, or substitutable, with other money.

Mental budgeting is often characterized as a self-control device that inhibits consumer spending (Heath and Soll 1996; Thaler 1985). In this research, however, we propose a *loss booking theory* to reinterpret mental budgeting—that creating budgets for expenses facilitates rather than inhibits consumer spending. The intuition behind the concept of loss booking is that consumers psychologically realize or "book" the loss of the money when it is budgeted into a mental account. This implies that many fungibility violations occur because losses are realized for the expenses when the mental budget is "booked," and would be realized again if that money were spent outside the budget.

We posit loss booking an important case in which expectations serve as the reference point by which consumers evaluate outcomes (Kőszegi 2006). This suggests that the psychological loss associated with the expense occurs when the mental budget is created for anticipated expenses rather than at the time when the goods are purchased. Consequently, the psychological impact of the loss associated with the purchase of goods within the mental budget is mitigated or diminished. Specifically, loss booking theory predicts that losses are psychologically realized when consumers budget for certain expenses (H_1). Due to the prior realization of losses, consumers experience less pain of paying for expenses associated with existing mental budgets (H_2). Finally, the reduced pain of paying incurred when purchasing goods associated with an existing mental budget facilitates spending within that budget (H_3).

We report five experiments providing evidentiary support for our hypotheses. Experiment 1 illustrates the effect of mental budgeting on actual holiday spending. Experiments 2-5 used vignette designs. Experiment 2 provides evidence for "loss booking" (H_1). Experiment 3 supports the hypothesis that due to the loss realization, the subsequent consumption of that money elicits less pain of paying than would the expenditure of unbudgeted money or money budgeted towards other accounts (H_2). Experiment 4 shows that this hypothesis holds when the budgeting process is implicit. Finally, Experiment 5 shows that this reduced pain of paying facilitates the purchase of expenses associated with the mental budget, even when the purchase exceeds the budget limit (H_3).

Experiment 1 (*N*=328) was conducted in two phases on separate days. In phase 1, we manipulated the presence of a mental budget by assigning half of participants to explicitly make a holiday shopping budget for the upcoming Black Friday weekend. Six days later (i.e., in phase 2), participants reported how much money they actually spent. We found that participants in the budget condition spent significantly more money than did controls, who were not asked how much they planned to spend. Experiment 2 (*N*=244) manipulated whether participants made a clothing budget before they went shopping, and whether they purchased a t-shirt. We measured the extent to which participants perceived themselves to have lost or gained money during the shopping trip. We found that the purchase of a shirt without a budget was evaluated as a loss (i.e., loss framing), whereas the purchase of a shirt that did not exceed the budget was evaluated as a gain. In addition, whereas participants without a budget perceived themselves to have neither gained nor lost money, those with a budget perceived themselves to have gained money if they did not make a purchase

Experiment 3 (*N*=300) manipulated whether or not participants made a clothing budget (vs. food budget or no budget) before they purchased a pair of jeans. We measured the extent to which participants perceived the purchase of jeans as a monetary loss, and the pain of paying associated with their purchase. We found that participants were less likely to perceive purchasing the jeans as a loss in the clothing budget condition than in the control and food budget conditions. Moreover, the difference between the control and food budget conditions was not significant. A similar pattern of results was observed for the pain of paying. A mediation analysis revealed the mediating impact of loss framing on pain of paying.

Experiment 4 (*N*=100) manipulated whether participants withdrew cash at ATM (i.e., implicit budgeting) in advance of expenditures (controls imagined that they had the same amount of cash in their wallet). In addition to the two measures used in Experiment 3, we measured the extent to which participants expected to spend the cash that they had. We found that participants in the withdrawal condition (a) exhibited a higher expected propensity to spend, (b) were

less likely to perceive the expenditure as a loss, and (c) experienced less pain of paying than participants assigned to the control condition. We found the serial mediating impact of expected propensity to spend and loss framing on pain of paying.

Experiment 5 (*N*=309) manipulated whether participants budgeted money to buy sunglasses ($90) in advance of their purchase, and whether their price was under or over that budget (i.e., $69 vs. $110). We teased apart the budgeting and reference price accounts in explaining spending by including a reference price condition. Moreover, we measured purchase likelihood. We found that in both price conditions, participants in the budget condition (a) were less likely to perceive the purchase of sunglasses as a loss, (b) experienced less pain of paying associated with its purchase, and (c) more likely to buy the sunglasses than participants in the control and reference price conditions. A mediation analysis revealed the serial mediating impact of loss framing and pain of paying on purchase likelihood across prices.

Save More Later? The Roles of Present Bias and Perceived Urgency

EXTENDED ABSTRACT

Previous research has shown that choice architects can increase farsighted behavior by offering the option to pre-commit (e.g., Milkman, Rogers, and Bazerman 2009)we analyze the film rental and return patterns of a sample of online DVD rental customers over a period of four months. We predict and find that should DVDs (e.g., documentaries). People are more likely to save for retirement, for instance, when offered the option to start saving in the future, rather than today (Thaler and Benartzi 2004). We reexamine this idea and show when and why the strategy can backfire.

In a field experiment, 5,196 employees at four US universities were sent a mailing that encouraged them to join a savings plan. Employees were randomly assigned to receive either: (1) the *immediate commitment* mailing, which offered employees an opportunity to immediately enroll in a savings plan or (2) the *simultaneous pre-commitment* mailing, which gave employees the choice to either immediately enroll or pre-commit to enroll months later. Contrary to prior work, offering pre-commitment reduced the likelihood of *immediate* enrollment by 21.4% (p=0.015) with no effect on whether or not people enroll at any time (p=0.25), causing people to save 6% less on average over the eight-month study period (p=.007).

We theorize that offering a pre-commitment option along with an immediate enrollment option (1) reduces the anticipated costs of doing the farsighted behavior (consistent with prior research on present bias) but simultaneously (2) leads people to infer that the choice architect less urgently recommends the behavior. These opposing forces together can explain why pre-commitment can yield a null effect on people's willingness to engage in the farsighted behavior. Meanwhile, lack of perceived urgency may lead people to choose to delay the behavior; thus, offering pre-commitment may cause people to opt to do it later instead of now.

We tested this theory in a preregistered study where 1,161 MTurkers imagined that they just joined a company and had to choose whether to enroll in any of three employer-sponsored benefits programs. Participants were randomly assigned to either the *immediate commitment* condition where they chose which programs they would enroll in immediately or the *simultaneous pre-commitment* condition where they had the option to enroll in each program either immediately or in six months. Consistent with our theory, the results suggest that adding a pre-commitment option (vs. only offering immediate enrollment) made enrolling feel less painful, which increased the number of programs they would enroll in (95% CI of indirect effect=[.02,.07]) but led people to infer that the employer less urgently recommended these programs, which reduced the number of enrolled programs (95% CI=[-.09,-.04]). These competing forces could explain a null effect on program enrollment (*p*=0.40). Furthermore, lower perceived urgency reduced the number of programs that people chose to enroll in immediately (95% CI=[-.07,-.02]).

To reconcile our findings with the Save More Tomorrow (SMarT) intervention, we compared our choice sets with SMarT in a preregistered study (N = 1,499 MTurkers). Participants imagined receiving a mailing about their company's retirement savings plan. They were randomly assigned to one of three conditions. In the *immediate commitment condition,* participants only had the option to enroll immediately. In the *simultaneous pre-commitment* condition (mimicking the simultaneous pre-commitment condition in our field experiment), they had the option to either enroll immediately or enroll in four months. In the *sequential pre-commitment* condition (mirroring the classic design of SMarT), they were first given the option to enroll immediately, and then if they declined, they were offered the option to enroll in four months. Consistent with our theory, participants in the *immediate commitment* condition viewed their company as conveying a stronger recommendation to save (M=5.10, SD=1.42) than participants in the *simultaneous pre-commitment* condition (M=4.77, SD=1.58), p<0.001). Moreover, participants in the *sequential pre-commitment* condition inferred a marginally stronger recommendation to save than participants in the *immediate commitment condition* ($M_{sequential}$=5.27; $M_{immediate\ commitment}$=5.10; p=0.06), which may offer a potential explanation for why SMarT is able to capitalize on the power of pre-commitment without backfiring.

We tested our full theory in an incentive compatible experiment (N = 2,399). Following a filler task, participants were offered an optional, unpaid ten-minute financial well-being assessment. Participants were randomly assigned to either be offered (1) the option to take the assessment now (the *immediate commitment condition*), (2) the option to take the assessment either now or in 1 week (the *simultaneous pre-commitment* condition), or (3) the option to take the assessment now followed by the option to take it in 1 week if they declined (the *sequential pre-commitment* condition). Consistent with our theory, participants that were offered *sequential pre-commitment* were more likely to enroll (57%) compared to participants offered *simultaneous pre-commitment* (48%) or *immediate commitment* (32%). Participants offered *simultaneous pre-commitment* were marginally less likely to enroll immediately (28%) than participants offered *immediate commitment* (32%; *p* = .07). This may happen because, while both *sequential pre-commitment* and *simultaneous pre-commitment* made the farsighted behavior (taking a financial-well-being assessment) seem less costly ($M_{sequential}$=4.2 & $M_{simultaneous}$=4.2 VS. $M_{immediate\ commitment}$=4.5), *sequential pre-commitment* increased the perception that the action is urgently recommended and *simultaneous pre-commitment* decreased this perceived urgency ($M_{sequential}$=4.2 VS. $M_{immediate\ commitment}$=3.9 VS. $M_{simultaneous}$=3.6). Our mediation analyses confirmed that while anticipated costs always positively mediated the relationship between receiving a pre-commitment option and likelihood of enrolling in the assessment, perceived urgency negatively mediated this relationship when pre-commitment was offered simultaneously and positively mediated when it was offered sequentially.

In sum, we develop and test a new theory about how different forms of pre-commitment nudges impact whether and when people engage in farsighted behavior. While prior research suggests that pre-commitment nudges can increase farsighted behavior by reducing the anticipated costs of doing farsighted behavior, we document an

overlooked mechanism; people draw inferences about the urgency with which the choice architect recommends the behavior based on the sequence with which pre-commitment options are offered. More generally, the current research contributes to a growing literature about decision makers' inferences about the motives and implicit recommendations of choice architects (Krijnen, Tannenbaum, and Fox 2017). Researchers and practitioners can anticipate and leverage these inferences to better design choice architecture that works as intended rather than backfiring.

REFERENCES

Ariely, Dan and Klaus Wertenbroch (2002), "Procrastination, deadlines, and performance: Self-control by precommitment," *Psychological science*, 13(3), 219-224. Bureau of Labor Statistics (2017), "American Time Use Survey".

Cheema, Amar and Dilip Soman (2006), "Malleable mental accounting: The effect of flexibility on the justification of attractive spending and consumption decisions," *Journal of Consumer Psychology*, 16(1), 33-44.

Etkin, Jordan (2016), "The Hidden Cost of Personal Quantification," *Journal of Consumer Research*, 42(6), 967-984.

Gollwitzer, Peter M. and Paschal Sheeran (2006), "Implementation intentions and goal achievement: A meta-analysis of effects and processes," *Advances in experimental social psychology,* 38, 69-119.

Heath, Chip, Richard P. Larrick, and George Wu (1999), "Goals as Reference Points," Cognitive Psychology, 38 (1), 79-109.

Heath, Chip and Jack B Soll (1996), "Mental Budgeting and Consumer Decisions," *Journal of Consumer Research*, 23 (1), 40–52.

Huberman, Michael and Chris Minss (2007), "The times they are not changin': Days and hours of work in Old and New Worlds, 1870-2000," *Explorations in Economic History, 44,* 538-467.

Kőszegi, Botond (2006), "Emotional Agency," *The Quarterly Journal of Economics*, 121 (1), 121–55.

Krijnen, Job M. T., David Tannenbaum, and Craig R. Fox (2017), "Choice Architecture 2.0: Behavioral Policy as an Implicit Social Interaction," *Behavioral Science & Policy*, 3(2), i–18.

Melumad, Shiri, and Michel Tuan Pham (2020), "The Smartphone as a Pacifying Technology," *Journal of Consumer Research*, https://doi.org/10.1093/jcr/ucaa005.

Milkman, Katherine L., Todd Rogers, and Max H. Bazerman (2009), "Highbrow Films Gather Dust: Time-Inconsistent Preferences and Online DVD Rentals," *Management Science*, 55(6), 1047-4059.

Shefrin, Hersh M. and Richard H. Thaler (1988),"The behavioral life-cycle hypothesis," *Economic inquiry,* 26(4), 609-643.

Soman, Dilip, and Amar Cheema (2004), "When Goals are Counterproductive: The Effects of Violation of a Behavioral Goal on Subsequent Performance," *Journal of Consumer Research*, 31(1), 52-62.

Southerton, Dale (2003). "'Squeezing Time': Allocation practices, coordinating networks and scheduling society," *Time and Society,* 12(1), 5-25.

Thaler, Richard H. (1985), "Mental Accounting and Consumer Choice," *Marketing Science*, 4 (3), 199–214.

Thaler, Richard H. and Shlomo Benartzi (2004), "Save More Tomorrow: Using Behavioral Economics to Increase Employee Saving," *Journal of Political Economy*, 112(1).

Tonietto, Gabriela and Selin A. Malkoc (2016), "The calendar mindset: Scheduling takes the fun out and puts the work in," *Journal of Marketing Research*, 53(6), 922-936.

Trope, Yaacov and Nira Liberman (2010), "Construal level theory of psychological distance," *Psychological Review*, 117(2), 440-463.

Unger, Lynette S. and Jerome B. Kernan (1983), "On the meaning of leisure: An investigation of the subjective experience," *Journal of Consumer Research,* 9(4), 381-392.

Wallace, Scott G., and Jordan Etkin (2018), "How Goal Specificity Shapes Motivation: A Reference Points Perspective," *Journal of Consumer Research,* 44 (5), 1033-1051.

Whillians, Ashley V., Elizabeth W. Dunn, Paul Smeets, Rene Bekkers, and Michael I. Norton (2017), Buying time promotes happiness, *PNAS*, 114(32).

Zauberman, Gal and John G. Lynch Jr. (2005), Resource slack and propensity to discount delayed investments of time versus money, *Journal of Experimental Psychology: General, 134(1),* 23-37.

Shining A Light on Female Power: Women's Experiences of Transcending Aging

Chairs: Pilar Rojas Gaviria, Marketing Lecturer, University of Birmingham, UK
Céline Del Bucchia, Associate Professor, Marketing, Audencia Business School, France

Paper #1: Reclaiming the Crone: Reimagining Old Age and Feminine Power

Lorna Stevens, University of Bath, UK
Pauline Maclaran, University of Royal Holloway, UK
Olga Kravets, University of Royal Holloway, UK

Paper #2: 'The Foreigner within us': Catharsis amid Horror and Confusion in Menopause

Pilar Rojas Gaviria, University of Birmingham, UK
Céline Del Bucchia, Audencia Business School, France
Camilla Quental, Audencia Business School, France

Paper #3: Opportunities and Challenges for Aging Women in CoCreating Value in the Elderly Consumption Ensemble

Lisa Peñaloza, Kedge Business School, Bordeaux, France
Carol Kelleher, University College, Cork, Ireland
Michelle Barnhart, Oregon State University, USA

Paper #4: Wisdom Examined via a Qualitative Investigation of the Bathing Rituals of Aging Moroccan Women and their Granddaughters

Delphine Godefroit-Winkel, Toulouse Business School, Casablanca Campus, Morocco
Marie Schill, Université de Reims, Champagne Ardenne, France
Margaret K. Hogg, Lancaster University, UK

SESSION OVERVIEW

"It is a mistake to regard age as a downhill grade slide towards dissolution. The reverse is true. As one grows older, one climbs upwards with surprising strides." - **George Sand**

While a large amount of research on aging consumers has focused on the paradigm of the privation that accompanies aging (Mochis 2012), this special session focuses on how women transcend the stereotypes of aging and nurture their capacity to create and co-create alternative social imaginaries with respect to their feminine aging process. The special session draws from the consumer research literature, which investigates old age and new beginnings (Schau, Gilly & Wolfinbarger, 2009) as well as gender issues (Steinfield, Coleman, Tuncay Zayer, Ourahmoune and Hein 2019).

The four papers examine how women transcend aging and turn it into a creative force. The papers complement each other in examining various facets of feminine aging, focusing on popular culture, the decline of the body, collective experiences in the context of intergenerational transmission, and the Elderly Consumption Ensemble (Barnhart and Peñaloza 2013) in a span of women's life stages from middle life to old age.

Our aim in this session is to extend discussions on women, aging and consumption to counterbalance the traditional view of aging as a state of privation and decline, a moment of lost capacities (Szmigin and Carrigan 2001). This belief has been to the disadvantage of women in comparison to men who are more likely to benefit from positive associations attached to their aging process such as maturity and charisma (Steinfield et al. 2019).

The first paper focuses on cultural representations of the Crone as an empowering figure in popular culture. Their work contributes to this special session by showing how the emerging themes associated with the Crone invite us to reimagine old age and female power.

The second paper focuses on women's narratives reflecting their experience of going through the menopause in the UK. Their work offers a theoretical reflection on how women can transcend their 'unproductive' body.

The third paper explores how the aid of material and technology can enhance value co-creation for elderly women with family members/friends and service providers. It illustrates how women stimulate and leverage their interdependence in the context of the Elderly Consumption Ensemble.

The fourth paper explores intergenerational transmission though the theoretical lens of wisdom. Their paper raises issues about how grandmothers transcend aging thanks to the sharing of wisdom, and how this process helps them to build and maintain their relational identity.

This special session aims to stimulate discussion and further consumer research to shine light on the power of female aging. Together, the four papers raise two key questions: first, how can women enhance our power to transcend age by better understanding and utilizing aspects of consumer culture, the market, and family dynamics? And second, how and what can women's empowerment in aging contribute to a more enlightened society? By gaining more insights into and leverage over the creative aspects of female aging, consumer researchers, policymakers and marketers are able to enhance women's well-being, negotiate brand positioning, develop communication campaigns, and thus advance the discourse of female aging in order to provide more positive and fairer representations.

Reclaiming the Crone: Reimagining Old Age and Feminine Power

EXTENDED ABSTRACT

"The rhythmic phases of the moon waxing and waning, light and darkness, the crescent, sickle-shaped new moon, the full moon, and the waning, darkening moon – the maiden in the crescent, the mother in the full moon and, in the darkening moon, the wise old woman whose light was within her. The Divine Trinity of the Mother Goddess, as old as time itself, endlessly renewing itself – darkness, light, darkness - all aspects of the Mother Goddess to be embraced, expressing the unity of sky, earth, sea, and the rhythmic patterns of nature and all living things." (Baring and Cashford 1993: 63)

Associated with the final stage in the cycle of life, The Crone was the third aspect of the Triple Goddess in ancient culture. Being the wise old woman, the seer, the midwife, and the healer, she symbolised wisdom, knowledge and the underworld. In Irish mythology she was the Dark Morrigan, presiding over death in the battlefield, taking back the bodies of the fallen ones into her eternal, primordial embrace (Stevens and Maclaran 2007). In time the sacred associations of the Triple Goddess (Maiden, Mother, Crone) came to be de-sacralised and diabolized by male-centred religions. (Walker 1985). They supplanted matri-centred societies and replaced the worship of nature and the Mother Goddess with the worship of culture and a Male God and Son. The 'crone' came, in the Middle Ages, to be de-sacralised as an ugly, withered old woman, loathed and feared in

equal measure. She was witchlike, evil, cruel, cantankerous; a hag, an old bag, an old bat (Collins Thesaurus); she was an object 'usually of contempt' (Webster Dictionary).

The contempt expressed for the post-menopausal woman, often depicted as physically repulsive, argumentative and difficult, has echoed down through the centuries, and nowhere is this contempt more visible than in Western popular culture, where women's youth, beauty and fecundity is worshipped (acknowledging the Maiden and the Mother), but older women (the Crone) are viewed with horror, fear and revulsion.

This negative perception of the Crone, reflected historically in the Patriarchal suppression of Goddess Culture and in contemporary society by negative attitudes towards aging women, has always been challenged by feminists (Rountree 1997; Ronn and Daugaard 2005). This is aided by the flourishing of contemporary counter-cultural movements such as Neopaganism and Wicca (Griffin, 1995). The crone is now reinstated, re-imagined and reinvigorated in our 'collective consciousness' (Walker, 1985), as women grow increasingly tired of the negative associations that go with being beyond the menopause (Bay 2004; Pearsall 2018) and seek to reframe how we think about the Crone and the aging woman.

The crone, often a vilified and marginalised figure, is thus a positive archetype and force in contemporary women's culture, her fire fanned by the internet. She is celebrated as a source of wisdom, knowledge, freedom and feminine power, as evidenced by the proliferation of books, websites, forums, workshops, retreats, artworks, magazines and e-zines, performances, music, workbooks, and films, all of which reclaim the Crone for our times. Drawing on these popular culture sources, we reveal key themes associated with the crone that assist women in reclaiming her as an empowering figure, namely: freedom to choose; a disruptive cackle; and the censoring look. Then, using Butler's theory of gender performativity (Butler 1990; 1993), we discuss how these themes denote a range of resignifying practices that challenge existing ideals of femininity and disrupt norms that value a youthful - as opposed to aged - female body.

'The Foreigner within us': Catharsis amid Horror and Confusion in Menopause

EXTENDED ABSTRACT

"The worst symptom is never mentioned: there is a post-menopausal elephant in the bedroom and its name is Dry Vagina (...) A person can apply only so much lubrication. Even then, penetration is excruciating. (...) Finally, I developed a vaginal infection (...) So what are all those other post-menopausal, sexually active women doing (referring to celebrities)? Have they miraculously escaped?" (reader's testimonial, The Guardian, 2019_01_04).

"When biology no longer defines a body by its potential to reproduce, a woman will find further equality in her relationships." (journalist's testimonial, The Guardian, 2019_05_19)

"Insomnia gone, full of energy, no more night sweats, only very occasional flushes and a new confidence and stronger sense of self." (reader's testimonial, The Guardian 2019_08_25)

"I catch glimpses of the enthusiastic child I once was, and intimations of an older woman's wisdom, hard-won through a lifetime of experience. 'I feel like a snake, shedding its own skin,' I told a friend recently. On the surface I may look more or less the same. Inside, nothing is as it was." (female writer's testimonial, The Guardian, 2008_01_05)

One of the major assumptions of popular culture is that "a woman is her body", or more specifically, her body's reproductive capacity. "'In the hyper visible landscape of popular culture, the body is recognized as the object of women's labor: it is her asset, her product, her brand and her gateway to freedom and empowerment in a neoliberal market economy.' (Winch 2015, 233)." The centrality of woman's role as a mothering agent has resulted in less attention given to the development of women in midlife when reproductive capacities diminish and women start to become invisible in cultural representations (Segal 2014). Moreover, when attention focuses on women's middle life, the concern is often exclusively biological (Ballard, Elston, Gabe 2009, Gerguen 1990, p476), perpetuating the assumption that women are their body.

The hyper visibility of the reproductive body emphasizes the fact that the menopause is seen as a decline. Corus and Saatcioglu (2012) refer to the literature on the menopause as a loss, guided by medical discourse: "Although menopause is a natural hormonal transformation, it is sometimes treated as a 'process of breakdown, failure and decline'" (Martin 2001, p43, cited in Corus and Saatcioglu 2012). In this mainstream medical discourse, the menopause is described as a problem of hormone deficiency, a pathological state that needs to be treated. "Terms such as 'deterioration', 'wearing out', 'failing', 'no longer up to it' and 'getting slower' are traditionally used to describe the age-related physiological changes within the body" (Ballard et al. 2009, 279). Alternative stances, like the natural perspective, view the menopause as a natural physiological transformation that brings with it new roles and freedoms in women's lives (Corus and Saatcioglu 2012).

We tend to focus on women's biological aging and pay less attention to the cultural dimension of aging. This is what Susan Sontag (1972) called 'The double Standard of aging' (14): women are marginalized and diminished when youthful looks depart (Segal 2014), and are subject to growing gender inequality in aging (Steinfield, Coleman, Tuncay Zayer, Ourahmoune, and Hein 2019). However, feminist writers have highlighted some powerful aspects of female aging (Segal 2014, Pearsall 2018, Beauvoir 1970), referring to the real self versus the aging self. More recently, consumer researchers have called for further investigation into new understandings of the context of aging (Schau, Gilly, and Wolfinbarger 2009, Barnhart and Peñaloza 2013, Corus and Saatcioglu 2012). Our paper contributes to this call for alternative perceptions of aging by examining the context of women's experiences of the menopause.

In this study, we seek alternative discourses about the menopause experience. How do women live and make sense of their transformation in relation to the menopause? How can these women, at the intersectionality between age and gender, re-empower themselves? We collected 1000 articles referring to the menopause and published in the Guardian newspaper between 2005 and 2020. Among them, 150 articles included personal testimonials about the menopause experience written by regular readers and opinion leaders (female journalists, artists, managers).

We conducted our analysis based on these 150 testimonials. They reveal three main themes: 1. Confusion and taboo, 2. Menopause horrors as experienced by the writers, 3. Catharsis. The study expands on the philosophical ideas of Julia Kristeva (1991) about being *strangers to ourselves* to further explore the menopause as a lived experience. Kristeva suggests searching deep inside ourselves

for our more profound fears about those we call 'the foreigners'. In a similar way, old age is often approached with the same kind of fear that is felt with regard to foreigners. By welcoming the other within us, in other words, aging and the menopause, by facing the confusion and sometimes the horror it arouses in women and society at large, we may be able to get a better understanding of the strangeness of aging and its cathartic benefits. Our study goes beyond the dichotomy between medicalization and a more 'natural' approach to dealing with the menopause by representing women's experiences with the menopause as an embodied encounter with the strangeness of an 'unproductive' body.

One interesting finding of the study has to do with the distribution of voices among the different opinion pieces. Testimonials from regular readers frequently refer to confusion and horror with regard to the menopause, while its cathartic and empowering nature is defended to a greater degree by the testimonials of female opinion leaders rather than by regular readers.

This paper contributes to the discussion of female aging in middle life. It extends prior research that opposed the mainstream medical discourse on menopause with the feminist discourse (Corus and Saatcioglu 2012) by showing the capacity of women to transcend their unproductive and declining body and reveal themselves beyond their body. In this process, becoming "strangers to themselves" helps women to distance themselves from the patriarchal assumptions that associate them uniquely with their bodies. In this context, the paper raises the question of how the empowerment testimonials of women opinion leaders can support or clash with regular women in their journeys to discover the other within themselves.

What's Love Got to Do with It that Technology can't Handle? Opportunities and Challenges for Aging Women in CoCreating Value in the Elderly Consumption Ensemble

EXTENDED ABSTRACT

They need me. I mean, if they are capable to be alone, they will not need me. –Maria, paid caregiver, age 55

There really is…a need for a book, the Dr. Spock parenting book for doing this, cause there's just so much…You've been living your own life and now you're 55 years old, suddenly somebody has to inherit Mom… –Kevin, age 60

If my iPad were a woman, I'd marry her! Doris, age 76

Persons 65 years of age and over represent approximately 18% of the population in Europe, as compared to 9% in the U.S. (Population Reference Bureau 2019). In the U.S. persons over the age of 65 exhibit somewhat similar rates of home ownership (78%) and internet access (76%), although patterns of living alone, with family members, and with nonfamily members tend to vary with the loss of sight, hearing, mobility, cognitive ability, and self-care that many persons experience as they advance in age (Roberts, Ogunwole, Blakeslee and Rabe 2018). The opening quotes illustrate the importance of family, service providers, and technology, and previous research strongly and repeatedly shows that greater social contacts bring about higher and longer quality of life (Pettigrew and Moschis 2012; House, Landis, and Umbertson 1988). And yet, what is the impact of technology on value cocreation in the elderly consump-

tion ensemble (ECE hereafter, Barnhart et al. 2014; Barnhart and Peñaloza 2013)—how might it enhance these social and market ties?

This research builds on previous work on the ECE by developing theoretical and practical insights pertaining to the cocreation of value (Karababa and Kjeldgaard 2014; Kelleher et al. 2019; Storbacka et al. 2016) by examining the experiences and concerns of elderly women. Elderly women's value cocreation in consumption in the ECE is of particular importance for their quality of life and for the societies they inhabit. Notably, of the 49 million persons in the U.S. over the age of 65, 55% are women (Roberts et al. 2018), with an average life expectancy of 81 years compared to 76 years for the 45% who are men (Population Reference Bureau 2019). In addition to living longer on average, and having played particular roles in families and households for those who have/did not have children, aging women have distinct life situations and experiences that shape and impact their consumption (Drolet et al. 2010). According to a recent census report on the elderly in the U.S. (Roberts et al. 2019), elderly women have lower levels of education (approximately 1 in 5 women over the age of 65 have at least a bachelor's degree as compared to 1 in 3 men of the same age), income (their respective median incomes are $41,200 versus $56,850 for men), and poverty (11% of women live below the poverty level as compared to 7% of men in this same age cohort), and exhibit higher rates of employment (14% of women continue to work as compared to 22% of men).

The context of this study is the U.S., in drawing from empirically grounded analysis of interviews exploring the daily life of aging American women in relation to family members/friends and paid care providers in 10 ECEs, participant experience in researchers' families, and representations of elderly women in popular culture. Our findings detail the circumstances and patterns of relationships in the ECE, as aging women cocreate value with and against family members/friends and service providers, with the aid of material and technology. To explain the figure: in the circle at the top left, the figure illustrates an existing division of consumption 'labor' activities among the elderly person, E, family member/friend(s), F, and paid provider(s), P. While all persons within the ECE utilize technology, we focus on its use by the elderly person in this study, as designated by MT at the top, center of the diagram. Circumstances that alter this division of consumption labor activities include changes in the health, physical abilities, and living arrangements of the elderly person, their proclivities, and relations with others, as well as changes in the participation of other members of the ECE. In turn, these changes ripple through the ECE in altering patterns of collaboration (E and F begin to jointly pay bills, for example), alliances (E and P exclude F from an activity, for example), conflict (between E and F, or F and P, for example), deferral (E defers to F to enhance their relation, F defers to the expertise of P, for example), and dis/engagement (E fires P or F exits the ECE, as examples).

Discussion elaborates how the women empower themselves by leveraging technology in cocreating value with other agents in the ECE, by enhancing their capabilities to monitor health and living arrangements, handle finances, procure provisions, maintain social relationships with ECE and others, and remain active in their communities by keeping abreast of/participating in local events/interest groups. Implications concern women's autonomy and vulnerabilities in enhancing such value cocreation through the use of technology in dynamic, ongoing, and emergent experience and interaction with family members, friends, and service providers in the ECE and beyond, and in favorably comparing their life situations and experiences with those of others, both real life and mediated. The presentation closes with promising avenues for further research.

Wisdom Examined via a Qualitative Investigation of the Bathing Rituals of Aging Moroccan Women and their Granddaughters

EXTENDED ABSTRACT

This study investigates how aging women (Barnhart and Peñaloza 2013) exhibit consumer wisdom (Luchs and Mick 2018; Luchs, Mick and Haws under review) in their families. It specifically examines how wisdom is revealed during the public bathing practices and rituals of older Moroccan women with their granddaughters.

Wisdom in consumer behavior research refers to "the pursuit of wellbeing for oneself and for others through mindful management of consumption-related choices and behaviors as realized through the integrated application of intentionality, contemplation, emotional mastery, openness, and transcendence" (Luchs and Mick 2018, 371). The five facets of consumer wisdom refer to specific dimensions and traits – cognitive, affective, and behavioral characteristics and tendencies. Recently, Luchs, Mick and Haws (under review) extended their framework and depict six dimensions to consumer wisdom in the specific context of purchase decisions: lifestyle responsibility, purpose, flexibility, perspective, prudent reasoning, and transcendence. Lifestyle responsibility corresponds to how people resist temptation to achieve their lifestyle goals. Purpose relates to prioritizing experiences that help build relations with others. Flexibility is about sharing things with others. Perspective refers to the efforts made to grasp multiple perspectives. Prudent reasoning is about being cautious before making a decision. Transcendence refers to ethical, communal, and environmental values.

How consumer wisdom manifests and is understood heavily depends on contextual settings (Hall 2010). In the marketing and consumer behavior fields, research on wisdom has essentially focused on business managers (Mick, Bateman and Lutz 2009), shoppers (Mick, Spiller and Baglioni 2012), gatekeepers in local organizations (Luchs and Mick 2018), or innovative members of e-tribes (Kozinets, Hemetsberger and Schau 2008). However, little is known about how wisdom manifests in family settings and intergenerational exchanges, and particularly the intersection between consumer wisdom and aging women in intergenerational exchanges.

Grandmothers embrace various individual, relational and collective identities (Epp and Price 2008), which are embedded in intergenerational exchanges. Intergenerational exchanges were examined between adult children and their parents (Karanika and Hogg 2016) and between grandmothers and their young grandchildren (Godefroit-Winkel, Schill and Hogg 2019). However, little is known about how grandmothers' wisdom plays out in intergenerational exchanges particularly between grandmothers and their granddaughters.

This study aims to fill this gap by capturing Moroccan grandmothers' and granddaughters' narratives about bathing rituals and practices. In the Arab world, women traditionally go to the public bath, *hammam,* each week. While today many families have their own private bathroom in their homes, going to the public bath remains an important practice among both younger and older Moroccan women. This study captures how both Moroccan grandmothers and their teenage/adult granddaughters shape and ascribe meanings to a ritual that is steeped in history.

To grasp a deeper understanding of how wisdom works between grandmothers and granddaughters in the context of bathing rituals and practices, we conducted long interviews (McCracken 1988) with 12 Moroccan grandmothers in their homes, and with their granddaughters (age 16-24; varied socio-cultural backgrounds). We also used participant observation in public baths in Casablanca, Morocco. Interviews ranged from 45 minutes to 2 hours.

Data was analyzed following recommendations for qualitative data analysis (Moisander and Valtonen 2006). The authors analyzed the data first separately and then together (Sherry 2007). Iteration was used to form, revise, and develop understandings of the entire data set. The data analysis focused on informants' reflexive thoughts about bathing experiences and their relationships with their relatives. After considering several theoretical frameworks, we were able to identify how wisdom emerged in narratives.

Our findings first uncover how grandmothers use their wisdom in the building of their relational identities with their granddaughters. Specifically, it shows how grandmothers' wisdom is manifested - through sharing their views on lifestyle responsibility, purpose, flexibility, perspective, prudent reasoning and transcendence (Luchs, Mick and Haws under review) - as they build their relational identities with their granddaughters in the context of bathing practices.

Second, this study unveils how grandmothers' wisdom is informed by their granddaughters' consumption practices. In particular, grandmothers integrate contextual cues related to their bathing practices with their granddaughters to redefine their own sense of wisdom. This result complements existing work, which has essentially focused on how one's *personal* consumption is used to develop wisdom (Luchs, Mick and Haws under review).

Finally, this study highlights how granddaughters - younger women - build their own sense of wisdom when they interact with their grandmothers, and how they learn from their grandmothers' consumption experiences. This finding contributes to existing knowledge on wisdom, which has mainly conceived wisdom building as an individual process, which occurs in late adulthood (Hall 2010).

Our study contributes to existing literature about consumer wisdom and relational identity in old age as related to bathing and beauty rituals in consumption. It extends prior research on wisdom, and takes account of interpersonal relations (Luchs and Mick 2018) and contextual cues (Hall 2010). Grandmothers' wisdom refers to the collective pursuit of balanced relational identities and family members' wellbeing through shared consumption experiences. Grandmothers' wisdom is co-created in intergenerational exchanges.

REFERENCES

Ballard, Elston, Gabe (2009), "Private and Public Ageing in the UK The Transition through the Menopause," Current Sociology Vol. 57 No. 2 Monograph 1

Baring, Anne and Cashford, Jules (1993), *The Myth of the Goddess: Evolution of an Image*, London: Penguin.

Barnhart, M., Huff, A.D. & Cotte, J. (2014). Like a member of the family: including and excluding paid caregivers in performances of family. *Journal of Marketing Management, 30:15-16*, 1680-1702.

Barnhart, Michelle and Lisa Peñaloza (2013), "Who are you calling old? Negotiating Old Age Identity in the Elderly Consumption Ensemble," *Journal of Consumer Research*, 39 (April), 1133-1153.

Bay, Ruth E. (2004) "Towards the Croning of Feminist Gerontology", *Journal of Aging Studies*, 18 (1), pp. 109-121.

Beauvoir de Simone (1970), *La Vieillesse*, Collection Blanche, Gallimard, Paris.

Butler, Judith (1990). *Gender Trouble: Feminism and the Subversion of Identity, (2ⁿᵈ ed.).* New York: Routledge.

_____ (1993). *Bodies That Matter: On the Discursive Limits of 'Sex'*. New York: Routledge.

Corus, Canan and Bige Saatcioglu (2012), The Social Construction of Womanhood in MiddleAge: Menopause As a Rite of Passage. *Advances in Consumer Research*, eds. Zeynep Gürhan-Canli, Cele Otnes, and Rui (Juliet) Zhu, Duluth, MN: Association for Consumer Research, 40,18-21.

Drolet, Aimee, Norbert Schwartz, and Carolyn Yoon (2010), "*The Aging Consumer: Perspectives from Psychology and Economics*," NY: Routledge.

Epp, Amber M. and Linda L. Price (2008), "Family Identity: A Framework of Identity Interplay in Consumption Practices," *Journal of Consumer Research*, 35 (1), 50–70.

Gergen, Mary M. (1990), Women's Development within the Patriarchy. *Psychology of Women Quarterly*, 14, 471-493.

Godefroit-Winkel, Delphine, Marie Schill and Margaret Hogg (2019), "The Interplay of Emotions and Consumption in the Relational Identity Trajectories of Grandmothers with their Grandchildren," *European Journal of Marketing*, 53 (2), 164-194.

Gopaldas, Ahir and Anton Siebert. (2018), Women over 40, foreigners of color, and other missing persons in globalizing mediascapes: understanding marketing images as mirrors of intersectionality, *Consumption Markets & Culture*, 21:4, 323-346, DOI:10.1080/10253866.2018.1462170

Griffin, Wendy (1995), "The Embodied Goddess: Feminist Witchcraft and Female Divinity', *Sociology of Religion*, 56 (1), pp. 35-48.

Hall, Stephen S. (2010), *Wisdom, From Philosophy to Neuroscience,* New York, NY: Vintage Books.

House, J.S., K.R. Landis, and D. Umbertson (1988), "Social Relationships and Health," *Science,* 241: 540-545.

Karababa, Eminegul and Dannie Kjeldgaard (2014), "Value in Marketing: Toward sociocultural perspectives," *Marketing Theory,* 14(1) 119–127.

Karanika, Katerina and Margaret K. Hogg (2016), "Consumption Through the Ambivalent Prism of Intergenerational Support", *European Journal of Marketing*, 50, 3/4, 575-601.

Kelleher, Carol, Dierdre O'Loughlin, Johanna Gummerus, and Lisa Peñaloza (2019), "Viewing the Kaleidoscope: Orchestration of Value Co-Creation," *Journal of Service Research*, published online 7 November.

Kelleher, Carol and Lisa Peñaloza (2017), *"Aging and Consumption" in* Part 5, Consumption and Social Divisions, *The Routledge Handbook on Consumption,* Margit Keller, Bente Halkier, Terhi-Anna Wilska, Monica Truninger, editors, London: Routledge, pp. 326-338.

Kozinets, Robert V., Andrea Hemetsberger and Hope J. Schau (2008), "The Wisdom of Consumer Crowds: Collective Innovation in the Age of Networked Marketing," *Journal of Macromarketing*, 28, 4, 339-354.

Kristeva Julia (1991), *Strangers to Ourselves*, Translated by Leon S. Roudiez, Columbia University Press.

Luchs, Michael G. and David G. Mick (2018), "Consumer Wisdom: a Theoretical Framework of Five Integrated Facets," *Journal of Consumer Psychology*, 28, 3, 365-392.

Luchs, Michael G., David G. Mick and Kelly L. Haws (under review), "Measuring and Understanding Consumer Wisdom for Personal Well-Being".

McCracken, Grant (1988), *The Long Interview*, Newbury Park: Sage.

Mick, David G., Thomas S. Bateman, and Richard L. Lutz (2009), "Wisdom, Exploring the Pinnacle of Human Virtues as a Central Link from Micromarketing to Macromarketing," *Journal of Macromarketing*, 29, 2, 98-118.

Mick, David G., Stephen A. Spiller and Anthony J. Baglioni (2012), "A systematic Self-Observation Study of Consumers' Conceptions of Practical wisdom in Everyday Purchase Events," *Journal of Business Research*, 65, 7, 1051-1059.

Moisander, Johanna and Anu Valtonen (2006), *Qualitative Market Research: A Cultural Approach,* London: Sage Publication.

Moschis, George P. (2012), "Consumer Behavior in Later Life: Current Knowledge, Issues, and New Directions for Research," *Psychology & Marketing.* Vol. 29, 2, 57-75.

Pearsall, Marilyn (ed.) (2018) *The Other Within Us: Feminist Explorations of Women and Aging*, Routledge, London.

Pettigrew, S. and G. Moschis (2012), Consumer Wellbeing in Later Life. In D.G. Mick, S. Pettigrew, C. Pechmann and J.L. Ozanne, eds., *Transformative consumer research: for personal and collective well-being*, London: Routledge, p. 565-582.

Population Reference Bureau (2019), Population Bulletin, "Aging in the United States," Washington, DC. https://www.prb.org/aging-unitedstates-fact-sheet/

Roberts, Andrew W., Stella U. Ogunwole, Laura Blakeslee, and Megan A. Rabe, (2018), "The Population 65 Years and Older in the United States: 2016 American Community Survey Reports, Washington, D.C. U.S. Printing Office: U.S. Bureau of the Census, October 2018, ACS-38. https://www.census.gov/content/dam/Census/library/publications/2018/acs/ACS-38.pdf.

Ronn, Vicki and Daugaard, Kaylene (2005), "The Crone Conspiracy", *International Journal of the Humanities,* (Sept), 3 (1), pp. 43-50.

Rountree, Kathryn (1997), "The New Witch of the West: Feminists Reclaim the Crone", *Journal of Popular Culture*, 30 (4), (Spring), p. 211.

Schau, Hope Jensen, Gilly, Mary C., Wolfinbarger, Mary (2009), "Consumer Identity Renaissance: The Resurgence of Identity-Inspired Consumption in Retirement". *Journal* of *Consumer Research*. Vol. 36 Issue 2, p255-276. DOI: 10.1086/597162.

Segal Line (2014), *Out of time, the pleasures and perils of ageing*, Verso, London.

Sherry, John F. (2007), "Fielding Ethnographic Teams: Strategy, Implication and Evaluation," in *Handbook of Qualitative Methods in Marketing and Consumer Research*, ed. Russell Belk, Northampton, MA: Elgar, 261-276.

Steinfield, Laurel A., Catherine A. Coleman, Linda Tuncay Zayer, Nacima Ourahmoune, Wendy Hein (2019), "Power logics of consumers' gendered (in)justices: reading reproductive health interventions through the transformative gender justice framework*",Consumption Markets & Culture*, 22:4, 406-429, DOI: 10.1080/10253866.2018.1512250

Sontag Susan (1972), "The double standard of aging ", The Saturday Review, New York.

Stevens, L. and Maclaran, P. (2007), "Exploring the Celtic Narrative in Advertising: Goddess Culture and the Lexicon of Perfumery", *Journal of Strategic Marketing*, February, 15, 29-39.

Storbacka, Kaj, Roderick J. Brodie, Tilo Böhmann, Paul P. Maglio, and Suvi Nenonen (2016), "Actor Engagement as a Microfoundation for Value Co-Creation", *Journal of Business Research,* 69 (8), 3008-3017.

Szmigin, Isabelle and Marylin Carrigan, M. (2001), "Learning to love the older consumer", Journal of Consumer Behaviour, 1: 22-34. doi:10.1002/cb.51

Walker, Barbara G. (1985), *The Crone: Woman of Age, Wisdom and Power*, HarperCollins Publishers, New York.

Winch, Alison (2015), "Brand Intimacy, Female Friendship and Digital Surveillance Networks," *New Formations*, 84-85: 228-45.

The Body and Equipment: Understanding Consumption Through Relationships Between Body and Equipment

Chairs: Annetta Grant, Bucknell University, USA
Robin Canniford, University of Melbourne, Australia

Paper #1: Why Do Consumers Put Their Bodies at Risk? A Reflexive Modernist Analysis of CrossFit's Marketplace Culture
Craig Thompson, University of Madison-Wisconsin, USA
Anil Isisag, Emlyon Business School, France

Paper #2: The Socio- and Material-Temporal Routines of Mothering: Why and How Physical Activity Often Fails to Fit
Fiona Spotswood, University of Bristol, UK

Paper #3: Assembling Embodiment: Body, Techniques and Things
Stephen Murphy, University of Essex, UK

Paper #4: Extending Flow: How Place, Materials, and Body Create Restorative Consumption in Nature
Annetta Grant, Bucknell University, USA
Avi Shankar, University of Bath, UK
Robin Canniford, University of Melbourne, Australia

SESSION OVERVIEW

The body is the primary conduit to consumers' sense and understanding of the world (Canniford et al 2019; Joy and Sherry 2003). The body is a site at which consumers enact self-identity (Roux and Belk 2019; Patterson and Schroeder 2010), reflexivity (Husemann and Eckhardt 2019; Thompson and Üstüner 2015), as well as pleasure and pain (Goulding et al. 2009; Scott, Cayla, Cova 2017). In all cases, however, the consumer's body is surrounded and augmented with forms of physical and discursive equipment. By equipment, we mean sets of devices used to achieve practical ends (Rabinow 2009). Equipment can span multiple scales, from the apparatus of the individual body (Zanette and Scaraboto 2019), through meso-level assemblages of body and consumption goods (Murphy et al 2018), to technologies that link consumers into large-scale dispositifs (Lupton 2015). In this special session, we extend current understandings of embodiment with new perspectives on the relationships between consumers' bodies and equipment. We explore material and non-material concepts of equipment to ask: What does the relationship between body and equipment reveal about consumption? And more particularly how does considering different facets of equipment enlighten an understanding of embodiment?

The first paper considers how consumers mobilize and shape their bodies in preparation for contingencies and imminent threats through the equipment common to the global phenomenon of CrossFit. Based on a two-year ethnography, this study analyses CrossFit's marketplace culture as a meso-level inflection of reflexive modernization. The study's findings offer an alternative to extant existential and neoliberal explanations of consumer's embodied risk-taking.

The second paper considers the equipment of time, and time as equipment. Through an analysis of diary data and depth interviews with mothers from deprived urban areas, this study illuminates the entangled practices and temporalities of mothering. The resulting configurations shape the (im)possibilities of physical activity and mothering. A body equipped with time is better off, but the equipment of time is both gendered and classed, raising considerations for rising levels of obesity.

In the third paper, the materials necessary for hobby motorcycle repair constitute the equipment for expressing embodied masculin-

ity. This study examines the embodiment of material culture to show how consumers assemble masculinity through an array of socio-material practices. Findings show how the dualistic categories of mind/body and subject/object dissolve in the intricacies of embodied socio-material relations.

The fourth paper considers skill and knowledge as equipment through which consumers effect body practices that have restorative benefits. In an ethnographic study of hobby fly fishing, we contribute an extended theory of flow to show how consumers bodies, the environment, and fishing equipment create restorative experiences.

We use various contexts, theoretical, and methodological approaches to body-equipment relationships to reveal new perspectives on the role of the body in consumer experience, consumer responsibilization, and gendered understandings of practices. This session embraces the suggested conference themes of technology (equipment) and obesity. The session is especially relevant for researchers interested in embodiment, temporality, and practice and assemblage theories.

Why Do Consumers Put Their Bodies at Risk? A Reflexive Modernist Analysis of CrossFit's Marketplace Culture

EXTENDED ABSTRACT

Consumer researchers and sports sociologists have taken an interest in understanding why consumers choose to literally put their bodies on the line, subjecting themselves to extreme physical stress and pain, and to risk injury (and even death) in the service of autotelic leisure activities (Atkinson 2011; Celsi, Rose, and Leigh 1993; Dawson 2017; Scott, Cayla, and Cova 2017; Saville 2008; Schneider, Butryn, Furst, and Masucci 2007). These studies have been framed by two distinct interpretive frameworks, which we refer to as the existential and neoliberal models, each highlighting a different set of explanatory socio-cultural conditions.

The existential model builds on the work of David Le Breton (2000) and argues that such risk-taking activities provide individuals opportunities for spiritual quests and authenticating experiences that they find lacking in the rationalized flow of modern life and its bureaucratic work orders (Celsi et al. 1993; Scott et al. 2017; also see Arnould and Price 2000; Caillois 2001). In comparison, the neoliberal model maintains that physically challenging activities are part and parcel of a new disciplinary regime of neoliberal governmentality (Foucault 2008) whereby individuals regard social life as a sphere of cutthroat competition in which only the fittest (and most self-disciplined) can attain success (Cederström and Spicer 2015; Datta and Chakraborty 2017).

Previous examinations of CrossFit's marketplace culture—which affords a communally shared experience of physical challenge, risk taking, and calculated endurance of pain—have rather expectedly followed an existential (Dawson 2017; Herz 2014; Pekkanen, Närvänen and Tuominen 2017) or neoliberal lens (Heywood 2016; James and Gill 2017; Nash 2017). While the narratives of the CrossFit enthusiasts we interviewed exhibit motifs that are compatible with both existential and neoliberal interpretive frames, we propose that there is more to the story than an enactment of neoliberal

responsibilization (Giesler and Veresiu 2014) or a quest to authenticate the self through transcendent experiences (Arnould and Price 1993, 2000).

Another important macro influence on these risk-taking consumption practices is the reflexive modernist orientation that has arisen from the structural imposition of global systemic risks (Beck 1999, 2006; Beck, Giddens, and Lash 1994). According to this framework, systemic, human-generated risks are the unintended and unanticipated consequences of the modernist project and its abiding goals of creating wealth and prosperity. Modern economies produce risks just as they produce economic gains, and these risks are difficult to manage and distribute through probability assessment—as exemplified by climate change, large-scale industrial accidents, terrorist attacks, and outbreaks of infectious diseases. As a cultural response to these conditions, the reflexive modernist ethos comprises of a reflexive awareness of systemic risks, a socially pervasive state of doubt about the ability of experts to accurately predict and control such risks, a profound uncertainty about which authorities to trust, and a paradoxical quest for being prepared for a wide range of imaginable contingencies in hopes that such preparations might prove useful to a certain degree in a time of crisis. When CrossFit practices are analyzed in relation to this reflexive modernist frame, we identify a set of socio-cultural motivations that are ideologically and experientially distinct from those highlighted by the existential and neoliberal models.

Founded in 2000 by former gymnast Greg Glassman, Cross-Fit hinges on the idea that constantly varied, high intensity, whole body workouts could induce a state of all-round functional fitness unattainable through conventional gyms. With this principle in mind, Glassman developed high-intensity workout routines that integrated movements from gymnastics, calisthenics, and Olympic weightlifting, all involving multiple repetitions in rapid-fire succession. Glassman's unorthodox approach to building functional fitness through maniacal physical exertion attracted an expanding clientele of former athletes seeking to recreate bygone experiences of competitive intensity and, importantly, first responders and military personnel who face a broad spectrum of physical challenges in the conduct of their occupations (Crockett and Butryn 2018). In press interviews, Glassman matter-of-factly discussed latent risks that CrossFitters knowingly take in order to garner the benefits of its hyperintense training regimen: ""It can kill you," he said. "I've always been completely honest about that"" (Quoted in Cooperman 2005).

Based on a two-year long ethnography of CrossFit's marketplace culture—consisting of participant observation, semi-structured interviews, and examinations of media discourses and branded content—, we analyze CrossFit as a meso-level articulation of reflexive modernization. We demonstrate that CrossFitters' understanding of embodied risk taking is shaped by the normative goal of preparing oneself for unexpected contingencies and imminent threats. In doing so, we bridge the analytical gap between studies addressing consumers' proactive risk taking and those focusing on the feelings of anxiety and uncertainty induced by the structural imposition of systemic risks. We highlight that such risk-taking challenges can themselves be market-mediated responses to the conditions of reflexive modernization, whereby consumers proactively take calculated bodily risks out of a desire to expand their capacities to effectively respond to the unpredictable manifestations of systemic risks. Finally, we show that the notion of personal responsibility—which has predominantly been studied as a defining feature of neoliberal governmentality by consumer researchers (Giesler and Veresiu 2014)— serves different ideological ends in a reflexive modernist frame. Rather than taking a neoliberal, entrepreneurial orientation as represented in previous

accounts, it manifests an always contingent endeavor for being prepared to effectively respond to challenges and contingencies amidst the radical uncertainty induced by systemic risks.

The Socio- and Material-temporal Routines of Mothering:
Why and How Physical Activity Often Fails to Fit

EXTENDED ABSTRACT

The transition to parenthood is a critical transformative experience and an inflection point for obesity (Saxbe et al., 2019). Becoming a parent often leads to reduced physical activity (PA) levels, but this effects mothers more than fathers, both in volume and type (Rhodes et al., 2014). Studies report that whereas some mothers adjust physical activity participation strategies to fit around children (McGannon et al., 2018), many attempt unsatisfactorily to integrate PA into family time (Hamilton and White, 2010). Lower socioeconomic-economic status mothers are the least likely to be active (Bellow-Riecken et al., 2008). Supporting mothers from deprived areas to become and maintain healthy levels of physical activity is therefore an important challenge for social marketers.

Qualitative health research tends to explain mothers' low PA levels as the product of social and cultural discourses which mothers draw on. 'Mother' is understood as women's 'true calling', with an emphasis on intensive presence and prioritising caring above all else (Molander and Hartmann, 2018). PA is therefore constantly subordinated through daily computations made in the shadow of socially prescribed expectations. Relatedly, mothers' low PA levels is explained by illuminating the limited leisure time afforded to mothers as they assume fuller caring roles than male partners (Hamilton and White, 2010), which compresses and fragments time for themselves. Mothers' 'free time' is noted to be highly dependent on the support of others (Wearing, 1990). Time is conceptualised as a resource that mothers have little of.

Existing studies tend to overemphasise the capacity and responsibility of individuals to realise change through resistance to societal expectations (McGannon and Schinke, 2012). Through a novel practice theory lens, this study shifts focus to the mundane experiences of mothering, examining everyday temporalities and mundane yet expertly operated materialities. The connecting theme of 'time' emerges as vital for understanding the 'demands' of the system of practices that dominates the organisation of mothers' everyday lives and often competes out physical activity.

We undertook and analysed 15 depth interviews with mothers in Bristol. Mothers in lower socio-economic positions were selected because they have less control over how their paid and non-paid time (Southerton, 2006). Half the mothers kept a diary for a week prior to the interviews. Interviews explored everyday household routines, use of material things and explored experiences and reflections of PA. Mothers ranged between 20 and 50 years and the sample included single, adoptive, married and cohabiting mothers and those whose children had special needs. Five participated in regular PA. Transcripts were analysed using thematic analysis and three key themes were identified.

Mothering can be understood as a multiple integrative practice inseparable from a larger household system of practices involving multiple practitioners: children and fathers but also schools, workplaces and childcare providers. Mothering is highly competitive, even predatory. As one respondent explained, "We don't really do anything [now we have kids]…" PA for all our respondents took a low priority, and the synchronisation of physical activity alongside

mothering practices was found to be highly unsatisfactory and "not really proper exercise", or impossible.

Three intersecting themes add theoretical power to our understanding of the predatory nature of mothering and how this implicates PA participation. Firstly, mothering practices have a dominant temporal rhythm through their entanglement with external interlocking space-time configurations. For example travel timetables, distances from work and childcare/school opening hours all shaped the rhythm of mothering. These space-time configurations demand skilful use of materials such as managing the weekly wash, which often happened in a prescribed 90 minute slot; or calculating how long a bus journey would take and if there was time for an errand or visit between school hours.

Secondly, cutting across the external space-timescapes are the temporal rhythms of everyday caring. These were dominated for our participants by the need for careful synchronisation of multiple activities and by temporal 'hot spots'. Mothers were required to orchestrate practices so they occurred in the right order, with the skilled use of particular equipment (like toothbrushes or cooking equipment), at the right time of day and with understood degrees of periodicity. Hot spots occur because many of these practices colonise (Shove, 2012) particular points of the day such as children's bedtime, and are also intersected by external, institutional spatial-temporal rhythms. PA needs to compete to recruit mothers. As Jane explains, her walk was delayed because "he poo-ed all over the carpet and that takes half an hour out of your day before you can go anywhere". Mothering practices must often be accomplished in a particular order.

Thirdly, infusing the household system of practice were collective expectations towards 'time spent' that shape PA participation. In line with others (Silva 2002), we found an accepted lack of 'time to yourself' for mothers and a low prioritisation of PA for mothers but not fathers. The way practices compete and intersect raises questions about value and authenticity. Carrie exemplifies her frustration at the elevated 'value' of her partner's PA in comparison with her own, explaining that "he just takes off and goes cycling". Later, she admits how difficult the household level expectations about her own PA are to change: "it's hard-wired as to how our daily structure works… we are just stuck in a daily routine I guess".

Only when there was compatibility between the external space-time configurations, everyday temporal rhythms of mothering practices and the temporal expectations that infuse the household system of practices did our respondents participate in regular PA. As such, our findings suggest that responsibilising mothers to participate in PA through 'sporty' identity creation or resistance is unlikely to succeed and is ethically problematic. Rather, social change relating to mothers' PA should acknowledge socio-cultural, material and above all temporal characteristics of the practices which both demand and shape the everyday organisation of mothering. Insodoing, our analysis contributes to the burgeoning critical social marketing agenda (Gordon, 2011; 2018) which draws on social practice theory to illuminate the socio-cultural shaping of everyday life (Gordon, 2018) as a basis for conceptualising intervention.

Assembling Embodiment: Body, Techniques and Things

EXTENDED ABSTRACT

By positioning embodiment to the forefront of enquiry, a nascent corpus of CCT research illuminates the sensuous and affective nature of transformative consumption experiences. Extending analysis beyond the focus on discourse and meaning which preoccupied the 'interpretive turn', these studies animate the lived experience of embodiment as it surfaces through intense sensory immersion (Goulding et al., 2009; Scott et al., 2017) and emotive bodily expressions (Hewer and Hamilton, 2010). Recent studies broaden the scope of multi-sensory enquiry, by establishing a basis for consumer research that attends to the olfactory (Canniford et al., 2018) and sonic (Patterson and Larsen, 2018). Notwithstanding these significant contributions, a deep understanding of embodiment cannot be reached through recourse to the senses alone. Embodiment also foregrounds body techniques, habituation, and the social, physical and mindful cultivation of skilful dispositions (Mauss, 1973; Crossley 2007; Murphy et al., 2019). Recent CCT studies illuminate the skilful nature of a host of consumption activities that range from freeskiing and paintballing (Woerman and Rokka, 2015), Cosplay (Seregina and Weijo, 2017), craft beer connoisseurship (Maciel and Wallendorf, 2017) and high-speed motorcycling (Murphy and Patterson, 2019). Although consumption objects are clearly central to the performance of these skilful activities, these studies do not foregrounded materiality conceptually, and as a consequence we know little about how things feature in the development of skills and the embodied dispositions that pertain to them. To this end, the present study extends Dant's (2004) assemblage theory to examine the intricacies of socio-material relations between motorcycle repairers and their motorcycles.

Re-theorizing Assemblage: An Embodied Perspective

Tim Dant's extensive work on materiality (1999; 2004a; 2004b) brings the issue of embodiment and its role in the formation of human non-human assemblages into critical light. Dant (2004) argues that the embodied experience of being-in-the-world only makes sense because we have a history of sensory experience. We know how it feels to be in the world, and we intuitively know how to interact in the world because of this experience. This embodied way of being-in-the-world is not something that we are born with, it perpetually develops over time through interaction. This process crystallises as bodily memory and because of this being-in-the-world becomes intelligible (Merleau-Ponty, 1962). Throughout our lives we engage further in the material world, embodying new skills and techniques, thereby bringing the material world more and more into our everyday lives (Dant 1999, 2004). By drawing attention to the intricate nature of socio-material relations, assemblage theory invites us to consider how things become active not only in shaping perceptual capacities but also the development of skilful embodied techniques. By examining the case of the repairer/motorcycle assemblage, this research aims to develop a theoretical understanding of how skilful embodied relations with things are formed and also how these relations become constitutive of embodiment.

A Brief Summary of Findings

The repairer's ability to relate to the material world of the motorcycle is acquired and strengthened in skill (Borgmann, 1987). As a central socio-material dynamic of assemblage formation, skill development closes the distance between the repairer and the motorcycle. Sharpened skills bring people and things together to the extent that they can assemble as one. This dynamic was exemplified in instances where the participants describe using tools with such ease and dexterity that they become like an extension of hand (Mellström, 2002). Being always takes place in the world, and because of this our capacities for skill development and habituation are inextricably relational (Dant 2004; Merleau-Ponty, 1962).

Crawford (2010) describes motorcycle repair as a *stochastic art*, which necessitates a disposition that is open and attentive to the machine. To embody this disposition, perception must be trained in relations with the motorcycle. This study illuminates how novices are taught to perceive the motorcycle's obscurities by developing

an aural appreciation of its rhythms. By mindfully listening to the sounds of engines, the capacity for acoustically informed diagnosis gradually accumulates. Similarly, through immersion in these activities, the body becomes attuned to diagnosing problems by identifying resonant sounds, smells and feels (Mellström, 2003). This pathway to skill development is illustrative of the recursivity of these socio-material relations. The motorcycle demands a finely attuned attentiveness that is receptive to its signals. But the repairer/motorcycle assemblage, also illuminates a recursivity to socio-material relations which complicates any notion of agentic subjects continuously acting upon inanimate objects.

By tuning into the socio-material dynamics of assemblage formation, we see that repairers are oftentimes drawn out of themselves and into an intimate relation with the motorcycle, whereby they are forced to question what it needs. In these instances, 'technology is no longer a means by which our mastery of the world is extended' but rather it becomes 'an affront to our usual self-absorption' (Crawford, 2010: 16). Skilled repairers must be able to see beyond the embodied techniques of their craft, to see how skills can be grounded in relations with the material demands of the situation. It is only with this outward orientation towards fixing things that the repairer can truly understand their nature. It is through these socio-material relations that the repairer incorporates the daily movements and actions of repair culture.

When we segment the world into imaginary categories and hierarchies in order to get things done, we in-effect produce dualisms (Canniford and Shankar, 2015). When we resist dualisms, by altering the ontological assumptions that guide our research, we open new up new pathways to see how previously overlooked elements constitute phenomena. Rather than slipping into the naturalised ontological stance which separates mind/body and subject/object, this paper illuminates the socio-material processes through which mind/body and subject/object assemble to co-constitute embodiment. In the routine, habitual practices of motorcycle repair sensory perceptions and gestural dexterity become mindfully honed to interact with the motorcycle and its world. By illuminating the bodies aptitude for knowledgeability and the material objects capacities to impose demands upon the would-be-subject, these socio-material relations blur the boundary that typically separates mind from body and subject from object. We see cogently that the motorcycle repairer could not come into being without this embodied emplacement in the material world.

Extending Flow: How Place, Materials, and Body Create Restorative Consumption in Nature

EXTENDED ABSTRACT

Consumer research documents a broad range of consumer experiences that offer restorative benefits. From extraordinary experiences in nature (Arnould and Price 1993; Canniford and Shankar 2013; Celsi, Rose, and Leigh 1993), to painful (Scott, Cayla, and Cova 2017), or conflict-laden experiences (Tumbat and Belk 2011), drug-induced nights out (Goulding et al. 2009), pilgrimages for the deeply devoted (Higgins and Hamilton 2019; Husemann and Eckhardt 2019), or through natural products (Thompson 2004), such experiences are understood to ameliorate the demands of today's society, the burdens of reflexivity, and the resulting "saturated self" (Husemann and Eckhardt 2019; Scott, Cayla, and Cova 2017, 24). We draw into question what many of these consumption experiences share in common: they take place in nature. A common trope in consumer research is that nature is imbued with healing qualities (Canniford and Shankar 2013). Consumers who seek out such experiences in nature, using limited leisure time and financial resources, are restored and rejuvenated, able to return 'healed' and better able to deal with life in a time-stricken and ever-connected world (Canniford and Shankar 2013; Husemann and Eckhardt 2019). While we may know why consumers seek out these experiences, and that they are restored and rejuvenated by them, how such experiences are restorative and rejuvenating remains less well understood.

To answer this question, we use Csikszentmihalyi's (1975) concept of flow as a guiding theory. Flow, characterized as a state of total absorption, diverts people's attention from the mundane to focus on the task at hand (Csikszentmihalyi 1975). As a guiding framework, it sensitizes our work to the experience of temporarily losing a sense of place and time. We also draw upon actor-network theory (Law 1992) to examine how these experiences come together as an assemblage of place, materials (equipment), and body (mind and skills). We engaged in an ethnographic study of fly fishing. Fly fishing offers a unique perspective of consumers who have a deep engagement with the activity—which includes the study of entomology, river conditions, equipment, the skills necessary to cast, and adapt to varying weather conditions. We collected data based on the ethnographic immersion of two authors of this project, participant observation, and phenomenological interviews with 21 fly fishers. In order to more closely capture the in-situ experience, we also engaged in video recording participants who then reflected upon their experiences further in interviews.

Our findings show that the restorative and rejuvenative nature of these experiences relies on a deep engagement with the context, sometimes spanning over a lifetime or decades. We show the process of restorative consumption occurs through an extended model of flow that includes: (1) preparing for flow, (2) flowing, (3) remembering flow. First, preparing for flow involves a ritualized material, embodied, and cognitive practice. Second, flowing is the phenomenological experience in which consumers enter a non-reflexive state where embodied practice prevails. Finally, Csikszentmihalyi (1990, 229) argues that flow happens in the "here and now"; however, we find that remembering flow is a highly ritualized and integral part of the flow experience. The act of remembering what flow feels like comes to shape consumers' understanding of flow and future experiences of flow.

Our research contributes an understanding of the process by which consumption environments and practices create rejuvenative experiences. First, we show that rejuvenative experiences are fleeting, and difficult to achieve and maintain. Beyond Csikszentmihalyi's (1975) descriptive need for an intersection between skill and challenge, our work captures the phenomenological experience of the entire process of flow. Second, consumer researchers broadly refer to flow as akin to a broad range of experiences—transportation experiences (Phillips and McQuarrie 2010; Wang and Calder 2006), edgework (Canniford and Shankar 2013), immersion (Phillips and McQuarrie 2010), transcendental (Schouten, McAlexander, and Koegin 2007). We bring clarity to distinguish flow from other flow-like experiences that, after Turner (1969), we call flowoid. Third, self-awareness is usually considered a virtue. Literature extols the benefits of the reflexive consumer agentically navigating social class (Thompson, Henry, Bardhi 2018), however, in our study, consumers are involved in a deep engagement to reflexively engage in non-reflexivity. In juxtaposition with extraordinary experiences literature that shows that consumers need an escape to achieve the restorative benefits of flow, we suggest that it is through a deep immersion that consumers reap these benefits. Lastly, we draw to attention the importance of the availability of a place to flow. Sustaining natural en-

vironments that facilitate such flow experiences, and making them readily available to populations is important.

REFERENCES

Arnould, Eric J. and Linda L. Price (1993), "River Magic: Extraordinary Experience and the Extended Service Encounter," *Journal of Consumer Research*, 20 (June), 24–45.

_____ (2000), "Authenticating Acts and Authoritative Performances: Questing for Self and Community," in *The Why of Consumption: Contemporary Perspectives on Consumer Motives, Goals and Desires*, ed. S. Ratneshwar, David Glen Mick, and Cynthia Huffman, New York: Routledge, 140–63.

Atkinson, Michael (2008), "Triathlon, Suffering and Exciting Significance," *Leisure Studies*, 27(2), 165–80.

Beck, Ulrich (1999), *World Risk Society*, Malden, MA: Polity Press and Blackwell Publishers.

_____ (2006), *Cosmopolitan Vision*, Malden, MA: Polity Press.

Beck, Ulrich, Anthony Giddens, and Scott Lash (1994), *Reflexive Modernization: Politics, Tradition and Aesthetics in the Modern Social Order*, Stanford, CA: Stanford University Press.

Bellow-Riecken, KH. and Rhodes, R.E. (2008), A birth of inactivity? A review of physical activity and parenthood, *Preventative Medicine*, 46(2): 99-110

Borgmann, A. (1987) '*Technology and the character of contemporary life: A philosophical inquiry',* Chicago: University of Chicago Press.

Caillois, Roger (2001), *Man, Play and Games*, Urbana and Chicago, IL: University of Illinois Press.

Canniford, Robin, and Avi Shankar (2013), "Purifying Practices: How Consumers Assemble Romantic Experiences of Nature," *Journal of Consumer Research*, 39 (5), 1051-1069.

Canniford, Robin and Shankar, Avi (2015) "Post-Dualistic Consumer Research: Nature-Cultures and Cyborg Consumption," in *Assembling Consumption,* pp. 147-164. London: Routledge.

Canniford, R., Riach, K., and Hill, T. (2018) 'Nosenography: How smell constitutes meaning, identity and temporal experience in spatial assemblages', *Marketing Theory* 18(2): 234–248.

Cederström, Carl and Andre Spicer (2015), *The Wellness Syndrome*, Malden, MA: Polity Press.

Celsi, Richard L., Randall L. Rose, and Thomas W. Leigh (1993), "An Exploration of High-Risk Leisure Consumption through Skydiving," *Journal of Consumer Research*, 20(1), 1–23.

Cooperman, Stephanie (2015), "Getting Fit, Even If It Kills You," *The New York Times*, December 22.

Crawford, M. (2010) *The Case for Working with Your Hands: Or why office work is bad for us and fixing things feels good*. London: Penguin .

Crockett, Matt C. and Ted Butryn (2018), "Chasing Rx: A Spatial Ethnography of the CrossFit Gym," *Sociology of Sport Journal*, 35(2), 98–107.

Csikszentmihalyi, Mihaly (1975), *Beyond Boredom and Anxiety*. San Francisco: Jossey-Bass Publishers.

Czikszentmihalyi, Mihaly (1990), *Flow: The psychology of optimal experience*. New York: Harper & Row.

Datta, Anisha and Indranil Chakraborty (2017), "Are You Neoliberal Fit? The Politics of Consumption under Neoliberalism," in *The SAGE Handbook of Consumer Culture*, ed. Olga Kravets, Pauline Maclaran, Steven Miles, and Alladi Venkatesh, Thousand Oaks, CA: Sage, 453–77.

Dant, T. (1999) '*Material culture in the social world*', McGraw-Hill Education (UK).

Dant, T. (2004a) 'The Driver-car', *Theory, Culture & Society* 21(4–5): 61–79.

Dant, T. (2004b) '*Materiality and society*', McGraw-Hill Education (UK).

Dawson, Marcelle C. (2017), "CrossFit: Fitness Cult or Reinventive Institution?," *International Review for the Sociology of Sport*, 52(3), 361–79.

Foucault, Michel (2008), *The Birth of Biopolitics: Lectures at the College de France*, ed. Michael Senellart, New York: Palgrave.

Giesler, Markus and Ela Veresiu (2014), "Creating the Responsible Consumer: Moralistic Governance Regimes and Consumer Subjectivity," *Journal of Consumer Research*, 41(3), 840–57.

Gordon, R. (2011), Critical social marketing: Definition, application and domain. *Journal of Social Marketing*, 1, 82–99.

Gordon, R. (2018), Critical Social Marketing: Reflections, introspections and future directions, chapter 5, in ed. Tadajewski, M., Higgins, M., Denegri-Knott, J. and Varman, R. (2018), *Critical Marketing*, Routledge.

Goulding, C., Shankar, A., Elliott, R. and Canniford, R. (2009) 'The marketplace management of illicit pleasure', *Journal of Consumer Research* 35(5): 759-771.

Hamilton, K. and White, K.M. (2010), Understanding parental physical activity: Meanings, habits and social role influence, *Psychology of Sport and Exercise*, 11, 275-285.

Herz, J.C. (2014), *Learning to Breathe Fire: The Rise of CrossFit and the Primal Future of Fitness*, New York: Three Rivers Press.

Hewer, P. and Hamilton, K. (2010) 'On emotions and salsa: Some thoughts on dancing to rethink consumers', *Journal of Consumer Behaviour* 9(2): 113-125.

Heywood, Leslie (2016), "'We're in This Together:' Neoliberalism and the Disruption of the Coach/Athlete Hierarchy in CrossFit," *Sports Coaching Review*, 5(1), 116–29.

Higgins, Leighanne, and Kathy Hamilton (2019), "Therapeutic Servicescapes and Market-Mediated Performances of Emotional Suffering," *Journal of Consumer Research*, 45(6), 1230-1253.

Husemann, Katharina C., and Giana M. Eckhardt (2019), "Consumer Deceleration," *Journal of Consumer Research*, 45 (6), 1142-1163.

James, Eric P. and Rebecca Gill (2017), "Neoliberalism and the Communicative Labor of CrossFit," *Communication & Sport*, 6(6), 1–25.

Joy, Annamma, and John F. Sherry Jr. (2003), "Speaking of Art as Embodied Imagination: A Multisensory Approach to Understanding Aesthetic Experience," *Journal of Consumer Research*, 30 (2), 259-282.

Law, John (1992), "Notes on the Theory of the Actor-Network: Ordering, Strategy, and Heterogeneity," *Systems Practice*, 5 (4), 379-393.

Le Breton, David (2000), "Playing Symbolically with Death in Extreme Sports," *Body & Society*, 6(1), 1–11.

Lupton, D. (2015). Quantified sex: a critical analysis of sexual and reproductive self-tracking using apps. *Culture, health & sexuality*, 17(4), 440-453.

Maciel, A. and Wallendorf, M. (2017) 'Taste Engineering: An Extended Consumer Model of Cultural Competence Constitution', *Journal of Consumer Research* 43(5): 726-746.

Mauss, M. (1973) 'Techniques of the Body', Economy and Society 2(1): 70–88.

McGannon, K.R. and Schinke, R.J. (2013), "My first choice is to work out at work; then I don't feel bad about my kids": a discursive psychological analysis of motherhood and physical activity participation, *Psychology of Sport and Exercise*, 14, 179-188.

Mellström, U. (2003) 'Masculinity, Power and Technology: A Malaysian Ethnography, Hampshire: Ashgate.

Merleau-Ponty, M. (1962) *Phenomenology of Perception*. London: Routledge.

Molander, S. and Hartmann, B. (2018) Emotion and practice: Mothering, Cooking, and Teleoaffective Episodes, *Marketing Theory*, 18, 3, 371-390

Murphy, S., Patterson, M. and O'Malley , L. (2018) 'Learning how: Body techniques and the consumption of experience', *Marketing Theory* 19(4): 425-445.

Nash, Meredith (2018), "'Let's Work on Your Weaknesses': Australian CrossFit Coaching, Masculinity and Neoliberal Framings of 'Health' and 'Fitness,'" *Sport in Society*, 21(9), 1432–53.

Patterson, M. and Larsen, G. (2018) 'Listening to consumption: Towards a sonic turn in consumer research', *Marketing Theory* 19(2): 1-23.

Patterson, M., & Schroeder, J. (2010). Borderlines: Skin, tattoos and consumer culture theory. *Marketing Theory*, *10*(3), 253-267.

Pekkanen, Anna, Elina Närvänen, and Pekka Tuominen (2018), "Elements of Rituality in Consumer Tribes: The Case of CrossFit," *Journal of Customer Behaviour*, 16(4), 353–70.

Phillips, Barbara J., and Edward F. McQuarrie (2010), "Narrative and Persuasion in Fashion Advertising," *Journal of Consumer Research*, 37 (3), 368-392.

Rabinow, Paul (2009), *Anthropos today: Reflections on modern equipment*. Princeton University Press.

Rhodes, RE., Blanchard CM., Benoit, C. et al. (2014), Physical activity and sedentary behaviour across 12 months in cohort samples of couples without children, expecting their first child, and expecting their second child, *journal of behavioural medicine*, 37(3), 533-542.

Roux, Dominique, and Russell Belk (2019), "The Body as (Another) Place: Producing Embodied Heterotopias Through Tattooing," *Journal of Consumer Research*, 46 (3), 483-507.

Saville, Stephen John (2008), "Playing with Fear: Parkour and the Mobility of Emotion," Social & Cultural Geography, 9(8), 891–914.

Saxbe, D., Rossin-Slater, M. and Goldenberg, D. (2018), The transition to parenthood as a critical window for public health, *American Psychologist*, 73(9)

Schneider, Terri, Ted Butryn, David Furst, and Matthew Masucci (2007), "A Qualitative Examination of Risk among Elite Adventure Racers," Journal of Sport Behavior, 30(3), 330–57.

Schouten, John W., James H. McAlexander, and Harold F. Koenig (2007), "Transcendent Customer Experience and Brand Community," *Journal of the Academy of Marketing Science*, 35 (3), 357-368.

Scott, Rebecca, Julien Cayla, and Bernard Cova (2017), "Selling Pain to the Saturated Self," Journal of Consumer Research, 44(1), 22–43.

Seregina, A. and Weijo, H. (2016) 'Play at Any Cost: How Cosplayers Produce and Sustain Their Ludic Communal Consumption Experiences', Journal of Consumer Research 44(1): 139–159.

Shove, E. (2012) Habits and their creatures. In: Warde A and Southerton D (eds), *The Habits of Consumption*. Helsinki: Helsinki Collegium for Advanced Studies.

Silva E.B. (2002), Routine matters: Narratives of everyday life in families. In: Crow Gand Heath S (eds) *Social Conceptions of Time: Structure and Process in Work and Everyday Life*. Basingstoke, Hampshire: Palgrave Macmillan, pp. 179–194.

Southerton, D. (2006), Analysing the temporal organisation of daily life: social constraints, practices and their allocation, *Sociology*, 40(3)

Thompson, Craig J. (2004), "Marketplace Mythology and Discourses of Power," *Journal of Consumer Research*, 31 (1), 162-180.

Thompson, C. J., & Üstüner, T. (2015). Women skating on the edge: Marketplace performances as ideological edgework. *Journal of Consumer Research*, *42*(2), 235-265.

Thompson, Craig J., Paul C. Henry, and Fleura Bardhi (2018), "Theorizing Reactive Reflexivity: Lifestyle Displacement and Discordant Performances of Taste," *Journal of Consumer Research*, 45 (3), 571-594.

Tumbat, Gülnur, and Russell W. Belk (2011), "Marketplace Tensions in Extraordinary Experiences," *Journal of Consumer Research*, 38 (1), 42-61.

Turner, Victor (1969), "Liminality and Communitas," *The ritual process: Structure and anti-structure*, 94, 130.

Wang, Jing, and Bobby J. Calder (2006), "Media Transportation and Advertising," *Journal of Consumer Research*, 33 (2), 151-162.

Wearing, B. (1999), Beyond the Ideology of Motherhood: Leisure as Resistance, ANZJS, 26(1), March, 36-58

Woermann, N. and Rokka, J. (2015) 'Timeflow: How Consumption Practices Shape Consumers' Temporal Experiences', Journal of Consumer Research 41(6): 1486–1508.

Zanette, M. C., & Scaraboto, D. (2019) "'To Spanx or not to Spanx': How objects that carry contradictory institutional logics trigger identity conflict for consumers," *Journal of Business Research*, *105*, 443-453.

Reimagining Pro-Social Behaviors through Micro-, Meso-, and Macro-Level Perspectives of Charitable Giving

Charis: Lez Trujillo Torres, University of Illinois at Chicago, USA
Akon E. Ekpo, Loyola University Chicago, USA

Paper #1: The Influence of Public Discourse on Charitable Giving

Lez Trujillo Torres, University of Illinois at Chicago, USA
Yingting Wen, ESSEC Business School, France
Akon E. Ekpo, Loyola University Chicago, USA
Benét DeBerry-Spence, University of Illinois at Chicago, USA

Paper #2: Bodies as Gardens, Bodies as Machines: Charitable Giving as Coping

Rebecca Scott, Cardiff University, UK
Tonya Williams Bradford, University of California – Irvine, USA

Paper #3: A Divine Duty: Commercial Surrogacy in India and Kin Altruism

Sujit Raghunathrao Jagadale, Xavier University Bhubaneswar, India
Lez Trujillo Torres, University of Illinois at Chicago, USA
Laetitia Mimoun, Cass Business School, City, University of London, UK

Paper #4: When Pro-social and Market Logics Collide: the Sensemaking Journeys of Egg Donors in the American Infertility Field"

Anna E. Hartman, University of Melbourne, Australia
Eileen Fischer, York University, Canada

SESSION OVERVIEW

Increasingly, scholars are interested in understanding the motivating factors and consequences of consumers engaging in pro-social consumer behavior. In fact, a recent special issue of the *Journal of the Association for Consumer Research* points to an 848% increase in such studies from 2000 – 2018 (White, Habib, and Dahl 2020). Pro-social behavior refers to behaviors that consumers engage in that may come at some cost to the self for the greater good or benefit for others (Small and Cryder 2016; White et al. 2020); and can include behaviors such as: charitable giving, volunteering, altruistic behaviors, ethical purchasing, engagement in cause-related activities, and advocacy or activism. For the most part, motivations for pro-social consumer behaviors have dealt with individual and situational factors mainly from a micro-level perspective. From an individual perspective, factors such as maintaining a positive image (Aaker and Akutsu 2009), self-concept (Grant and Dutton 2012), moral self-worth (Jordan, Mullen, and Murnighan 2011; Sachdeva, Iliev, and Medin 2009), or acting in one's self-interest through charitable giving may create positive feelings that encourage pro-social behaviors (Chang and Hung 2018). From a situational perspective, factors such as whether one may socially benefit from public displays of pro-social behavior (Ariely, Bracha, and Meier 2009; White and Peloza 2009), situational norms surrounding engagement in pro-social behavior (Frey and Meier 2004; Shang, Reed, and Croson 2008); and attempts to gain a sense of belonging (Lee and Shrum 2012; Twenge et al. 2007) all contribute to whether and how someone engages in pro-social behaviors.

While these studies provide insight into why individuals choose to engage in pro-social behaviors, there remains a limited understanding of the role of meso- and macro-level factors vis-à-vis these behaviors. Through a series of investigations of charitable giving, this special session seeks to fill this gap and addresses the following:

- What role(s) does the marketplace play in enacting pro-social behaviors?
- How does public discourse shape the types of pro-social causes we value and thus contribute to?
- How does pro-social and market logics shape meanings of pro-social behaviors and thus decisions to enact them?

According to Giving USA (2019), total charitable giving rose 0.7% over a total of $424.74 billion contributed in 2017. Interestingly, while giving by individuals decreased by 1.1% (for a total estimate of $292.09 billion), giving by foundations and corporations increased by 7.3% and 5.4% respectively, leaving giving by bequests flat. Though individual giving has decreased, individual giving remains the highest form of charitable giving, accounting for 68% of the total giving. Thus, charitable giving is an ideal context to examine pro-social behaviors across multiple levels, journeying from the micro-level: *A Divine Duty: Commercial Surrogacy in India and Kin Altruism* (individual). To the mezo-level: *Bodies as Gardens, Bodies as Machines: Charitable Giving as Coping* (family). And finally, to the macro-level: *The Influence of Public Discourse on Charitable Giving* (societal) and *When Pro-social and Market Logics Collide: the Sensemaking Journeys of Egg Donors in the American Infertility Field* (market).

This session will be of interest to pro-social, gift-giving, and healthcare marketing scholars.

The Influence of Public Discourse on Charitable Giving

EXTENDED ABSTRACT

This research investigates the influence of public discourse on charitable giving and how this evolves over time. The context of our study is the United States charitable marketplace, the largest philanthropic market in the world, between the years of 1991 to 2015. We contribute to a growing literature devoted to understanding how individuals, through monetary contributions to nonprofit organizations, address pressing societal issues, such as poverty, hunger, public health, animal welfare, and socioeconomic and environmental justice. The significance of these issues, alongside the rise in charitable giving to the nonprofit sector, makes the focus of this research important. To this point, in 2018 alone, the nonprofit sector hit a new record with $410 billion U.S. dollars in contributions distributed across approximately 10 million nonprofit organizations worldwide (Giving USA 2018; Salamon and Newhouse 2019).

By large, extant research encompasses two major influences on charitable giving. The first influence deals with individual donor characteristics such as altruistic identity, morality, and personal values of the donor (e.g., Boenigk and Helmig 2013; Nilsson, Erlandsson, and Västfjäll 2016; van Dijk, Van Herk, and Prins 2019). The second influence deals with the strategic action of and within nonprofit organizations and includes the effectiveness of rhetorical communication appeals, perceived characteristics of the organization, and the entrepreneurship of institutional actors (e.g., Botner, Mishra, and Mishra 2015; Gautier, Pache, and Chowdhury 2016; Sargeant, Ford, and West 2006). Surprisingly, little is known about

how macro factors, such as public discourse, which both reflect and influence historic, regulatory, socioeconomic, and political issues, impact charitable giving over long periods of time. In addressing this gap, we show how charitable behavior emerges and evolves as public discourse also changes. And, consequently we provide a more comprehensive understanding of the dynamism associated with charitable behavior.

Our research methods involved a multi-method approach. We collected charitable giving patterns of the top 400 charities in the US (1991-2015) and related fundraising expenses. This data served to operationalize actual historical charitable behavior and the ranking of organizations based on total contributions received in a given year. We also utilized three archival data sources of public discourse. First, we used a consumer opinion dataset that provide an aggregated picture of what issues or charitable causes consumers value. Second, we used archival data from popular news media including newspapers, magazines, TV, radio, podcasts, to identify, quantitatively and qualitatively, what issues and topics the U.S. society values. Third, we collected information about the top 400 charitable organizations, including advertisements in high-circulation news media to assess the strength of and/or interaction between public discourse and organizational strategic actions on charitable giving.

The quantitative analysis of datasets includes correlations, t-tests, and automated content analysis. The qualitative analysis of news media data and charitable data (e.g., textual like articles, textual/visual like advertisements) follows a hermeneutical approach (Thompson 1997) to interpret patterns of meanings in these data. We integrate both approaches by following Sanders' (1982) recommendation to identify and reflect on emerging patterns, and to derive key themes from the team's reflections. We use the program MaxQDA to transcribe analytical memos and analyze both qualitative and quantitative data.

Our preliminary results indicate that there is not a significant correlation between fundraising expenses and donations received by nonprofit organizations, from 1991 to 2015, across 18 categories of charities (e.g., social services, children & youth, health, public affairs, international, arts & culture, education, and environment & animal welfare). Rather, we find that three interrelated types of public discourse played a role in the rise of donations received by nonprofit organizations in the US: consumer opinions of pressing societal problems, earned media by nonprofit organizations, and advertisements by non-profit organizations in high-circulation news media outlets. For instance, we find a significant correlation between pressing societal problems in the mind of consumers and donations received by organizations focused on those issues in 1991-1999. In addition, over time we find that consistently nonprofits in the social services and college education categories have received combined the highest amounts of earned media and advertised across high-circulation news media.

Our research provides two key contributions. First, we expand the literatures on prosocial behavior and value by providing evidence of public discourse-driven charitable behavior and their resulting hierarchies of value (e.g., pressing societal issues, charitable causes, and non-profit organizations). In doing so, we extend the types of antecedents and consequences of prosocial behavior examined thus far in consumer research. Second, we contextualize patterns of individual charitable behavior and embed them in macro historical contexts, thus addressing calls for contextualization of micro consumer behavior (Askegaard and Linnet 2011).

Bodies as Gardens, Bodies as Machines: Charitable Giving as Coping

EXTENDED ABSTRACT

Individuals source solutions to problems in the marketplace. These problems range from basic provisioning and entertainment to broader issues such as managing significant life transitions (e.g., marriage, death) and addressing societal issues (e.g., homelessness, health crisis). We investigate charitable giving as a means of addressing societal issues, with a focus on the shortage of organ donation for transplantation.

Charitable giving is recognized as a means for individuals to provide help, hope, and life to others in need (Sherry 1983). The psychological literature examines roles for individual differences and empathy to inspire charitable behaviors (Lee and Bradford 2015), and sociocultural perspectives examine such gifts in relation to their impact on society (Bradford 2013; Strathern 2012; Titmuss 1997). While benefits of charitable giving accrue to those in need, donors may be motivated to participate to attain any number of benefits such as enhancing the well-being for others, or attaining benefits (e.g., tax, career advances) for themselves (Bendapudi, Singh, and Bendapudi 1996). The literature provides insights into how donors may partner with organizations to support those in need. Missing is an understanding of how donors may employ charitable giving as a means of coping in response to loss.

Consumer researchers examine various forms of loss and roles for consumption related to loss. Individuals experience loss in various forms throughout life—jobs, relationships with people or brands, or the transference of possessions from one owner to another. Prior research finds that voluntary losses may be managed as individuals prepare for disposition of their wealth or special possessions (Bradford 2009; Price, Arnould, and Curasi 2000; Winterich, Reczek, and Irwin 2017). And though less prevalent, there are some considerations in the literature of involuntary loss such as with homelessness (Hill and Stamey 1990), illness (Wong and King 2008), or death (Bonsu and Belk 2003). What is the relationship between loss and charitable giving? The present research examines the traumatic experiences of loved ones' sudden loss. More specifically, we examine the experience of deceased family (DDF) members who participate in charitable giving by donating their loved one's organs to others in need. More specifically, our research examines how experiences of charitable giving may serve as a means of coping when individuals are faced with loss.

The relationship between the marketplace and coping find that the market may be both a source of and a relief from stress. For example, scholars examine how consumers cope with stress in the marketplace, such as with unsatisfactory experiences (Duhachek 2005), brand termination (Russell and Schau 2015), difficult decisions (Luce, Bettman, and Payne 1997), or bias (Bone, Christensen, and Williams 2014). Further, scholars find consumers employ the marketplace as a means of coping to manage life transitions, such as divorce (Yap & Kapitan, 2017), or relieve temporary stress, as through retail therapy (Atalay & Meloy, 2011; Townsend & Sood 2012). It is evident the marketplace provides opportunities for consumers to cope with life stressors. While prior research considers common life stressors and roles for the marketplace in consumer coping, the present research examines sociocultural influences to explain how individuals employ the marketplace to cope with trauma.

We conduct an ethnographic study with deceased organ donor family members to interrogate experiences of involuntary loss. We find three themes: transforming loss into gifts of comfort; crafting

new futures from loss; and, the marketplace and the sacred. Deceased donor families contemplate the life of their loved one, and the potential of some part of the body living even as the essence of their loved one is dead. For those families, sacralization is evident as they recognize continuity of life through a loved one:

Good, really positive that something good comes out of something so tragic, it doesn't seem a waste. In some way it's better than if someone just dies, they're cremated or buried and that's it. He's still out there, part of him is still out there. When you've come from the family that we have, we've all worked helping other people in our lives, it's a natural thing to do to, go on a do it when you're dead. Totally unselfish. ~ Jade

Deceased donor family members begin to consider parts of the body and how body parts may provide life to others. In so doing, the body itself is recognized as sacred as a whole as well as each of its parts due to its life-giving forces. We extend prior understandings of consumer coping with an explanation of how charitable giving facilitates the transformation of loss from that of suffering into new futures.

A Divine Duty: Commercial Surrogacy in India and Kin Altruism

EXTENDED ABSTRACT

The emergence and global expansion of Assisted Reproductive Technologies (ART) continues to challenge deeply held values and beliefs regarding reproduction, parenthood and family across the world (Sobande, Mimoun, and Trujillo Torres 2019; Takhar and Rika Houston 2019). While certain types of ART such as in vitro fertilization have become more accepted(Fischer, Otnes, and Tuncay 2007), commercial surrogacy remains a highly controversial (Tadajewski 2016), and regulated practice characterized by perceptions of exploitative commodification and (dis)empowerment of gestational carriers (Fenton-Glynn 2019). This industry, now estimated at 6 billion dollars (USD), is subject to moral, ethical, legal, and political debates, especially in countries with large numbers of socioeconomically vulnerable women (Varman et al., 2016).

In public discourse surrounding international reproductive tourism, commercial surrogacy is often construed as dirty work (Pande 2010) and surrogates are derided and silenced for participating in this exchange process. Moreover, commercial surrogates operate as commodified consumers and stigmatized producers in a market system where the exchange boundaries between these two roles are blurred. That is, they consume conventional health services and act as value-producing actors within socio-cultural contexts that harbor negative attitudes towards surrogate's participation. Because commercial surrogacy, especially in an emerging market context like India, is conceived as a stigmatized exchange, market actors cannot rely on mainstream discourses to legitimize their participation in this exchange. Particularly, in the Indian context, the public discourse associated with gestational surrogacy is increasingly influenced by ongoing regulatory actions to ban surrogacy and curb the growth of this industry. Thus, our project investigates how surrogates, as consumers and co-producers, construct and justify their participation in an increasingly regulated and stigmatized exchange process.

To address our research question, we conducted an examination of gestational surrogate women in the heart of the international, commercial surrogacy industry in Gujarat, India. Data were collected primarily through nineteen in-depth interviews with commercial surrogates and their families over a period of eighteen months. To triangulate this initial dataset, we also interviewed eight local health

service providers and politicians, and systematically collected and analyzed articles on the topic published in four leading daily newspapers. We rely on prolonged engagement, purposive sampling, and thick description to address the issue of trustworthiness (Belk, Fischer, and Kozinets 2013).

Our initial findings suggest that surrogates construe their market participation as two forms of kin altruism (Ashton et al. 1998; Lee, Winterich, and Ross Jr 2014; Small and Simonsohn 2008) downplaying the pecuniary aspects related to it. Kin altruism refers to the "tendency to feel empathy and attachment toward others. This is based on the deduction that one is more likely to behave altruistically toward one's kin if one considers costs and benefits to those kin, and not only costs and benefits to oneself, when deciding among behavioral alternatives" (Ashton et al. 1998). On one hand, surrogates adopt a discourse that invokes existing and popular sociocultural and religious symbols, which aims to remove social-cultural differences between them and non-surrogates in India. For instance, several participants equate themselves with Yashoda, a foster mother of mythological Hindu God Lord Krishna. In doing so, they emphasize the responsibility put on them by their divinity to help the needy and deficient. On the other hand, surrogates create kin-like connections with the commissioning mothers, often with the aid of marketplace intermediaries such as health clinics and for-profit agencies. By adopting empathetic and deep sisterhood connections, surrogates aim to remedy the deficiencies (i.e., infertility) of commissioning mothers, which enable them to justify and manage their own bodily, social, and cultural sacrifices. Through these discursive constructions, commercial surrogates attempt to challenge and to rectify the increasingly disdainful societal attitudes toward gestational carriers and influence policymakers.

Our work contributes to understanding how constructions of altruism are used to justify the participation in a market exchange process in dramatically under-researched context (Belk 2016; Tadajewski 2016), which is characterized by vastly different sociocultural, economic, political, and legal values and systems than the typical free market contexts seen in the literature. Furthermore, our work addresses the justification of actors engaging in an increasingly regulated and stigmatized market exchange, while most of the prior literature considers market actors' practices in contexts which are destigmatizing (e.g., Sandikçi and Ger 2010; Scaraboto and Fischer, 2013). By doing so, our work highlights how market participation in stigmatized market exchange is emphasized as a prosocial behavior helping deficient consumers. This work also broadens the growing literature on assisted reproductive technologies markets by showing how constructions of charitable giving intersects with the emergence, growth, and eventual decline of an international biotechnology market.

When Pro-social and Market Logics Collide: the Sensemaking Journeys of Egg Donors in the American Infertility Field

EXTENDED ABSTRACT

In fields characterized by institutional complexity, where multiple and often contradictory logics are at play, the prescriptions and proscriptions of differing logics can lead to tensions in the marketplace (e.g., Ertimur and Coskuner-Balli 2015; Scaraboto and Fischer 2013) . These tensions are likely to be particularly acute in contexts characterized by both market and pro-social logics (e.g., Beverland and Luxton 2005; Hartman and Coslor 2019). While considerable research has studied how formal organizations such as social enterprises navigate competing market and prosocial logics (e.g., Jay

2013; McMullen and Bergman 2017) less research has examined how individual actors who are not members of formal organizations manage the multiple logics that confront them as they interact with other market actors and engage in exchanges.

In this study, we examine a particular category of actors who engage in exchanges in a context characterized by competing pro-social and market logics: we study women who sell their ova or eggs to buyers in the U.S. infertility industry. We do so to understand how they make sense of their role in the marketplace, and how their sensemaking influences their actions. This paper thus contributes to a better understanding of the implications of logic multiplicity in general, and of conflicting pro-social and market logics in particular.

Since the mid 1980's, the demand for donated human eggs has steadily increased as a solution to certain types of infertility diagnoses. Egg donors are usually young, college-aged women recruited by market intermediaries (donor egg agencies) or fertility clinics to be matched with potential recipients. Historically, donors would work directly with matched recipients to provide eggs through a fresh cycle and embryo transfer to the recipient. More recently, due to innovations in Assisted Reproduction Technologies (ART), donors can also provide eggs without a matched intended recipient, where eggs are retrieved for frozen egg banking to be used at a later time. While there is no data available on how many women have donated their eggs, nor how many cycles have been performed on donors, we do know that in 2016, 24,300 ART cycles were performed for recipients using donor eggs (CDC, 2018). The prosocial logic in this context is reflected in terminology that frames women who provide eggs as 'donors' and 'angels' who 'give the gift of life' (Almeling 2007). At the same time, the market logic in this context is everywhere in evidence, and is reflected in discourse regarding how egg donors can 'make $10,000' and 'pay off their bills/tuition' (Hartman and Coslor 2019).

Depth interviews were conducted with 11 women who had donated their eggs in the US medical marketplace and received compensation. Additionally, online observations were conducted in online forums where egg donors and potential recipients discuss salient issues such as compensation, motivation and matching. Data were analyzed in an iterative fashion, that involved both initial open coding and multiple stages of higher order coding, guided by the research goals of this paper and abetted by the enabling lens of institutional theory.

In the initial stages of considering egg donation, when participants were first engaging with recruitment advertising or egg donor agencies, many drew on both prosocial and market logics to make sense of the possibility of becoming a donor. While some participants stressed altruism as a primary rationale consistent with a pro-social logic and referred to financial compensation as "a nice bonus," others explained their initial motivation as primarily economic. Most informants invoked both logics to rationalize their initial involvement in the industry.

As the participants moved from considering egg donation to actually engaging in the practice, balanced sensemaking typically gave way to an a nearly exclusive focus on the market logic. At least partially in response to interactions with medical personnel that were experienced as highly depersonalizing, many described objectifying themselves, specifically as a provider of eggs responding to a market demand. While we know that some young women perceive their eggs as potential babies, (Rauscher et al. 2017), most of our participants sought to distance themselves from any emotional attachment to their the eggs. They tended to view their eggs as expendable "things" that they could monetize. For example, one participant recalled a conversation where she was asked: "'How could you have

done this? How could you have given your babies away?' But they weren't babies, you know. It wasn't like I was putting them up for adoption, these weren't mine. These were just things that we produce each month." Another stated. "It was like having an old piece of furniture in your house that you don't need and somebody said, 'Hey, I'll give you $8,000 for it.' I was planning on getting rid of it anyway." This market-logic influenced way of making sense of their own egg donation was compounded for those who became "known donors," a term used to describe those whose previously donated eggs had reliably resulted in the birth of healthy babies. These individuals could command higher compensation levels; choosing to do so would be difficult to reconcile with a pro-social logic.

Our data analysis suggests, however, that not all egg donors came to rely purely on market logics to rationalize their behaviors. In particular, those donors who exerted their agency to connect with the recipients who purchased their eggs, and particularly with their biological offspring, often tended to circle back to a reliance on both pro-social and market logics to make sense of their past behaviors and plan their future actions. As a tentative theoretical insight, we posit that when actors can engage in meaningful social relations in contexts of the type described here, they are more likely to find pro-social logics and market logics similarly salient. In contrast, those whose exchanges commence and remain anonymous are less likely to draw on pro-social logics to rationalize their actions and more apt to rely solely on market logics for sensemaking.

REFERENCES

Aaker, Jennifer L and Satoshi Akutsu (2009), "Why Do People Give? The Role of Identity in Giving," *Journal of consumer psychology*, 19 (3), 267-70.

Almeling, Rene (2007), "Selling Genes, Selling Gender: Egg Agencies, Sperm Banks, and the Medical Market in Genetic Material," *American Sociological Review*, 72 (3), 319-40.

Ariely, Dan, Anat Bracha, and Stephan Meier (2009), "Doing Good or Doing Well? Image Motivation and Monetary Incentives in Behaving Prosocially," *American Economic Review*, 99 (1), 544-55.

Ashton, Michael C, Sampo V Paunonen, Edward Helmes, and Douglas N Jackson (1998), "Kin Altruism, Reciprocal Altruism, and the Big Five Personality Factors," *Evolution and Human Behavior*, 19 (4), 243-55.

Askegaard, Søren and Jeppe Trolle Linnet (2011), "Towards an Epistemology of Consumer Culture Theory: Phenomenology and the Context of Context," *Marketing Theory*, 11 (4), 381-404.

Belk, Russell (2016), "Anthropomorphism and Anthropocentrism," *ACR North American Advances*.

Belk, Russell W., Eileen Fischer, and Robert V. Kozinets (2013), *Qualitative Consumer & Marketing Research*, London: SAGE.

Bendapudi, Neeli, Surendra N. Singh, and Venkat Bendapudi (1996), "Enhancing Helping Behavior: An Integrative Framework for Promotion Planning," *Journal of Marketing*, 60 (3), 33-49.

Beverland, Michael and Sandra Luxton (2005), "Managing Integrated Marketing Communication (Imc) through Strategic Decoupling: How Luxury Wine Firms Retain Brand Leadership While Appearing to Be Wedded to the Past," *Journal of Advertising*, 34 (4), 103-16.

Boenigk, Silke and Bernd Helmig (2013), "Why Do Donors Donate? Examining the Effects of Organizational Identification and Identity Salience on the Relationships among Satisfaction, Loyalty, and Donation Behavior," *Journal of Service Research*, 16 (4), 533-48.

Bone, Sterling A., Glenn L. Christensen, and Jerome D. Williams (2014), "Rejected, Shackled, and Alone: The Impact of Systemic Restricted Choice on Minority Consumers' Construction of Self," *Journal of Consumer Research*, 41 (2), 451-74.

Botner, Keith A, Arul Mishra, and Himanshu Mishra (2015), "What's in a Message? The Longitudinal Influence of a Supportive Versus Combative Orientation on the Performance of Nonprofits," *Journal of Marketing Research*, 52 (1), 39-55.

Bradford, Tonya Williams (2013), "From Twins to Strangers: Considerations of Paired Kidney Donation across Gift and Market Economies," in *Marketing and the Common Good*, ed. John F. Sherry, Jr. and Patrick E. Murphy, 253-66.

Centers for Disease Control and Prevention, American Society for Reproductive Medicine, and Society for Assisted Reproductive Technology (2018), "2016 Assisted Reproductive Technology National Summary Report," ed. US Dept of Health and Human Services, Atlanta (GA): US Dept of Health and Human Services.

Chang, Hannah H and Iris W Hung (2018), "Mirror, Mirror on the Retail Wall: Self-Focused Attention Promotes Reliance on Feelings in Consumer Decisions," *Journal of Marketing Research*, 55 (4), 586-99.

Duhachek, Adam (2005), "Coping: A Multidimensional, Hierarchical Framework of Responses to Stressful Consumption Episodes," *Journal of Consumer Research*, 32 (1), 41-53.

Ertimur, Burçak and Gokcen Coskuner-Balli (2015), "Navigating the Institutional Logics of Markets: Implications for Strategic Brand Management," *Journal of Marketing*, 79 (2), 40-61.

Fenton-Glynn, C (2019), "Surrogacy: Why the World Needs Rules for «Selling» Babies," *BBC News*, 26.

Fischer, Eileen, Cele C Otnes, and Linda Tuncay (2007), "Pursuing Parenthood: Integrating Cultural and Cognitive Perspectives on Persistent Goal Striving," *Journal of Consumer Research*, 34 (4), 425-40.

Frey, Bruno S and Stephan Meier (2004), "Social Comparisons and Pro-Social Behavior: Testing" Conditional Cooperation" in a Field Experiment," *American Economic Review*, 94 (5), 1717-22.

Gautier, Arthur, Anne-Claire Pache, and Imran Chowdhury (2016), "Bound to Fail yet Successful: Understanding Institutionalization Processes of Contested Practices," in *Academy of Management Proceedings*, Vol. 2016: Academy of Management Briarcliff Manor, NY 10510, 13220.

Giving USA (2018), "Giving USA 2018: The Annual Report on Philanthropy for the Year 2017."

--- (2019), "Giving USA 2019: The Annual Report on Philanthropy for the Year 2018."

Grant, Adam and Jane Dutton (2012), "Beneficiary or Benefactor: Are People More Prosocial When They Reflect on Receiving or Giving?," *Psychological science*, 23 (9), 1033-39.

Hartman, Anna E. and Erica Coslor (2019), "Earning Vs Giving: Plural Logics of Reproductive Commodification," *Journal of Business Research* (105), 405-19.

Hill, Ronald Paul and Mark Stamey (1990), "The Homeless in America: An Examination of Possessions and Consumption Behaviors," *Journal of Consumer Research*, 17 (3), 303-21.

Jay, Jason (2013), "Navigating Paradox as a Mechanism of Change and Innovation in Hybrid Organizations," *Academy of management journal*, 56 (1), 137-59.

Jordan, Jennifer, Elizabeth Mullen, and J Keith Murnighan (2011), "Striving for the Moral Self: The Effects of Recalling Past Moral Actions on Future Moral Behavior," *Personality and Social Psychology Bulletin*, 37 (5), 701-13.

Lee, Angela Y. and Tonya Williams Bradford (2015), "The Effects of Self-Construal Fit on Motivation, Attitudes, and Charitable Giving," in *Handbook of Culture and Consumer Behavior*, ed. Sharon Ng and Angela Y. Lee, New York: Oxford, 135-49.

Lee, Jaehoon and LJ Shrum (2012), "Conspicuous Consumption Versus Charitable Behavior in Response to Social Exclusion: A Differential Needs Explanation," *Journal of Consumer Research*, 39 (3), 530-44.

Lee, Saerom, Karen Page Winterich, and William T Ross Jr (2014), "I'm Moral, but I Won't Help You: The Distinct Roles of Empathy and Justice in Donations," *Journal of Consumer Research*, 41 (3), 678-96.

Luce, Mary Frances, James R. Bettman, and John W. Payne (1997), "Choice Processing in Emotionally Difficult Decisions," *Journal of Experimental Psychology: Learning, Memory and Cognition*, 23 (2), 384-405.

McMullen, Jeffery S and Brian J Bergman (2017), "Social Entrepreneurship and the Development Paradox of Prosocial Motivation: A Cautionary Tale," *Strategic Entrepreneurship Journal*, 11 (3), 243-70.

Nilsson, Artur, Arvid Erlandsson, and Daniel Västfjäll (2016), "The Congruency between Moral Foundations and Intentions to Donate, Self-Reported Donations, and Actual Donations to Charity," *Journal of Research in Personality*, 65, 22-29.

Pande, Amrita (2010), "" At Least I Am Not Sleeping with Anyone": Resisting the Stigma of Commercial Surrogacy in India," *Feminist studies*, 36 (2), 292-312.

Rauscher, Emily A, Stephanie L Young, Wesley T Durham, and Joshua B %J Health communication Barbour (2017), ""I'd Know That My Child Was out There": Egg Donation, the Institutionalized "Ideal" Family, and Health Care Decision Making," 32 (5), 550-59.

Russell, Cristel Antonia and Hope Jensen Schau (2015), "Consumers' Experience of Brand Withdrawal: Unfolding Consumption Bereavement Theory," in *Strong Brands, Strong Relationships.*, New York, NY, US: Routledge/Taylor & Francis Group, 263-81.

Sachdeva, Sonya, Rumen Iliev, and Douglas L Medin (2009), "Sinning Saints and Saintly Sinners: The Paradox of Moral Self-Regulation," *Psychological science*, 20 (4), 523-28.

Salamon, Lester M. and Chelsea L Newhouse (2019), "Nonprofit Economic Data Bulletin #47," in *The 2019 Nonprofit Employment Report*, ed. Johns Hopkins University Center for Civil Society Studies.

Sanders, Patricia (1982), "Phenomenology: A New Way of Viewing Organizational Research," *Academy of management review*, 7 (3), 353-60.

Sargeant, Adrian, John B Ford, and Douglas C West (2006), "Perceptual Determinants of Nonprofit Giving Behavior," *Journal of Business Research*, 59 (2), 155-65.

Scaraboto, Daiane and Eileen Fischer (2013), "Frustrated Fatshionistas: An Institutional Theory Perspective on Consumer Quests for Greater Choice in Mainstream Markets," *Journal of Consumer Research*, 39 (6), 1234-57.

Shang, Jen, Americus Reed, and Rachel Croson (2008), "Identity Congruency Effects on Donations," *Journal of Marketing Research*, 45 (3), 351-61.

Sherry, John F., Jr. (1983), "Gift Giving in Anthropological Perspective," *Journal of Consumer Research*, 10 (2), 157-68.

Small, Deborah A and Cynthia Cryder (2016), "Prosocial Consumer Behavior," *Current Opinion in Psychology*, 10, 107-11.

Small, Deborah A and Uri Simonsohn (2008), "Friends of Victims: Personal Experience and Prosocial Behavior," *Journal of Consumer Research*, 35 (3), 532-42.

Sobande, Francesca, Laetitia Mimoun, and Lez Trujillo Torres (2019), "Soldiers and Superheroes Needed! Masculine Archetypes and Constrained Bodily Commodification in the Sperm Donation Market," *Marketing Theory*, 1470593119847250.

Strathern, Marilyn (2012), "Gifts Money Cannot Buy," *Social Anthropology*, 20 (4), 397-410.

Tadajewski, Mark (2016), "Relevance, Responsibility, Critical Performativity, Testimony and Positive Marketing: Contributing to Marketing Theory, Thought and Practice," *Journal of marketing management*, 32 (17-18), 1513-36.

Takhar, Jennifer and H Rika Houston (2019), "Forty Years of Assisted Reproductive Technologies (Arts): The Evolution of a Marketplace Icon," *Consumption Markets & Culture*, 1-11.

Thompson, Craig J (1997), "Interpreting Consumers: A Hermeneutical Framework for Deriving Marketing Insights from the Texts of Consumers' Consumption Stories," *Journal of Marketing Research*, 34 (4), 438-55.

Titmuss, Richard M. (1997), *The Gift Relationship: From Human Blood to Social Policy*, New York: The New Press.

Twenge, Jean M, Roy F Baumeister, C Nathan DeWall, Natalie J Ciarocco, and J Michael Bartels (2007), "Social Exclusion Decreases Prosocial Behavior," *Journal of personality and social psychology*, 92 (1), 56.

van Dijk, Mathilde, Hester Van Herk, and Remco Prins (2019), "Choosing Your Charity: The Importance of Value Congruence in Two-Stage Donation Choices," *Journal of Business Research*, 105, 283-92.

White, Katherine, Rishad Habib, and Darren W Dahl (2020), "A Review and Framework for Thinking About the Drivers of Prosocial Consumer Behavior," *Journal of the Association for Consumer Research*, 5 (1), 000-00.

White, Katherine and John Peloza (2009), "Self-Benefit Versus Other-Benefit Marketing Appeals: Their Effectiveness in Generating Charitable Support," *Journal of Marketing*, 73 (4), 109-24.

Carrots over Candy: A Multi-Method Examination of the Social Factors That Affect Healthy Food Choices

Chairs: Janina Steinmetz, City University of London, UK
Rima Touré-Tillery, Northwestern University, USA
Blake DiCosola, Oxford University, UK

Paper #1: Feeling Judged? The Presence of Outgroup Members Promotes Virtuous Choices

Rima Touré-Tillery, Northwestern University, USA
Janina Steinmetz, City University of London, UK
Blake DiCosola, Oxford University, UK

Paper #2: Conspicuous Self-Control: When Status Motives Lead Consumers to Signal Restraint

Aziza Caimile Jones, Rutgers University, USA
Kristina Durante, Rutgers University, USA
Aparna A Labroo, Northwestern University, USA

Paper #3: Have Your Cake and Make Her Eat It too: Influencing One's Social Influence to Justify Indulgence

Stephanie Lin, INSEAD, Singapore
Christian Wheeler, Stanford University, USA
Sherrie Ying Ying Ying Xue, Singapore Management University, Singapore

Paper #4: Effectiveness and Acceptance of Healthy Eating Nudges

Romain Cadario, Rotterdam School of Management | Erasmus University, The Netherlands
Pierre Chandon, INSEAD, France

SESSION OVERVIEW

An increasing share of the population in industrialized countries is obese, with severe public health consequences. Although consumers generally have the goal to eat healthily, they often struggle to follow through (Hofmann et al. 2012). Helping consumers to make healthier food choices is thus an important avenue for marketing research to ultimately foster consumer well-being.

This special session examines how consumers navigate the social influence that other people exert on their food choices and what beliefs underlie their behavior. We use a multi-method approach to investigate which social situations aid versus hinder consumers' healthy choices, and how consumers think about social influence on their food choices. Thereby, we add to the understanding of consumption not only as need satisfaction, but also as a way to seek recognition and belonging (Berger and Rand 2008).

The first and second paper highlight that consumers use healthy food choices to manage the impression that others have of them. Specifically, the first paper shows that consumers make healthier food choices in the presence of outgroup (vs. ingroup) others. This effect holds across a variety of outgroups (e.g., racial, professional, or academic outgroups). Consumers anticipate that outgroups others judge them more negatively than ingroup others, and they use healthy food choices to counter these anticipated negative judgments, as healthy eating is believed to be a generally praiseworthy behavior (Stein and Nemeroff 1995). The second paper tests whether consumers believe that they can use healthy food choices as a means to signal social status to others. Because restraint is associated with many positive life outcomes, restraint itself might signal status. Consumers who chronically or situationally desire high social status make healthier food choices, due to the belief that high status entails exerting restraint.

The third and fourth paper look at consumers' active role in shaping the social environments of their food choices. In more detail, the third paper argues that consumers encourage others to match their consumption behavior when making indulgent (vs. healthy) choices to justify their own indulgence. Consumers feel worse about indulging when their social environment eats healthily. Therefore, consumers try to influence others to indulge so they can, too. The fourth paper investigates consumers' beliefs about being influenced by their social environment to make healthy choices. Consumers approve of others trying to influence their food choices by nudging, but only when the nudges are perceived to be effective at aiding healthier choices. Thus, consumers endorse social influence when they believe that it helps them to eat healthily.

Taken together, we show that consumers take an active role in influencing others' impression of them based on their food choices, influence others based on their desires, and approve of being influenced if it helps their healthy eating. These behaviors are based on consumers' beliefs about healthy choices being desirable but difficult to make without a little help from others. These findings have important theoretical implications for research on social influences and food choices, as well as practical implications for marketer and public policy makers.

Feeling Judged? The Presence of Outgroup Members Promotes Virtuous Choices

EXTENDED ABSTRACT

Consumers routinely choose between products of virtue (e.g., healthy food) and those of vice (e.g., indulgent food). These choices take place not in a social vacuum, but often in the presence of observers, for example in supermarkets or cafeterias. Whereas much research has shown that consumers choose virtue over vice in the presence of observers compared to when alone (e.g., Griskevicius, Tybur and van den Bergh 2010), what is not yet known is whether characteristics of the observers affect consumers' choices.

Social diversity is increasing in neighborhoods, schools, and workplaces (Putnam 2007). As a consequence, consumers regularly encounter outgroup others who belong to different social groups (e.g., ethnic, academic, or professional outgroups). In such instances, consumers might fear negative judgment, because they themselves judge outgroup members more negatively than ingroup members (Brewer 1979). As consumption not only fulfills personal needs for specific products, but also social needs for recognition and acceptance (Berger and Heath 2007), consumers might choose products to alleviate the negative judgments they expect from outgroup observers.

In this research, we investigate whether the presence of an ingroup vs. outgroup observer influences consumer choices of virtuous versus indulgent foods. We predict that consumers will make healthier choices in the presence of outgroup (vs. ingroup) others, mediated by the anticipation of being judged negatively by outgroup members. In seven studies, we showed the effect of observers' group-membership on choice virtuousness using various types of group memberships (race/ethnicity, school- and work-affiliation),

food choices, and participant populations (university-students and general-adult populations).

Study 1 tested the causal link between an observer's group membership and participants' food choices. Three hundred thirty-six participants were approached by a black or a white research assistant (RA) to complete a filler survey. Afterwards, participants chose between an indulgent KitKat bar and a healthier fruit snack (our dependent measure). We coded as ingroup (vs. outgroup) any responses for which the RA and the participant were of the same (vs. different) race. A greater proportion of participants in the outgroup condition chose the healthier raisins (44.16%) than in the ingroup condition (29.41%; $b = .64 (.33)$, $z = 1.94$, $p = .053$).

Studies 2 and 3 replicated the effect of observer group-membership on food choice for another type of group membership: university affiliation. In Study 2, 180 student participants were approached by an RA dressed either in their university's t-shirt and cap (ingroup condition) or in another local university's t-shirt and cap (outgroup condition) to complete a filler survey. Afterwards, participants chose between indulgent M&Ms and healthier raisins (our dependent measure). A greater proportion of participants in the outgroup condition chose the healthier raisins (31.25%) than in the ingroup condition (12.16%; $b = 1.19 (.45)$, $z = 2.66$, $p = .008$. In Study 3, 154 student participants completed an online study they believed originated from their own university (ingroup) or a foreign university (outgroup). For our dependent measure, participants chose between a health-minded vs. an indulgent restaurant gift-card. A greater proportion of participants in the outgroup condition (80.77%) chose the healthier restaurant than in the ingroup condition (65.79%; $b = .78 (.38)$, $z = 2.08$, $p = .037$.

Study 4 tested the role of expected interpersonal-judgment in the effect of observer group-membership on food choice. Using a causal-chain mediation, two separate studies examined this proposed psychological process (expected interpersonal-judgment) as both an effect of the independent variable (observer group-membership) and as a predictor of the dependent variable (food choice). In Study 4a, 206 participants imagined making an indulgent food choice in the presence of an ingroup (vs. outgroup) observer, and indicated their expected interpersonal-judgment from this person. Participants expected the outgroup member would judge them more negatively ($M = 4.87$, $SD = 2.03$) than the ingroup member ($M = 5.52$, $SD = 1.87$, $t(204) = 2.39$, $p = .018$). In Study 4b, 192 participants imagined choosing between indulgent and healthy food options in the presence of an observer (with unspecified group membership), and indicated their expected interpersonal-judgment from this person, as well as their food choice. The more harshly participants expected the observer to judge them, the more likely they were to choose the healthier option, $\beta = .235$, $SE = 0.113$, $t(197) = 2.076$, $p = .039$.

Study 5 tested the moderating roles of internal-attribution tendencies. Three hundred twenty-three student participants completed an online survey they believed originated from their own university (ingroup) or another local university (outgroup). Participants indicated their preference for healthy and indulgent subscription food-clubs, and their general tendency to make internal attributions for their own actions using Touré-Tillery and Light's (2018) self-diagnosticity scale. We found a significant interaction of observer group-membership × internal-attribution tendency × food type ($F(1, 298) = 4.76$, $p = .030$). As we expected, internal-attribution tendencies moderated the effect of observer group-membership on food choice such that it replicated at lower—but not at higher—levels of internal-attribution tendencies.

In Study 6, we used (US) state-level search data from Google Trends to examine the relationship between the percentage of minor-

ities in a state (our proxy for the presence of outgroup observers) and the relative number of Google searches for pretested healthy versus unhealthy foods in that state (our proxy for food choices). We found a significant interaction of food type × percentage of minorities ($b = 15.63 (6.85)$, $t(49) = 2.28$, $p = .027$). As expected, as the percentage of minorities in that state increased, the relative number of searches for healthy food (vs. unhealthy food) also increased.

Our finding that observer group-memberships affects consumers' indulgent vs. healthy choices has several implications. On a theoretical level, research has not yet shown that people use food choices to influence others' perceptions. This finding is important because it highlights that the social environment impacts food choices in more complex ways than previously thought. On a practical level, marketers should consider the diversity of the environment in which they market healthy vs. unhealthy products. Thus, social diversity matters when marketing products and segmenting consumers.

Conspicuous Self-Control: When Status Motives Lead Consumers to Signal Restraint

EXTENDED ABSTRACT

Extant research suggests that status signaling motivations lead consumers to behave indulgently. They are more willing to purchase conspicuous luxury products over less expensive options to convey wealth and signal high status (Rucker and Galinsky 2008). We posit that when consumers are unable to convey wealth, they respond to status signaling desires by attempting to convey self-control because of the need to appear goal-oriented. Goal-oriented individuals are more likely to succeed in school and in their careers (Locke and Latham 2006), both of which can lead to high status. Self-control may indicate that a consumer is goal-oriented because it involves sacrificing an immediate desire for a long-term result. Thus, status signaling consumers may attempt to conspicuously engage in self-control as a way to signal that they are highly goal-oriented, and ultimately high status.

Six studies examined whether consumers display self-control to signal high status because such behaviors signal that they are goal-oriented. In studies 1-4, we held the product prices constant in all the choices that participants made. We conducted Study 1 in a low-income area of a large metropolitan city. Two experimenters approached individuals in public and gave each participant one of two flyers, one that stimulated a status-signaling motivation or one that did not. After reading the flyer, participants chose between receiving a self-control signaling product (banana) or a different product (M&Ms). Status signaling motives (vs. control) led participants to select the banana (i.e., the self-control product; $p = .04$).

Study 2 replicated the effect in a controlled environment. We randomly assigned participants to a status signaling or control condition. After the status manipulation, they imagined that they were with two other people while at home and had the choice between sharing a self-control related video (self-control signaling product) or an enjoyable video. Status motives (vs. control) led consumers to select the self-control video ($p < .01$).

If status signaling motives lead consumers to conspicuously choose products that signal self-control, then consumers should attempt to make such products observable to others (Sundie et al. 2011). Study 3 examined this by employing a 3 (status signaling motivation: high, low, vs. control) × 2 (self-control signaling product: yes vs. no) between-subjects design in which preference for a transparent versus an opaque container was our dependent variable of interest. We primed participants with either a high, low, or control (no prime) desire to signal status and randomly assigned par-

ticipants to a healthy meal (i.e., self-control signaling product) or an unhealthy meal condition. Participants imagined that they were with a group of people and were purchasing lunch from a local restaurant that served healthy (i.e., self-control signaling product) or unhealthy meals. They picked between 2 containers for their meals – one that was transparent or another that was opaque. The analysis revealed only a significant interaction (p = .04). Status signaling participants preferred the transparent container more for a healthy, self-control signaling meal compared to an unhealthy meal (p = .009), an effect not found in the other two conditions.

Study 4 sought to examine whether a desire to signal that one is goal-oriented mediated the effect. We randomly assigned participants to a status signaling or control condition. After completing the manipulation, they imagined shopping with several people and indicated their preference between receiving a self-control application or a gaming application. They also reported their need to signal that they were goal-oriented. Status signaling participants were more likely to select the self-control application (p < .05). Desire to signal that they were goal-oriented mediated the effect.

While the previous studies held the product prices constant, Study 5 aimed to show that the effect weakens when consumers choose between products that vary largely in price, and therefore, allow the consumer to signal wealth instead of self-control. We randomly assigned participants to a status signaling or control condition. After completing the manipulation, they imagined shopping with several people and indicated their preference between purchasing a tablet with preloaded self-control applications or a tablet with preloaded games. We told half the participants that both tablets cost $150. We told the rest of the participants that the gaming tablet cost $350 and the self-control tablet cost $150. The results revealed a significant interaction (p < .001) in which status signaling participants were more likely to select the self-control tablet, but only when it was equal price with the games tablet.

Study 6 aimed to demonstrate that even in situations where status signaling consumers are tempted to purchase more expensive products over less expensive options, they can be motivated to purchase the less expensive option if they remember that saving behavior is a signal of self-control. We randomly assigned participants to a status signaling or control condition. After completing the manipulation, they imagined shopping with several people and indicated their preference between purchasing one of two cell phones. One phone was $200 more than the other. We reminded half the participants that saving behavior signals self-control. The results revealed a significant interaction (p < .05) in which status signaling participants were more likely to select the less expensive phone, but only when we reminded them that saving behavior signals self-control.

Our findings suggest that status-signaling motives can enhance preferences for products associated with self-control because consumers equate high status with a strong goal orientation. From a practical perspective, our findings suggest that marketers can encourage consumers who desire to signal status to engage in self-control and purchase self-control related products.

Have your cake and make her eat it too: Influencing one's social influence to justify indulgence

EXTENDED ABSTRACT

Because indulging violates personal standards of behavior (Dahl, Honea, & Manchanda, 2003), people have a variety of ways to justify their actions (Khan and Dhar 2006; Kivetz and Zheng 2006; Xu and Schwarz 2009). One way to justify one's transgressions is by comparing one's behavior to others'. People are likely to indulge more when others are indulging (Burger et al. 2010; Herman, Roth, and Polivy 2003; Prentice and Miller 1993), and feel less guilty if another person engages in small indulges with them than if they indulge and the other person abstains (Lowe and Haws 2014). If others' bad behavior makes people feel better about their own transgressions, might people manipulate those norms directly? We hypothesize that people encourage others to match their consumption behavior when they indulge (vs. not indulge) in order to justify their indulgence.

In study 1a, participants (100 MTurk) rated how fun and indulgent 40 activities were (e.g. eating a slice of cake, buying groceries) and how justified they would feel doing those activities alone and with a friend. People felt more justified doing indulgent activities with friends than alone, and this difference increased with ratings of indulgence t(3996)=16.45, p<.001. In study 1b, participants (100 MTurk) rated how fun and indulgent the same activities were, and how likely they were to encourage their friends to do those activities with them. Indulgence predicted encouragement of friends to match their behavior, controlling for how fun the activity was, t(3980)=9.33, p<.001.

Study 2 tested whether people are more likely to encourage others to match their indulgent (vs. non-indulgent) behavior to justify their behavior. Participants (295 MTurk) imagined that they ordered a beer or lemonade with lunch, and that their friend asked what they should order. Participants indicated their recommendation and how justified they would feel if their friend ordered beer and how justified they would feel if their friend ordered lemonade. Participants encouraged their friend to match their consumption more when they ordered beer than lemonade, t(192)=–6.99, *p*<.001. This was not driven by participants always encouraging beer; those in the beer condition encourage beer more than those in the lemonade condition, t(192)=4.39, *p*<.001. (Across studies, matching and indulgence are examined separately when relevant; we expect both more matching and more indulgence encouragement in the indulgence vs. non-indulgence conditions). Mediation indicated that people encouraged matching more for beer than lemonade because they anticipated matching to make them feel more justified when drinking beer (vs. lemonade), CI_{95}[-.21, -.02].

Study 3a tested the underlying reason for this anticipated justification. Female participants (N=200 MTurk) imagined ordering either cake or fruit salad, and indicated what they would encourage their friend to order. They responded to mediator items representing three proposed mechanisms: (1) having a partner-in-crime (e.g., "If my friend followed my recommendation…I would feel more justified because at least we would both be engaging in equally bad behavior," (2) lowering perceived consequences (e.g., "…I would feel like my choice was less 'bad' or 'wrong',"), and (3) changing the situational norm (e.g., "…it would feel like I made my choice for a celebration"). Those who chose cake recommended that their friend match their behavior more than those who chose fruit, t(192)=-5.33, *p*<.001 (and recommended cake more, t(192)=–4.39, *p*<.001). Only the partner-in-crime measure mediated the effect, CI_{95}[.022, .530]. Study 3b manipulated whether ordering cake was justified or not: cake either exceeded (unjustified) or was within (justified) their allotted "diet points." Participants (N=200 female MTurk) who had unjustifiably (vs. justifiably) ordered cake were more likely to encourage that their friend match their behavior by ordering cake, t(197)=6.01, *p*<.001. Both partner-in-crime (CI_{95}[.001, .244]) and situational norms (CI_{95}[.059, .417]) mediated this effect.

Study 4 explored the role of gender in the lab. Same-gendered friend dyads were directed to two separate rooms, each containing a face-down playing card (one red, one black, randomly assigned).

The experimenter explained that if the card was red, they would eat a Snickers bar (indulgence), and if it was black, they would eat saltine crackers (non-indulgence). Participants privately checked their card. The experimenter then said she "forgot" to choose a card for the other participant, and asked participants to choose a card for their friend from a box. The box contained eight face-down cards and two face-up cards (one red, one black). Participants chose a card matching their own more when they were assigned to indulge (B=.38, SE=.15, p=.012), with no gender interaction. When examining choice of indulgence, a pre-registered gender by snack interaction emerged, B=.29, SE=.15, *p*=.052. Women were marginally more likely to choose indulgence when they were assigned to indulge than not, B=.32, SE=.19, *p*=.085; men did not show this difference, B=—.25, SE=.22, *p*=.27.

Study 5 tested whether people indulge more when they can first facilitate indulgence in others. Participants (150 female students) expected to be assigned to snack or not while watching a video. In the "self-only" condition the participant served herself mini peanut butter cups from a large bowl. In the "both" condition, the participant was also asked to serve another participant, ostensibly in another room. As expected, those in the "both" condition served themselves more than those in the "self-only" condition, t(103)=3.00, p=.003. To ensure that participants in the "both" condition were not being generous and subsequently anchoring their own serving on a larger amount, there was also an "other-only" condition in which participants served only another participant (ostensibly because the stimuli were in the wrong room). They unexpectedly served the other participant more in the "other-only" condition than they did in the "both" condition, t(100)=3.45, p<.001. This suggests that people were not simply anchoring on a generous amount in the "both" condition, as they were even more generous in the "other only" condition.

Thus, consumers play a role in shaping their social contexts when they wish to justify their own indulgence. This contributes to research on social influence, dyadic consumption, and justification literatures, while having marketing implications (e.g., when to offer "bring a friend" deals vs. BOGO deals).

Effectiveness and Acceptance of Healthy Eating Nudges

EXTENDED ABSTRACT

A growing number of governments, food producers and retailers, are considering implementing nudges promoting healthier eating. A nudge can be defined as "any aspect of the choice architecture that alters people's behavior in a predictable way (1) without forbidding any options, or (2) significantly changing their economic incentives. Putting fruit at eye level counts as a nudge; banning junk food does not" (Thaler and Sunstein 2008).

Not all healthy eating nudges are equal. A recent meta-analysis (Cadario and Chandon 2019) found that their effectiveness increases as their focus shifts from influencing what people know (cognitive nudges), how they feel (affective nudges), or what they do (behavior nudges). This study further distinguishes between two or three subtypes of nudges for each category, leading to seven types of nudges. Cognitive nudges include "descriptive nutritional labeling," "evaluative nutritional labeling," and "visibility enhancements". Affective nudges consist of "healthy eating calls" and "hedonic enhancements". Behavioral nudges include "convenience enhancements" and "size enhancements."

Selecting the optimal healthy eating nudge is not just a question of selecting the most effective one. Governments and companies must also consider whether these nudges are likely to be accepted by consumers. Although all nudges are supposed to improve consum-ers' welfare "as judged by consumers themselves » (Sunstein 2018), this assumption is rarely tested. Certainly, it seems cavalier to assume that consumers will welcome any nudge, especially those that restrain their perceived sense of agency.

Therefore, the goal of this study is to help decision makers select the best healthy eating nudge by measuring consumers' perceptions—including their acceptance—of the seven types of nudges identified in the literature. In a second step, these perceptions are compared to the actual effectiveness of the same nudges reported in Cadario and Chandon (2019).

Methods

We surveyed 118 American citizens about their acceptance of different types of healthy eating nudges. To investigate the drivers of their acceptance, we asked them about their perceptions of the effectiveness of each nudge and of the beneficiaries of the nudge (good for health, good for business, or both). Participants were presented, in random order, the scenarios for seven healthy eating nudges.

We asked participants to answer two questions: "Do you approve or disapprove of the following policy?" (Approve/disapprove) and "Do you think that this policy will make people eat better?" (Yes it will/No it will not). Then, we compared these perceptions to the average effect sizes about these seven nudges reported in Cadario and Chandon (2019).

Results

The actual effectiveness of these seven nudges was inversely related to their mean approval rating (r=-.57) as well as to their perceived effectiveness (r=-.49). For example, only 43% of respondents approved the most effective intervention – portion and package size reductions.

To examine the drivers of nudge approval, we regressed approval on the effectiveness of the nudge (the standardized mean difference reported in the meta-analysis), its perceived effectiveness, two binary variables capturing the effects of the perceived beneficiary of the nudge, and the individual characteristics.

First, we found that approval was positively associated with perceived effectiveness, as one would expect, but negatively associated with actual effectiveness. Second, we found that interventions perceived as a "win-win" for business and health had higher approval than interventions perceived as benefiting either health or business, and that there were no differences in approval between each of these respectively

Discussion

The average approval rate of the seven healthy eating nudges was only 56%, a lower rate than we would expect based on prior results suggesting that the United States is a "pro-nudge" country (Sunstein et al. 2017). More importantly, there were large variations in approval across nudges. Consistent with prior research, there was higher approval for deliberative ("system 2") than for automatic ("system 1") nudges (Felsen et al. 2013; Jung and Mellers 2016). Nudges with the highest approval (85%) were those that simply inform consumers, such as descriptive nutrition labels. The addition of interpretive symbols (such as color-coding) to shift from description to prescription reduced approval levels from 85% to 76%.

Our results extend this research by showing that the most effective healthy eating nudges receive significantly lower approval than the rest. The average approval rate of the two most effective nudges, convenience enhancements and portion and package size reductions, was 43%, indicating that when asked to choose between healthy eating nudges, there is a tradeoff between approval and effectiveness.

What, then, drives the approval of healthy eating nudges? Our analyses rule out that people simply reject nudges that they deem to be the most effective – for example because they do not want to be influenced. In fact, approval ratings increased with *perceived* effectiveness. This suggests that the problem is not that people dislike being nudged but that they are poor judges of which nudges are effective.

REFERENCES

Berger, Jonah, and Chip Heath (2007), "Where consumers diverge from others: Identity signaling and product domains," *Journal of Consumer Research*, 34(2), 121-134.

Berger, Jonah, and Lindsay Rand. 2008. "Shifting Signals to Help Health: Using Identity Signaling to Reduce Risky Health Behaviors." Journal of Consumer Research 35 (3): 509–18.

Brewer, Marilynn B. (1979), "In-group bias in the minimal intergroup situation: A cognitive-motivational analysis," *Psychological Bulletin,* 86(2), 307-324.

Burger, Jerry M., Heather Bell, Kristen Harvey, Jessica Johnson, Claire Stewart, Kelly Dorian, and Marni Swedroe (2010), "Nutritious or Delicious? The Effect of Descriptive Norm Information on Food Choice," *Journal of Social and Clinical Psychology*, 29(2), 228–42.

Cadario, Romain and Pierre Chandon (2019), "Which Healthy Eating Nudges Work Best? A Meta-Analysis of Field Experiments," *Marketing Science*, in press.

Felsen, Gidon, Noah Castelo, and Peter B Reiner (2013), "Decisional enhancement and autonomy: public attitudes towards overt and covert nudges," *Judgment and Decision Making*, 8 (3), 202-13.

Griskevicius, Vladas, Joshua M. Tybur, and Bram Van den Bergh (2010), "Going green to be seen: status, reputation, and conspicuous conservation," *Journal of Personality and Social Psychology*, 98(3), 392-404.

Herman, C. Peter, Deborah A. Roth, and Janet Polivy (2003), "Effects of the Presence of Others on Food Intake: A Normative Interpretation," *Psychological Bulletin*, 129(6), 873–86.

Hofmann, Wilhelm, et al. (2012), "Everyday temptations: an experience sampling study of desire, conflict, and self-control," *Journal of Personality and Social Psychology*, 102(6), 1318-1335.

Jung, Janice Y and Barbara A Mellers (2016), "American attitudes toward nudges," *Judgment and Decision making*, 11 (1), 62-74.

Khan, Uzma and Ravi Dhar (2006), "Licensing Effect in Consumer Choice," *Journal of Marketing Research*, 43(2), 259–66.

Kivetz, Ran and Yuhuang Zheng (2006), "Determinants of Justification and Self-Control," *Journal of Experimental Psychology: General*, 135(4), 572–87.

Locke, Edwin A., and Gary P. Latham (2006), "New Directions in Goal-Setting Theory," *Current Directions in Psychological Science, 15 (5),* 265-68.

Lowe, Michael L. and Kelly L. Haws (2014), "(Im)Moral Support: The Social Outcomes of Parallel Self-Control Decisions," *Journal of Consumer Research*, 41(2), 489–505.

Prentice, Deborah A. and Dale T. Miller (1993), "Pluralistic Ignorance and Alcohol Use on Campus: Some Consequences of Misperceiving the Social Norm," *Journal of Personality and Social Psychology*, 64(2), 243–56.

Putnam, Robert D. (2007), "E pluribus unum: Diversity and community in the twenty-first century the 2006 Johan Skytte Prize Lecture," *Scandinavian Political Studies*, 30(2), 137-174.

Rucker, Derek D. and Adam D. Galinsky (2008), "Desire to Acquire: Powerlessness and Compensatory Consumption," *Journal of Consumer Research, 35 (2),* 257-67.

Stein, Richard I, and Carol J Nemeroff (1995), "Moral Overtones of Food: Judgments of Others Based on What They Eat," *Personality and Social Psychology Bulletin,* 21(5), 480–90.

Sundie, Jill M., Douglas T. Kenrick, Vladas Griskevicius, Joshua M. Tybur, Kathleen D. Vohs, and Daniel J. Beal (2011), "Peacocks, Porsches, and Thorstein Veblen: Conspicuous Consumption as a Sexual Signaling System," *Journal of Personality and Social Psychology*, 100(4), 664-80.

Sunstein, Cass R, Lucia A Reisch, and Julius Rauber (2017), "Behavioral insights all over the world? Public attitudes toward nudging in a multi-country study," in Working Paper.

Sunstein, Cass R. (2018), ""Better off, as judged by themselves": a comment on evaluating nudges," *International Review of Economics*, 65(1), 1-8.

Thaler, Richard H. and Cass R. Sunstein (2008), *Nudge: Improving Decisions about Health, Wealth, and Happiness*. New York: Penguin Books.

Touré-Tillery, Maferima, and Alysson E. Light (2018), "No self to spare: How the cognitive structure of the self influences moral behavior," *Organizational Behavior and Human Decision Processes,* 147, 48-64.

Xu, Jing and Norbert Schwarz (2009), "Do We Really Need a Reason to Indulge?," *Journal of Marketing Research*, 46(1), 25–36.

Obstacles and Opportunities to Consumer Engagement in Medical Decision Making
Chair: Mohamed A. Hussein, Stanford University, USA

SESSION OVERVIEW

Because of the rapid proliferation of medical information, consumers are becoming more engaged in decisions about their health. For example, consumers increasingly track their health-related behaviors (e.g., number of steps, calorie intake, sleep quality) through wearable devices (e.g., Fitbits); go online to diagnose themselves and learn about possible treatment options; and leave online reviews reflecting on their experiences with healthcare providers.

Importantly, medical decisions often involve multiple stakeholders: physicians, consumers/patients, insurance providers, and policy makers. This session aims to explore these different perspectives, and highlight four specific ways in which social, cognitive, and motivational variables could hamper or facilitate consumers' medical decision making. These papers incorporate a diverse array of empirical methods including focus groups, semi-structured interviews, online studies with mock search engines, surveys with 1200 physicians, and large-scale field experiments.

The first paper examines the obstacle of estimating out-of-pocket costs. Consumers often cannot determine how much they need to pay for different treatment options, which complicates their decisions. **Ubel** tests physicians' ability to estimate patients' out-of-pocket costs and finds that about one-third of physicians incorrectly estimate these costs. In another study, Ubel uses focus groups with physicians to solicit solutions to overcome this challenge.

The second and third papers take the perspective of consumers and examine factors that can bias their self-diagnosis, i.e., consumers' assessment of the extent to which they have a medical condition. **Hussein and Huang** examine how consumers' search strategy (symptom-focused vs. disease-focused) affect the process and outcome of self-diagnosis and find that symptom (vs. disease)-focused search leads to higher accuracy of self-diagnosis. **Raghubir, Ling,**

and Menon further investigate how self-diagnosis is influenced by contextual cues and find that ambiguous symptoms are perceived to be less diagnostic and weighted less.

Lastly, **Lieberman et al.** take the perspective of policy makers and examine ways to encourage consumers to complete medical screening. In two large field experiments, the authors leverage financial incentives and deadlines to encourage preventive screening.

Together these papers raise (and provide answers to) the following questions:

- What are some of the hurdles to consumers' involvement in medical decision making (e.g., inability to estimate out-of-pocket expenses and susceptibility to contextual cues)?
- What are the psychological drivers that lead consumers to seek diagnosis (e.g., through self-diagnosing online and through taking a screening test), and what are the opportunities to encourage more accurate diagnoses?

This session provides timely insights into medical decision making, a critical topic given consumers' increasing engagement with medical decisions. This session echoes some of the conference's themes, such as the use of multi-method approaches (e.g., focus groups, interviews, lab experiments, and field experiments) and understanding consumers' interactions with technology (e.g., search engines) in the context of medical decision making. We believe that this proposed session should be of interest to a broad audience of scholars and practitioners working on healthcare and medical decisions, technology, extrinsic and intrinsic motivation, and context effects.

Shopping in the Dark – Barriers to Determining the Price of American Healthcare

EXTENDED ABSTRACT

The United States is rapidly shifting toward a high out-of-pocket healthcare system. People are increasingly enrolling in health insurance plans that expose them to costs when they receive healthcare services, either in the form of high deductibles (the amount they pay out-of-pocket before insurance kicks in), co-pays (flat fees for medical services), or coinsurance (exposure to a certain percent of healthcare expenses).

In previous research, my colleagues and I have describe the kind of challenges patients and physicians face trying to determine out-of-pocket expenses in time to inform medical decisions – e.g. figuring out the relative cost of alternative medications for a patients' illness to help determine which medicine the physician should prescribe (Hunter et al. 2017; Ubel 2019; Ubel 2016).

I will discuss two studies which are currently underway, both of which will be completed by the time of the conference. Both studies shed new light on this important topic.

The first study involves a series of focus groups with physicians from four medical specialties – rheumatology, neurology, oncology, and primary care. We have completed five focus groups and will have completed five more by the time of the conference. In the focus groups, we present physicians with examples of patients struggling to figure out the cost of their care. We draw these examples from direct observation of clinic appointments and from interviews of participating patients. We use the examples to prompt physicians to discuss their own challenges trying to ascertain patients' out-of-

pocket expenses. More importantly, we then probe physicians to suggest ways to overcome these challenges.

The solutions we have explored so far in the focus groups have been wide-ranging. They include: incorporating costs into electronic health records; employing financial navigators to help patients determine the costs of potential care; developing tip sheets for patients with specific health conditions to suggest ways of reducing their out-of-pocket expenses – e.g. "co-pay assistance programs available for patients with lupus;" and screening patients in waiting rooms, to identify those struggling with out-of-pocket expenditures.

The focus groups have also yielded rich insights into barriers for implementing potential solutions, with the main challenge being misalignment of financial incentives: "You can hire financial counselors to make the physicians' jobs easier, and to improve patients' lives, but if you reduce income for the Anonymous Hospital Organization, administrators won't hire them."

In the second study, we survey a representative sample of 1200 US physicians and assess how well they can ascertain patients' out-of-pocket expenditures when they have sufficient information to do so. We present physicians with a hypothetical patient:

Now, imagine the following:

- You are about to prescribe the oral biologic DMARD tofacitinib to your patient, Ms. Gray.
- One month's supply of tofacitinib costs $1,000. She asks how much she'll have to pay out of pocket.
- Luckily, you have access to her private insurance information. Tofacitinib is a tier 4 drug, and her insurance runs from January to December.

We ask them four questions about out-of-pocket expenses. For example, in one question, we tell the physicians it is January 3, and ask them to advise the patient on how much she will have to pay out-of-pocket for the drug this month. The correct answer is $1000, because the patient has not met her $2000 deductible yet, so the full price of the drug is her responsibility to bear. In another question, we asked them to imagine it is April, and the patient is still taking the drug. We asked them to estimate how much the drug will cost her that month. In that case, the patient has met her deductible, but is still responsible for half the price of the drug, meaning she will pay $500 that month for the medication.

We have conducted the first of two waves of data collection, with a response rate so far of 40%. Our preliminary results reveal widespread misunderstanding of out-of-pocket expenditures. For example, for the two questions described above, 35%, and 41% of responding physicians so far answered those questions incorrectly.

These two studies provide a window into a dysfunctional market – in which people face high out-of-pocket expenses for the medical care but cannot determine their costs in time to inform their healthcare choices. Moreover, when they turn to their physicians, they often cannot receive good information about their costs.

How Search Strategy Shapes Self-Diagnosis

EXTENDED ABSTRACT

One of the key reasons consumers search for health information online is to self-diagnose (Fox & Duggan 2013). Self-diagnosis refers to consumers' assessment of the extent to which they developed a medical condition. In 2013, more than 35 percent of Americans went online to self-diagnose (Fox & Duggan 2013), and in 2017 this percentage increased to 57 percent (Consumer Health Online 2017). Importantly, 77 percent of online self-diagnosis starts on a search engine, like Google (Fox & Duggan 2013).

We investigated how consumers' search strategy affects self-diagnosis. First, we documented search strategies consumers naturally use when self-diagnosing online (Study 1). We found that consumers used two main types of search strategies: disease-focused and symptom-focused. Second, we investigated the consequences of these two search strategies on self-diagnosis (Study 2). We found that participants randomly assigned to use a symptom-focused (vs. disease-focused) strategy reported more accurate self-diagnoses. We then turned to examining the psychological mechanism driving the increased accuracy. We found that participants in the symptom-focused (vs. disease-focused) condition generated more abstract (vs. concrete) hypotheses during their information search (Study 3), and that those abstract (vs. concrete) hypotheses prevented consumers from being biased by disease-specific information and allowed them to focus more on disease-agnostic information (Study 4), which increased their accuracy.

In Study 1, participants (N = 120) were asked to imagine they went on a nine-day Safari in rural Africa and that they suddenly fell ill. Participants read that they experienced three symptoms (e.g., back pain) and that travelers who visited the safari park sometimes contracted one of four diseases (e.g., Malaria). Next, participants were asked to use Google to better understand their health situation. We used a software called Pipe, which allowed us to record participants' screen as they conducted a Google search. We analyzed the search terms participants used on Google and found that 47.06% of participants used symptom-focused search terms, such as "fever chills and backpain in Africa," while 45.38% of participants used disease-focused search terms, such as "Trachoma in rural Africa."

In Study 2, we investigated whether these two search strategies influenced the accuracy of self-diagnosis. We used the same safari paradigm described in Study 1, and randomly assigned participants (N = 400) to either a symptom-focused or a disease-focused search strategy. Participants in the symptom-focused (vs. disease-focused) condition were asked to choose the symptoms (vs. diseases) they would like to focus their Google search on. After screen-recording their Google search using the same screen-recording client (Pipe), participants reported the probability that they had each of eight diseases: two diseases closely matched the symptoms in the scenario, two diseases were mentioned in the scenario but did not match the symptoms, and four diseases were neither mentioned in the scenario nor matched the symptoms. We pre-registered all analyses. We found that participants in the symptom-focused (vs. disease-focused) condition were more accurate in their self-diagnosis: they reported both higher probabilities for having diseases that matched their symptoms ($b = 7.58$, $z = 3.31$, $p = .001$) and lower probabilities for diseases that did not match their symptoms ($b = 4.84$, $z = -2.70$ $p = .007$).

In Studies 3 and 4, we examined how search strategy affected consumers' hypothesis generation and testing (Klayman & Ha, 1987). To capture the key hypothesis motivating their search, participants in Study 3 (N = 200) engaged in a thought listing exercise (Posavac et al., 2010), in which they shared the questions they hoped their Google search would answer. These questions were coded for the total number of thoughts, whether a concrete hypothesis was mentioned (e.g., "do I have Malaria?"), and whether an abstract hypothesis was mentioned (e.g., "which diseases exhibit symptoms of chills in general?"). We found that, despite reporting the same total number of thoughts ($b = .27$, $t(198) = 1.01$, $p = .31$), participants in the symptom-focused (vs. disease-focused) condition were less likely to report a concrete hypothesis (logistic $b = .28$, $z = -4.16$, $p < .001$) and more likely to report an abstract hypothesis (logistic $b = 4.62$, $z = 4.84$, $p < .001$). Together, these results suggest that search

strategy influences the hypotheses consumers generate and bring to the search engine.

In Study 4, we further tested whether the difference in hypotheses documented in Study 3 changed the type of information participants subsequently chose. We predicted that symptom-focused participants would pay more attention to information that can address their abstract hypotheses (e.g., "Common causes of fever") while diseases-focused participants would pay more attention to information that can better address their concrete hypotheses (e.g., "Malaria – Symptoms and Causes"). We pre-registered these predictions and related analyses. To test this prediction, we used a yoked design in which the hypotheses organically generated in Study 3 were presented to a new set of participants (N = 400), such that each participant in Study 4 read the hypothesis generated by a randomly selected participant from Study 3. Participants were then asked to select up to three search results that would best answer the central questions raised by the hypothesis they were assigned. Participants chose between 10 search results, five of which were disease-specific (i.e., the title contained the names of specific diseases, such as Malaria) and the other five were disease-agnostic (i.e., the title made no reference to a specific disease, such as "Types of Fevers in Travelers Returning from Abroad"). We found that symptom-focused (vs. disease-focused) participants chose fewer disease-specific information sources (b = .31, *t*(180) = 3.13, *p* = .002) and more disease-agnostic information sources (b = .27, *t*(180) = 2.74, *p* = .007). Together, these results suggest that search strategy influenced both the hypothesis generation and subsequent evidence selection needed for self-diagnosis.

In summary, we investigated how online search strategy affects the process and outcome of self-diagnosis. Importantly, employing a symptom-focused strategy resulted in greater self-diagnosis accuracy. This enhanced accuracy appears to be driven by consumers' adoption of more abstract hypotheses which attracts them away from disease-specific information and towards disease-agnostic information.

Web Wizard or Internet Addict? How to Help Consumers Assess Risk

EXTENDED ABSTRACT

A key issue with health risk assessments is one of self-diagnosis. The surge in DTC advertising for conditions ranging from depression to diabetes, typically involve a range of symptoms that consumers are asked to identify in an attempt to self-diagnose. But many of these are ambiguous. This paper examines how consumers assess the risk of internet addiction, which has a number of ambiguous symptoms. The prevalence and growth of internet addiction disorder (IAD) could pose a risk to consumer welfare, as well as the industries that depend on the internet, from personal computers (IBM, Apple), software (Microsoft, Adobe), and hardware providers (HP), to retailers (Amazon, Land's End), search engines (Google) and portals (Yahoo).

Five studies replicate and extend the robust self-positivity in judgments of IAD. Studies 1 and 2 examine self-positivity effects using open-ended estimates of number of hours of internet use. Studies 3-5 examine the effect of the range-of-response-alternatives used to elicit these estimates (Schwarz et al., 1985). A person is considered "addicted" when they have 5/8 symptoms of IAD. However, five of these symptoms are more ambiguous than the remaining three. Overall, results show contextual cues affect risk judgments due to symptom ambiguity: (a) the range of response alternatives used to elicit internet usage affects reports of how many hours of the internet a person uses a day; (b) judgments of self-risk are lower when IAD symptoms are elicited prior to risk estimates; and (c) including a "none-of-the-above" option on the symptom list affects judgments of how common they are.

Experiment 1 (n=75) showed that risk estimates for self (M=2.82) were significantly lower than the average undergraduate (M=4.01, p<.001), but no different than one's best friend (M=2.84; F(2, 146)=31.80, p<.001). A regression of self-risk estimates on internet usage was significant (F(1, 69)=11.39, p<.001, Ra2=.129; B=.046, t=3.38, p<.001).

Experiment 2 (n=109) estimated the effect of whether the IAD symptoms checklist had a "None-of-the-Above" option. When the option was present, fewer symptoms were identified (M=2.62 vs. 3.52; F(1, 107)=8.14, p<.005), and risk estimates were directionally lower (M=56.96 vs. M=61.94; F(1, 107)=1.90, p=0.171), while the self-positivity bias was robust reflecting lower self- versus other-judgments (M=55.83 vs. M=63.07; F(1, 107)=14.74, p<.001). A moderated mediation (process 5) model showed that the effect of self-reports of internet use affected risk judgments indirectly via reports of behaviors associated with addiction, while the direct effect was moderated by how internet use is elicited: in no "none-of-the-above" condition, there was no effect, but in the "none-of-the-above" present condition, there was a direct effect.

Experiment 3 (n=146 US undergrads) examines the effects of the contextual cue of the range of response alternatives (Schwarz et al., 1985). Participants indicated internet use on low-, or high-frequency response alternatives, such that the percentage of participants checking the last category in the "low" condition is comparable to the last four categories in the "high" condition. Those in the "low" condition should infer that they use the internet more than the average person, identify more symptoms, and estimate higher risk (Schwarz et al. 1985). Participants were then assigned to one of two order conditions (symptoms-before-risk, risk-before-symptoms) prior to indicating the likelihood of having IAD (0-100) for themselves and others, resulting in a 2 (response-alternatives) x 2 (order) x 4 (target: self, average person taking the study, average undergraduate student, and average person) mixed design.

The range-of-response-alternatives affected the participants' report of using the internet for >5 hours (Low=48.7%, High=83.8%, (1)=19.70, p<.001). A mixed ANOVA on risk estimates revealed a main effect of target (F(3, 426)=30.39, p<.001, =.176), and a target x order interaction (F(3, 426)=3.70, p=.012, =.025). The interaction showed that perceptions of self-risk (but not risk of the three other targets) were lower only when symptoms were elicited prior to risk estimates (M=44.61 vs. 54.01).

Overall, self-risk perceptions were significantly lower (M=49.31) than estimated risk for the average person taking the study (M=55.745, t145=4.01, p<.001), the undergraduate (M=61.76, t145=7.31, p<.001), but no different from the average person (M=49.155). When the symptoms were elicited first, risk estimates were based on both unambiguous and ambiguous symptoms (Bs=11.78 and 4.74, ts=3.39 and 2.33, ps<.01 respectively). When risk estimates were elicited first, risk estimates were based on reported internet usage and ambiguous symptoms (Bs=20.68 and 12.10, ts=2.36 and 4.81, ps<.01, respectively). Study 4 replicated Study 3's results using a different sample (n=167 Indian MBAs).

Study 5 (n=721 MTurkers) combined the designs of Studies 2 and 4, manipulating elicitation at three levels (hi, lo, control open ended) x 2 (order) x 2 (None of the above: present/ absent), to show that these results are robust. Overall, results suggest that the greater the ambiguity of a symptom, the more prone it is to context effects, and the less likely it is to be assimilated into risk judgments.

Testing the Role of Motivation and Procrastination in Colorectal Cancer Screening

EXTENDED ABSTRACT

Colorectal cancer (CRC) is the second leading cause of cancer death in the U.S. (NIH, 2018). Although screening reduces CRC incidence and mortality (USPSTF, 2016), uptake is suboptimal, especially among underserved populations (Gupta, 2013). Mailed outreach—inviting individuals to complete a fecal immunochemical test (FIT) in the comfort of their own home—offers a non-invasive and more cost-effective approach. Yet, completion rates remain low (Singal et al., 2016). Using insights from behavioral science, we predicted that both a lack of intrinsic motivation and procrastination tendencies may be contributing to low FIT completion. We test these hypotheses in two large field experiments (N=16,336). Study 1 aimed to increase screening by enhancing extrinsic motivation through financial incentives. Study 2 tested whether targeting procrastination—both with and without financial incentives—affected screening rates. We hypothesized that both financial incentives and deadlines would increase screening completion relative to standard outreach.

Incentives are increasingly used in an attempt to influence health behaviors (Saunders et al., 2018). However, while incentives have been shown to motivate some behaviors (DellaVigna, 2016; Stone, 2002), their effectiveness is contextually dependent (Gneezy, 2001), and whether they lead to long-term changes is uncertain (Charness & Gneezy, 2009). Thus, Study 1 tested the effectiveness of offering repeated financial incentives for FIT completion annually for 3 years. Participants (N=8,565) received either standard mailed FIT outreach (N=6,565), outreach plus $5 (N=1,000), or outreach plus $10 (N=1,000) for FIT completion. Participants who completed the test were re-invited using the same incentive the following year, for three years and then invited in Year 4 without any incentive. Contrary to predictions, completion was no different whether participants received an incentive, or not, in Year 1 (p = .59), Year 2 (p = .75), or Year 3 (p = .08). There was also no difference in completion across groups in Year 4, after incentives were discontinued (p = .08). Thus, offering modest incentives of $5 and $10 did not increase FIT completion relative to standard outreach. Study 2 therefore attempts to increase FIT completion by strengthening the financial incentives intervention while also targeting a different psychological barrier—procrastination.

Procrastination—delaying a task to a future day—is ubiquitous and often underlies failure to complete tasks (Akerlof, 1991; Tice & Baumeister, 1997; Zauberman & Lynch, 2005). We posit that this deleterious tendency to procrastinate (Shu & Gneezy, 2010) may be contributing to low FIT completion rates. Deadlines—particularly short deadlines—have been shown to attenuate procrastination (Ariely & Wertenbroch, 2002; Shu & Gneezy, 2010). Thus, in Study 2, we test whether imposing deadlines increases FIT completion. Further, while isolated incentives did not change behavior in Study 1, one explanation may be that there was no reference against which participants could evaluate the incentive (Hsee, 1996). Thus, in addition to deadlines, we add a declining incentive component such that participants are able to compare two incentives relative to one another. Participants (N=7,771) were randomly assigned to receive one of five invitations: (1) control (standard invitation); (2) long deadline (three weeks); (3) short deadline (one week); (4) small declining incentive ($10 for completion within one week or $5 for completion within three weeks); or, (5) large declining incentive ($20 for completion within one week or $10 for completion within three weeks). The prespecified primary dependent variable is the proportion of participants who completed FIT within three weeks of invitation. Results indicated that both non-incentivized deadlines and deadlines coupled with a declining financial incentive (small or large) significantly increased completion relative to standard outreach (ps < .005). Further, completion in the short-deadline condition was higher than in the long-deadline condition (Short: 9.7% vs. Long: 7.2%; (1, N = 3,086) = 6.42, p = 0.011, ϕ = .05). Most notably, imposing a short non-incentivized deadline was just as effective as a deadline coupled with a financial incentive: completion in the short-deadline condition (9.7%) was not statistically different than completion in the small-declining(9.1%; (1, N = 3,076) = 0.33, p = 0.568, ϕ = .01) or large-declining (12.0%; (1, N = 3,089) = 4.20, p = 0.04, ϕ = .04) conditions. Thus, attenuating procrastination by imposing deadlines—with or without financial incentives—increased FIT completion.

Two large field experiments demonstrate that while fixed incentives did not increase CRC screening relative to standard outreach, deadlines did. Moreover, deadlines were equally effective at increasing FIT completion whether they were coupled with declining financial incentives or were non-incentivized. These results implicate procrastination as a key barrier to FIT completion and suggest that offering modest incentives—at least in this context—amounts to paying for nothing. This paper provides insight into the psychology underlying low cancer screening rates and suggests key considerations in the use of behavioral science interventions to encourage health-behavior change.

REFERENCES

Akerlof, G.A. (1991), "Procrastination and obedience," *American Economic Review*. 81, 1-19.

Ariely, D. & Wertenbroch, K. (2002), "Procrastination, deadlines, and performance: Self-control by precommitment." *Psychol Sci*. 13, 219-224.

Charness, G. & Gneezy, U. (2009), "Incentives to exercise." *Econometrica*, 77, 909-931.

Consumer Health Online 2017 (2017), "Consumer Health Online 2017", dotHealth LLC www.get.health/research.

DellaVigna, S. & Pope, D. (2017), "What motivates effort? evidence and expert forecasts" *The Review of Economic Studies*. 85, 1029-1069.

Fishbein, M., & Ajzen, I. (1975), *Belief, Attitude, Intention, and Behavior: An Introduction to Theory and Research*. Reading, MA: Addison-Wesley.

Fox, S. and Duggan, M. (2013), "Health Online 2013." Washington, DC: Pew Research Center.

Gupta, S. et al. (2013), "Comparative effectiveness of fecal immunochemical test outreach, colonoscopy outreach, and usual care for boosting colorectal cancer screening among the underserved: a randomized clinical trial," *JAMA Intern Med*. 173, 1725-1732.

Hsee CK (1996), "The evaluability hypothesis: an explanation for preference reversals between joint and separate evaluations of alternatives," *Organ Behav Hum Decis Process*, *67*, 247-57.

Hunter WG, Zafar SY, Hesson A, Davis JK, Kirby C, Barnett JA, Ubel PA (2017), "Discussing Health Care Expenses in the Oncology Clinic: Analysis of Cost Conversations in Outpatient Encounters," *Journal of Oncology Practice.* 13(11). 944-56.

John, L.K. et al (2011), "Financial incentives for extended weight loss: a randomized, controlled trial," *J Gen Intern Med.* 26, 621-626.

Klayman, J. and Ha, Y.W. (1987), "Confirmation, disconfirmation, and information in hypothesistesting," *Psychological Review*. 94. 211–28.

Menon, Geeta, Priya Raghubir, and Norbert Schwarz (1995), "Behavioral Frequency Judgments: An Accessibility-Diagnosticity Framework," *Journal of Consumer Research*, 22 (2), 212-228.

_____, _____and _____ (1997), "How Much Will I Spend? Factors Affecting Consumers' Estimates of Future Expenses," *Journal of Consumer Psychology*, 6 (2), 141-164.

O'Donoghue, T. & Rabin, M (1999), "Doing it now or later," *Am Econ Rev. 89*, 103-124.

Posavac, S., Kardes, F., & Brakus, J. (2010), "Focus induced tunnel vision in managerial judgment and decision making: The peril and the antidote," *Organizational Behavior and Human Decision Processes*, 113, 102–111.

Raghubir, Priya and Geeta Menon (1998), "AIDS and Me, Never the Twain Shall Meet: Factors Affecting Judgments of Risk," *Journal of Consumer Research*, 25(1), 52-63.

_____ and _____ (2005), "Depressed or Just Blue? The Persuasive Effects of a Self-Diagnosis Inventory" *Journal of Applied Social Psychology*, 35(12), 2535-2559.

Schwarz, Norbert, Hans-J. Hippler, Brigitte Deutsch, and Fritz Strack (1985), "Response Scales: Effects of Category Range on Reported Behavior and Comparative Judgments," *Public Opinion Quarterly*, 49(Fall), 388-395.

Saunders, R., Vulimiri, M., Japinga, M., Bleser, W. & Wong, C (2019), "Are carrots good for your health?" *Current evidence on health behavior incentives in the Medicaid program*. Vol. 1 (Duke Margolis Center for Health Policy).

Screening for Colorectal Cancer US Preventive Services Task Force Recommendation Statement (2016), *JAMA.* 315, 2564–2575.

Shu, S.B. & Gneezy, A. (2010), "Procrastination of enjoyable experiences," *J Mark Res. 47*, 933-944.

Singal, A.G. et al. (2016), "Outreach invitations for FIT and colonoscopy improve colorectal cancer screening rates: A randomized controlled trial in a safety-net health system," *Cancer. 122*, 456-463.

Stone, E.G.*,* et al, (2002), "Interventions that increase use of adult immunization and cancer screening services: a meta-analysis," *Ann Intern Med.* 136, 641-651(2002).

Sun, Yalin, Yan Zhang, Jacek Gwizdka, and Ciaran B Trace (2019), "Consumer Evaluation of the Quality of Online Health Information: Systematic Literature Review of Relevant Criteria and Indicators." *Journal of Medical Internet Research* 21, no. 5.

Surveillance, Epidemiology, and End Results Program—Cancer stat facts: colorectal cancer (NIH, 2018); seer.cancer.gov/statfacts/html/colorect.html

Tice, D.M. and Baumeister, R.F. (1997), "Longitudinal study of procrastination, performance, stress, and health: The costs and benefits of dawdling," *Psychol Sci. 8*, 454-458.

Ubel PA. (2019), *Sick to Debt: How Smarter Markets Lead to Better Care*, Yale University Press. New Haven & London.

Ubel PA, Zhang CJ, Hesson A, Davis JK, Kirby C, Barnett J, Hunter WG. (2016), "Study Of Physician And Patient Communication Identifies Missed Opportunities To Help Reduce Patients' Out-Of-Pocket Spending," *Health Affairs*. 35(4): 654–661.

Zauberman, G., & Lynch Jr, J. G (2005), "Resource slack and propensity to discount delayed investments of time versus money," *J Exp Psych Gen. 134*, 23-37.

The Social and Behavioral Consequences of Browsing Social Media

Chairs: In-Hye Kang, University of North Carolina Greensboro, USA
Yuechen Wu, Johns Hopkins University, USA

Paper #1: Social Media Users are Penalized for Lacking Self-Control

In-Hye Kang, University of North Carolina Greensboro, USA

Yuechen Wu, Johns Hopkins University, USA

Neeru Paharia, Georgetown University, USA

Paper #2: I Care About Why You Share: Inferences about Sharing Motives Influence Observers' Engagement in Similar Experiences

Matthew J. Hall, Oregon State University, USA

Daniel M. Zane, Lehigh University, USA

Paper #3: The Time-Dependent Effects on Bragging

Francesca Valsesia, University of Washington, USA

Jared Watson, New York University, USA

Paper #4: The Role of Social Media-Induced FOMO in Strengthening Brand Communities

Jacqueline R. Rifkin, University of Missouri-Kansas City, USA

Cindy Chan, University of Toronto, Canada

Barbara E. Kahn, University of Pennsylvania, USA

SESSION OVERVIEW

Consumers today spend a significant amount of time on social media platforms such as Facebook and Instagram. In 2018, Internet users spent about 1.25 hours per day on social media platforms (Statista 2019). As such, a growing amount of research has started to examine consumers' motivations for posting on social media (Buechel and Berger 2018; Toubia and Stephen 2013) and how posting about one's experiences on social media can influence their well-being, including enjoyment of an experience (Barash et al. 2018). Yet, little research has examined how browsing social media and more specifically the content consumers encounter while browsing social media can influence consumers' judgments and behavior. For example, what does browsing social media in publicly visible situations signal to others? How does seeing other consumers' postings about their experiences influence consumers' own intention to consume similar experiences? How does encountering a brand's posting about its offline brand event influence consumers' intentions to engage with the brand?

This session sheds light on these questions. **Kang, Wu, and Paharia** examine how observers judge consumers who browse social media in publicly visible situations. The authors find that visibly using social media can trigger negative inferences of increased addiction and lower self-control by observers, leading to unfavorable downstream consequences, such as being less likely to be chosen as a service provider or as a partner to work on a task requiring self-control.

The next two papers examine how browsing other consumers' postings impact one's future consumption. **Hall and Zane** find that when consumers infer that others posted their experiences on social media for extrinsically-motivated (vs. intrinsically-motivated) reasons, they show lower desire to engage in similar experiences, because they anticipate that other people will infer extrinsic motives if they engage in similar experiences.

Valsesia and Watson examine how consumers differentially evaluate others' self-bragging postings depending on the temporal frame. The authors find that consumers evaluate others' bragging about the past (vs. present) less favorably because they perceive the bragging as more intentional. As a result, consumers become less likely to engage with the mentioned brand when the bragging is about past (vs. present) experiences.

Moving to the corporate social media posting, **Rifkin, Chan, and Kahn** examine how encountering postings about brand events can affect consumers' future engagement with the brand. The authors find that seeing social media photos of brand events can trigger FOMO for consumers who missed the events, increasing these consumers' intentions to engage with the brand.

Taken together, the four papers examine how browsing social media postings can influence consumers' various perceptions and behaviors. This session is highly relevant to one of the themes of ACR 2020, "Technology," as the four papers generate timely wisdom on how social media—a relatively new online platform made possible by advances in the mobile and Internet technology—impacts consumer behavior. This session will appeal to a broad audience, including researchers interested in social media, people perception, inference making, temporal frame, and branding.

Social Media Users are Penalized for Lacking Self-Control

EXTENDED ABSTRACT

Reflecting the popularity of consumers' social media use, a growing amount of research has examined the motivations for using social media (Buechel and Berger 2018; Toubia and Stephen 2013) and the consequences of social media use (Barash et al. 2018; Wilcox and Stephen 2013). Prior literature, however, has not explored what inferences observers make about social media users. This is an important gap because consumers often use social media in publicly visible situations, such as while waiting for coffee (Herhold 2018). We argue that visibly using social media can trigger negative inferences of increased addiction and lower self-control by observers, leading to unfavorable downstream consequences.

Prior research suggests that social media use can be addictive (Kuss and Griffiths 2011). In our pretest (n=100), when asked to evaluate the addictiveness of several activities people do on their smartphones, people believed that browsing social media was more addictive than reading a magazine, reading news, watching a movie or even playing a game ($ps \leq .001$). Therefore, we expect that observers will infer that a person using social media is more addicted compared to a consumer engaging in other activities, leading to the inference of lower self-control. We further propose that the inference of low self-control will lead to numerous negative reactions, such as being less likely to be chosen as a service provider.

We identify two theoretical boundary conditions. First, if a target consumer uses social media only for a small fraction of his free time, the inference of addiction should be less, attenuating the negative inferences on self-control. Second, individuals who have positive attitudes towards social media may associate using social media more strongly with positive attributes rather than negative attributes such as addiction, again attenuating the negative inferences on self-control. Turning towards interventions, we expect that consumers are not spontaneously aware of the negative inferences about social media users. Thus, we hypothesize that prompting consumers to take

an observer's role can reduce their own intention to use social media in public.

Studies 1-2 tested negative downstream consequences using an incentive-compatible choice. In study 1 (n=333), participants viewed the bios of two personal trainers at a local gym. One trainer indicated that he liked to browse social media in his free time while the other liked to watch movies. 35.44% of participants chose the trainer who liked to browse social media ($p < .001$) because they perceived the trainer as having lower self-control ($p < .001$).

In study 2 (n=118), participants selected a partner with whom they would like to work on a word search task. We showed participants the profiles of the two partner candidates. The two profiles were similar except that [one/the other] student spent [55%/10%] of her free time using social media. 33% of participants chose a heavy social media user ($p < .001$) because they perceived the heavy user as having less self-control ($p < .001$).

Are the participants' perceptions accurate? In a separate test, we asked participants to engage in the same word search task by themselves. Social media use was not correlated with participants' performance ($p = .98$), suggesting that people's beliefs about social media users are not accurate.

In studies 3A-3B, we tested our multi-step mechanism (social media use→perceived addiction→perceived self-control→downstream consequences). In study 3A (n=247), participants in the [social media/online magazine] condition viewed a picture of a woman scrolling through [a social media account/an online magazine] on her phone at the airport. In both conditions, we showed the same images on the phone to control for the content the woman was browsing. The woman in the social media (vs. magazine) condition was evaluated less positively overall ($p = .012$), as having less self-control ($p = .006$), and as being more addicted ($p < .001$). The hypothesized serial mediation path was significant. Neither impression management nor materialism served as a significant mediator. In study 3B (n=488), we replicated the findings of study 3A by comparing browsing social media with other control conditions: playing an online game and browsing news. The negative effect of social media occurred when the target person browsed social media on a smartphones or laptop.

Study 4 (n=418) tested the moderating effect by the percentage of free time used for social media. Participants in the [100%/4%] condition read a scenario that the flight was boarding in [five minutes/two hours] and the woman was looking at her phone for five minutes by browsing [Instagram/the Wall Street Journal]. We measured willingness to hire the woman for a job as a downstream measure. The interaction effect was significant for the intention to hire ($p = .014$). Participants in the social media (vs. news) condition reported lower intention to hire in the 100% condition ($p = .001$), not in the 4% condition ($p = .89$). We found similar patterns of result for perceived self-control.

Study 5 (n=431) tested the moderating role of attitudes towards social media. Participants read a scenario that a 30-year-old man at the airport was [browsing his Instagram account/reading a magazine]. The regression analysis for the overall favorability of the man revealed a significant interaction ($p = .023$). Specifically, the negative effect of social media (vs. magazine) on overall favorability occurred for participants with attitudes towards social media lower than 5.80. We found similar results for perceived self-control.

Study 6 (n=378) tested the proposed interventions to reduce social media use. All participants read the three scenarios describing a woman [browsing her social media account on her phone/browsing news on her phone/looking around at the café]. After reading each scenario, participants rated the woman on self-control and overall favorability. In the before (after) condition, before (after) participants

evaluated the woman in the three scenarios, participants indicated what activities they would do while waiting in line at a café. Participants in the after condition (56.1%) were less likely to choose to browse social media than those in the before condition (71.7%; $p = .002$).

This research contributes the literature on social media. Practically, our findings can better guide consumers' impression management strategies.

I Care About Why You Share: Inferences about Sharing Motives Influence Observers' Engagement in Similar Experiences

EXTENDED ABSTRACT

While some consumers post about their experiences on social media because they genuinely enjoy giving others insight into their lives, others share to demonstrate their uniqueness or consumption of conspicuous/luxury experiences (Bronner and de Hoog 2018; Kim 2018). Given that consumers' sharing motives differ, do others who view shared content make different inferences about the sharers' posting motives? If so, might these inferred sharing motives influence observers' desire to have a similar experience?

Prior research on perceptions of others' sharing motives has only explored perceived motives behind sharing about experiences relative to material goods. This work demonstrates that perceived sharing motives influence evaluations of the sharer—observers infer the sharer to have relatively more intrinsic motives when viewing shared experiences (vs. material goods), leading to more positive evaluations of the sharer (Van Boven et al. 2010). However, it is unlikely that all experiential sharing is perceived to be equally intrinsically-motivated. In addition, prior research has yet to consider how perceived motives behind sharing about an experience might influence observers' preference to purchase a similar experience.

We first propose that consumers will infer a broad range of sharing motives when viewing others' shared experiences. As initial support, pilot study participants (n=92) viewed a post featuring someone's camping experience and described the poster's sharing motives. Two independent coders rated these qualitative descriptions (-3=purely extrinsic motives; 0=equally intrinsic/extrinsic motives; 3=purely intrinsic motives; $M= -.223$; SD=1.91; interrater reliability=.812). This distribution suggests that consumers infer sharers to have different motives when sharing about their experiences.

Second, we propose that when consumers infer a sharer's post to be more extrinsically-motivated, it will decrease the desirability of the shared experience itself. This will occur because consumers' inferences about the sharer's motives will influence the observers' own perceptions of how others might view them if they had a similar experience (social motivation contagion; Wild et al. 1992). If consumers anticipate others will see them as having more extrinsic motives if they engage in an experience, it should decrease the experience's desirability (Wild and Enzle 2002). Thus, while firms are assumed to benefit when customers share about their firm-related experiences (WOM, buzz, etc.), we suggest such sharing may sometimes deter other customers if the sharer is perceived to have extrinsic sharing motives.

In Study 1, participants (n=361) viewed a mock Instagram post featuring either a jacket (product) or camping scene (experience). Participants reported their likelihood to purchase the featured experience/product and their perceptions of the poster's sharing motives (scale from pilot study). They also evaluated the sharer on a number of positive/negative traits (Van Boven et al. 2010). Replicating prior research, those viewing the experience post perceived

the sharer to have more intrinsic motives ($M_{Experience}$=.52; SD=1.89; $M_{Material}$= -.97; SD=1.82; $F(1,359)$=61.10, p<.001). Pertinent to our hypothesis, however, there was heterogeneity in perceived sharing motives within the experience condition, evidenced by a mean near the scale midpoint and substantial variance. Furthermore, a regression revealed an interaction between the experience/product condition and perceived sharing motives on product/experience purchase likelihood (b= -.249; $t(357)$=2.26, p=.024). As expected, within the experience condition, those who perceived the sharer to have more extrinsic motives reported lower purchase likelihood (b=.296; $t(357)$=3.76, p<.001). Interestingly, perceived sharing motives did not affect purchase likelihood in the product condition (b=.046; $t(357)$=.60, p=.551). Perceived motives equally predicted evaluations of the sharer in both conditions, suggesting our consumption-related consequences are driven by a distinct process than that in Van Boven et al. (2010).

In Study 2, undergraduates (n=338) identified a post in their own social media accounts featuring an experience shared by someone they follow. After describing the experience, they reported how much they would enjoy consuming that same experience (1=not at all; 7=very much) and the sharer's motives (-2=purely extrinsic; 2=purely intrinsic)—these measures were counterbalanced and order had no effect. Perceived sharing motives were normally distributed (M=.097; SD=1.13). Furthermore, perceptions of the sharer's motives predicted anticipated enjoyment of the experience (b=.232; $t(334)$=1.90, p=.059). Participants then also justified why they scored the sharer's motives as they did. An independent research assistant coded these explanations for themes about what aspects of shared experiences led to inferences of intrinsic/extrinsic motives. Participants perceived sharers to have more extrinsic motives when the sharer did not seem truly interested in the experience itself (consuming for the purpose of sharing) or when the sharer's presence in the photo seemed to be the focus (staged poses, heavy makeup, provocative clothing, etc.). Captions featuring text unrelated to the experience (poems, quotes, etc.) or that conveyed social comparison or tried to elicit sympathy also signaled extrinsic motives.

In Study 3, undergraduates (n=114) viewed a mock Instagram post featuring a bowling experience, manipulated based on the themes discovered in the previous study. In the intrinsic post, the sharer was less prominent and was displayed in the act of bowling with a caption related to bowling. In the extrinsic post, the sharer was featured prominently in a staged pose with a caption unrelated to bowling. Participants then reported how likely they would be to purchase a bowling experience. They also reported how others might view their own motives for going bowling, including three intrinsically-motivated explanations (e.g., for the enjoyment of the experience) and three extrinsically-motivated explanations (e.g., to impress others), averaged to create our focal mediator. As expected, mediation analysis revealed that participants who viewed the extrinsic post thought others would view their own motives for going bowling as more extrinsic ($M_{Extrinsic}$=4.27; $M_{Intrinsic}$=5.01; b=.368; $t(111)$=3.57, p<.001), which then predicted purchase intentions (b=.285; $t(111)$=2.16, p=.032; index of mediation: CI_{95}=[.005,.245]).

We demonstrate that when consumers are perceived to have extrinsic motives for sharing experiences, observers see the same experience as less desirable to consume themselves. This occurs because observers assume that others will perceive their own motives as being more extrinsic if they are to consume the experience. These results suggest that firms do not always benefit when their customers share about their firm-related experiences and identify characteristics that lead consumers to infer different motives behind shared content.

The Time-Dependent Effects on Bragging

EXTENDED ABSTRACT

Much research has been dedicated to understand why people brag (Baumeister 1982; Speer 2012) and perceptions of those who do (Tal-Or 2010; Berman et al. 2015). Self-promotion is a fact of life, but with the proliferation of social media usage, people encounter braggarts more than ever before. More recently, the conversation has shifted to understand characteristics of social media posts (Matley 2018a, 2018b). For example, Matley (2018a) demonstrates that the explicit use of the hashtag "#brag" attenuates some of the negativity that might be commuted through a self-praising message. In this research, we explore other message characteristics that might moderate the effect of a self-praising message. Our primary focus investigates the temporal framing of a message. Recent work has demonstrated that people are more likely to share information about rewards that will occur in the future vs. the past (Weingarten and Berger 2017), but little is known about how the temporal framing of a message affects how consumers respond to it.

This research posits that past-oriented self-promotion is viewed negatively relative to both present-oriented self-promotion as a function of the message's perceived intentionality. Present-oriented messages are thought to be spontaneous and emotion-laden, whereas past-oriented messages are perceived to be intentional signals sent by the messenger. Our first study employed a 2-cell design (time: past, present), between-subjects. Participants were told that they would view a tweet then be asked to evaluate the individual. The tweet read either "I cannot believe I just won the Valley half marathon! Hard work pays out! #proud #win #today" or "I cannot believe it is exactly 5 years since I won the Valley half marathon! Hard work paid out! #proud #win #throwback". We asked participants to what extent they perceived the tweet to be "bragging" and a one-way ANOVA indicated that participants viewed tweeting about the past to be significantly more braggy (Mpast = 6.66, Mpresent = 6.05; F(1,163) = 4.82; p = .03). Moreover, we found impressions of the sender to be significantly more positive when the person tweeted about the present (Mpresent = 5.30) compared to the past (Mpast = 4.68; (1,163) = 6.09; p = .01). In reflection, we realized that the message also had an element of skill given the amount of effort required to win a marathon. Thus, in the next study we sought to test whether our effect held when a brag lacked skill and happened due to sheer luck.

In study 2, we employed a 2(time: past, present) x 2(deservingness: luck, skill), between-subjects design. This time, an Instagram post was used to further generalizability. A picturesque waterfall was accompanied with the caption "one year ago today, I was in Costa Rica…" or "right now, I am in Costa Rica…" to manipulate the temporal factor. To manipulate the deservingness factor, the caption also mentioned that the trip was won from a "random raffle for new employees" or "receiving the highest customer satisfaction score for my company". A 2x2 ANOVA on participants' overall evaluation of the poster revealed a significant interaction (F(1,111) = 4.46; p = .04). When the brag was framed in terms of skills, and thus had a deservingness component, we replicate our earlier effect, such that a present brag led to more positive evaluations of the sender compared to past brags (Mpast = 3.86 vs. $M_{present}$ = 4.63, F(1,111) = 3.54; p = .06). Nonetheless, this was not the case when the brag was framed in terms of luck (Mpast = 4.55 vs. $M_{present}$ = 4.22, F(1,111) = 1.23; p = NS).

Thus far, we have established that temporal framing matters, but we've done little to determine the velocity of the effect. In study 3, we assign participants to past, present, and future conditions to explore whether disclosing upcoming events are bragging as well.

However, to account for individual differences in time perceptions we ask participants to report the extent to which they view these events as occurring between the distant past and distant future (5-point scale) and use this item as our primary independent variable. We do this to account for the subjective nature of time and determine the trend between distant and near time horizons. Participants viewed a Facebook post discussing the purchase of a new BMW. We then asked them to evaluate the poster. In this study we also measured behavioral intentions to determine the managerial relevance of our effect. A one-way ANOVA of temporal perceptions on poster evaluations yielded a significant effect ($F(4, 403) = 2.807$; $p = .025$). A curvilinear function emerged such that a positive relationship exists from the distant past to near future ($M_{distant past} = 1.56$, $M_{recent past} = 2.97$, $M_{present} = 3.06$, Mnear future $= 3.44$) before exhibiting a negative effect in the distant future ($M_{distant future} = 2.92$). Similarly, a one-way ANOVA of temporal perceptions on brand intentions yielded the same pattern ($M_{distant past} = 2.67$, $M_{recent past} = 3.57$, $M_{present} = 3.62$, Mnear future $= 4.12$, $M_{distant future} = 2.92$; $F(4,403) = 2.486$; $p = 043$). Naturally, some of these cells suffer from small sample sizes, but nonetheless, further investigation into temporal perceptions is warranted.

Through three studies, this research demonstrates that temporal framing of messaging yields significant effects of not only messenger perceptions but can also have consequences for brands. Bragging about the past vs. the present (or the future) seems to have negative consequences for both but this is the temporal frame in which most people brag. Thus, our next steps will be to investigate strategies by which firms can encourage consumers to brag about present or future interactions vs. past, and to determine whether consumers are aware of this bias when craft a message in the first place.

The Role of Social Media-Induced FOMO in Strengthening Brand Communities

EXTENDED ABSTRACT

We are witnessing a dramatic change in the world of retailing. Rather than shopping in store, consumers can order anything they want online. However, while online shopping has changed the retailing scene, no one is predicting that physical stores are going away. To drive traffic to physical stores, specialty and brand retailers are increasingly hosting in-store events and then posting photos on social media. For example, Footlocker in Harlem, NY hosted a challenge where fans competed to see who had the highest vertical jump. The event featured celebrity appearances and elite sock customization, and photos were posted on Footlocker social media pages. Similarly, Lululemon frequently hosts in-store yoga classes and posts event photos to social media.

While these in-store events likely generate positive outcomes for customers who participate, how do these strategies affect customers who do not attend? We predict that seeing photos of missed brand-community events will elicit a negative emotional feeling of FOMO (Fear of Missing Out) among those who feel more connected to the brand (H1). Although this negative response may seem undesirable, prior research has found that fear appeals can positively influence intentions and behaviors (Tannenbaum et al. 2015). We therefore predict that consumers will cope with their negative feelings of FOMO by increasing their intentions to engage with the brand in the future (e.g., by attending a future event; H2).

We also identify three moderators. One benefit of these events is that they foster local brand communities, attracting people who are members of the local community, but may not be brand loyalists. Therefore, we predict that less brand-connected consumers will respond more favorably when seeing event photos that feature people from their local community, rather than from the brand community (H3). Second, building on previous research on FOMO identifying the critical role of anxious attachment (Rifkin, Chan, and Kahn 2020), we predict that the effects will be stronger among those who feel more anxious about their belonging in the brand community (H4). Finally, consistent with work on fear appeals, we predict a boundary condition in which the effects will be attenuated when consumers are not offered a means of coping with their FOMO (e.g., if an event is private and closed to the public; H5).

We first conducted a field experiment in conjunction with Lululemon ($N = 278$). The study began with an initial survey where we measured participants' connection to the brand and their brand intentions. We then invited participants to an actual in-store event; professional photos of the event were subsequently posted on the local Lululemon Facebook page. Afterwards, we conducted a follow-up survey in which participants were directed to a Lululemon Facebook album containing either photos of the event or Lululemon merchandise. Among participants who did not attend the event (>90% of the sample), we found that, across both photo conditions, participants with higher brand connections felt more FOMO after seeing the photos ($p < .001$), and this increased their future brand intentions (95% $CI = .04$, $.15$), providing support for H1 and H2. Contrasting the two photo conditions, we found that, relative to seeing merchandise photos, seeing event photos featuring people from the local community (i.e., fellow university students) increased brand intentions among people who were initially less connected to the Lululemon brand ($p = .03$; H3).

In a subsequent lab study ($N = 355$) with more experimental control, we re-ran the same three-phases of the field study (using the same photos from the previous event). In the pre-event survey, we also measured participants' anxious attachment to the brand community (adapted from Wei et al. 2007) and brand intentions toward Lululemon. We then used the same two conditions from the field study: participants were directed to Facebook pages featuring either event or merchandise photos. Finally, we conducted a post-event survey measuring FOMO and brand intentions. We again found that seeing social media photos increased FOMO among those with higher brand connection ($p = .003$; H1), and this increased their future brand intentions (95% $CI = .01$, $.05$; H2). Supporting H4, we also found that seeing event (vs. merchandise) photos increased brand intentions among those who were more anxiously attached to the brand community (interaction $p = .02$).

As a further test of H3, we conducted a lab study ($N = 702$) in which we manipulated whether the people in the event photos were from the local community or the brand community. In this and the subsequent study, we also allowed participants to choose from several brands to generalize our effects. We replicated the finding that highly brand-connected consumers felt more FOMO from seeing the photos ($p < .001$; H1), which in turn increased brand intentions (95% $CI = .03$, $.14$; H2). We also observed a photo condition by brand connection interaction in which seeing local (vs. brand) community photos increased brand intentions among less-connected consumers ($p < .001$; H3).

Our final study ($N = 704$) tests a boundary condition (H5) by asking participants to imagine seeing social media photos from a brand event that was either open or closed to the public. We predicted that only open events would offer consumers a means for coping with their feelings of FOMO and would therefore increase brand intentions, whereas closed events would not. We observed a significant mediated moderation whereby seeing event photos increased FOMO among highly brand-connected consumers (95% $CI = -.26$, $-.12$). However, this enhanced FOMO only increased brand inten-

tions when the event was open (95% *CI* = .11, .19), but not when it was closed to the public (95% *CI* = -.05, .06).

In summary, we find that seeing social media photos of local brand events triggers negative feelings of FOMO, which increases intentions to engage with the brand in the future. These effects are stronger among those who feel more connected to the brand and more anxious about their belonging. This research broadens our conceptualization of brand community and has implications for social media strategies.

REFERENCES

SESSION OVERVIEW

Barasch, Alixandra, Gal Zauberman, and Kristin Diehl (2018), "How the Intention to Share Can Undermine Enjoyment: Photo-Taking Goals and Evaluation of Experiences," *Journal of Consumer Research*, 44 (6), 1220–37.

Buechel, Eva C. and Jonah Berger (2018), "Microblogging and the Value of Undirected Communication," *Journal of Consumer Psychology*, 28 (1), 40–55.

Statista (2019), "Daily Time Spent on Social Networking by Internet Users Worldwide from 2012 to 2018," https://www.statista.com/statistics/433871/daily-social-media-usage-worldwide/ (Retrieved at January 2, 2019).

Toubia, Olivier and Andrew T. Stephen (2013), "Intrinsic vs. Image-Related Utility in Social Media: Why Do People Contribute Content to Twitter?," *Marketing Science*, 32 (3), 368–92.

Social Media Users are Penalized for Lacking Self-Control

Barasch, Alixandra, Gal Zauberman, and Kristin Diehl (2018), "How the Intention to Share Can Undermine Enjoyment: Photo-Taking Goals and Evaluation of Experiences," *Journal of Consumer Research*, 44 (6), 1220–37.

Buechel, Eva C. and Jonah Berger (2018), "Microblogging and the Value of Undirected Communication," *Journal of Consumer Psychology*, 28 (1), 40–55.

Herhold, Kristen (2018), "How People Use Social Media in 2018," *The Manifest*, https://themanifest.com/social-media/how-people-use-social-media-2018 (Retrieved at January 2, 2019).

Kuss, Daria J. and Mark D. Griffiths (2011), "Online Social Networking and Addiction—A Review of the Psychological Literature," *International Journal of Environmental Research and Public Health*, 8 (9), 3528–52.

Toubia, Olivier and Andrew T. Stephen (2013), "Intrinsic vs. Image-Related Utility in Social Media: Why Do People Contribute Content to Twitter?," *Marketing Science*, 32 (3), 368–92.

Wilcox, Keith and Andrew T. Stephen (2013), "Are Close Friends the Enemy? Online Social Networks, Self-Esteem, and Self-Control," *Journal of Consumer Research*, 40 (1), 90–103.

I Care About Why You Share: Inferences about Sharing Motives Influence Observers' Engagement in Similar Experiences

Bronner, Fred and Robert de Hoog (2018), "Conspicuous Consumption and the Rising Importance of Experiential Purchases," *International Journal of Market Research*, 60 (1), 88-103.

Kim, Youngseon, (2018), "Power Moderates the Impact of Desire for Exclusivity on Luxury Experiential Consumption," *Psychology & Marketing*, 35 (4), 283-93.

Van Boven, Leaf, Margaret C. Campbell, and Thomas Gilovich (2010), "Stigmatizing Materialism: On Stereotypes and Impressions of Materialistic and Experiential Pursuits," *Personality and Social Psychology Bulletin*, 36 (4), 551-63.

Wild, T. Cameron and Michael E. Enzle (2002), "Social Contagion of Motivational Orientations," *Handbook of Self-Determination,* eds. Edward L. Deci and Richard M. Ryan, University of Rochester Press: Rochester, New York.

Wild, T. Cameron, Michael E. Enzle, Glen Nix, and Edward L. Deci (1997), "Perceiving Others as Intrinsically or Extrinsically Motivated: Effects on Expectancy Formation and Task Engagement," *Personality and Social Psychology Bulletin,* 23 (8), 837-848.

The Time-Dependent Effects on Bragging

Baumeister, R. F. (1982). A self-presentational view of social phenomena. *Psychological Bulletin*, *91*(1), 3.

Berman, J. Z., Levine, E. E., Barasch, A., & Small, D. A. (2015). The Braggart's dilemma: On the social rewards and penalties of advertising prosocial behavior. *Journal of Marketing Research*, *52*(1), 90-104.

Matley, D. (2018a). "This is NOT a# humblebrag, this is just a# brag": The pragmatics of self-praise, hashtags and politeness in Instagram posts. *Discourse, context & media*, *22*, 30-38.

Matley, D. (2018b). "Let's see how many of you mother fuckers unfollow me for this": The pragmatic function of the hashtag# sorrynotsorry in non-apologetic Instagram posts. *Journal of Pragmatics*, *133*, 66-78.

Speer, S. A. (2012). The interactional organization of self-praise: Epistemics, preference organization, and implications for identity research. *Social Psychology Quarterly*, *75*(1), 52-79.

Tal-Or, N. (2010). Bragging in the right context: Impressions formed of self-promoters who create a context for their boasts. *Social Influence*, *5*(1), 23-39.

Weingarten, E., & Berger, J. (2017). Fired up for the future: How time shapes sharing. *Journal of Consumer Research*, *44*(2), 432-447.

The Role of Social Media-Induced FOMO in Strengthening Brand Communities

Rifkin, J. R., Chan, C., & Kahn, B. E. (2020). FOMO: How the Fear of Missing Out Leads Missing Out. Working paper.

Tannenbaum, M. B., Hepler, J., Zimmerman, R. S., Saul, L., Jacobs, S., Wilson, K., & Albarracín, D. (2015). Appealing to fear: A meta-analysis of fear appeal effectiveness and theories. *Psychological Bulletin, 141*(6), 1178–1204.

Wei, M., Russell, D. W., Mallinckrodt, B., & Vogel, D. L. (2007). The experiences in close relationship scale (ECR)-short form: Reliability, validity, and factor structure. *Journal of Personality Assessment*, 88(2), 187-204.

New Insights from Computational Models of Cognition in Consumer Research

Chair: Rory M. Waisman, University of Alberta, Canada

Paper #1: Insights From a Process Model of Retrospective Evaluation

Rory M. Waisman, University of Alberta, Canada

Paper #2: What I Like Is What I Remember: Memory Modulation in Preferential Choice

Ada Aka, University of Pennsylvania, USA
Sudeep Bhatia, University of Pennsylvania, USA

Paper #3: Packaging vs. Product: Distinguishing Between Choice Domains with Computational Modeling

Stephanie M. Smith, University of California Los Angeles, USA
Ian Krajbich, The Ohio State University, USA

Paper #4: Structural Dependencies in Computational Models of Cognition in Consumer Research

Antonia Krefeld-Schwalb, Columbia University, USA
Thorsten Pachur, Max Planck Institute for Human Development, Germany
Benjamin Scheibehenne, University of Geneva, Switzerland

SESSION OVERVIEW

This session showcases how computational models of cognition can be leveraged to offer new insights for consumer research. Marketing scholars have been calling for greater cross-pollination between theory-rich cognitive science and the more pragmatically oriented field of consumer research (e.g., Bartels and Johnson 2015; Weber and Johnson 2006). This call is being increasingly answered in the cognitive and psychology literature (e.g., Bhatia and Mullett 2016; Bhatia and Pleskac 2019; Trueblood, Brown, and Heathcote 2014; Trueblood, Brown, Heathcote, and Busemeyer 2013), allowing cognitive science to profit from validating models and theories in more realistic consumer settings (e.g., Vinson, Dale, and Jones 2019). But there has been less advancement along these lines in the field of consumer research. In fact, this call was echoed again last year during a Knowledge Forum on Models of Behavioral Decision Making held at the 50th ACR Conference. Participants appealed for greater openness to incorporating modeling approaches from different disciplines, and some argued that consumer research can benefit by the application of theory and methods from cognitive psychology. This session aims to answer the call by presenting four papers that apply computational models of cognition to better understand the mechanism that underlie consumers' evaluations of products and experiences and their construction of preferences.

The first paper introduces a process model of basic encoding, retrieval, and evaluative mechanisms that account for the behavior of consumers when they rely on memory to evaluate their consumption experiences. The author uses model simulations to derive novel hypotheses about variables that alter consumers' retrospective evaluations. In the second paper, a computational model of language representation is utilized to help identify commonalities and isolate key differences between the cognitive processes employed in pure-memory tasks and those employed in making preferential choices that rely on memory. The key insight is that choice modulates memory, altering the prioritization of retrieval to favor preference- and behavior-relevant items. The authors of the third paper use machine learning and a computational model of attention in decision making to show that preferences are influenced by attention to different degrees depending on whether choices are stimulus-based vs. men-

tal representation-based and are considered subjective decisions vs. objective judgments. Finally, the last paper offers a cautionary note about how best to apply computational models of cognition in consumer research. The authors show that estimation and interpretation of free model parameters is hampered under certain modeling conditions, and they offer solutions to help researchers overcome these challenges and avoid deriving spurious insights from computational models of cognition.

The papers in this session offer concrete examples of how models and methods developed in cognitive science can be fruitfully applied in consumer research to deepen our understanding of consumer behavior phenomena. This session will appeal to scholars interested in preference construction, decision making, cognitive processes (attention and memory in particular), as well as those with an interest in the application of modeling methods in consumer research.

Insights From a Process Model of Retrospective Evaluation

EXTENDED ABSTRACT

Consumers' evaluations of consumption experiences are important to researchers, firms, and consumers themselves. Scholars depend on retrospective self-reports (e.g. Heitmann, Lehmann, and Herrmann 2007), firms treat customer ratings as metrics of success (Keiningham, Cooil, Andreassen, and Aksoy 2007; Reichhel, 2003), and consumers rely upon their own (Moore 2011) and others' (Nielse, 2015) evaluations as a basis for consumption decisions (Babić Rosario, Sotgiu, De Valck, and Bijmolt 2016). Research has revealed innumerable variables that influence retrospective evaluation, but more limited progress is evident in understanding the basic cognitive mechanisms responsible. Weber and Johnson (2006) called for explicit exposition of the memory processes involved in preferences construction. I respond with a process model of retrospective evaluation: Minerva Evaluative Memory (Minerva-EM).

Comparison of model predictions to empirical results suggests the model's instance encoding, resonance-based retrieval, and evaluative mechanisms explain consumers' evaluative behavior. Derivation from the model of novel, empirically testable hypotheses demonstrates the value of applying computational models of cognition in consumer research.

Inspired by Hintzman's (1984) Minerva-2 memory model, Minerva-EM is a precise mathematical account of memory and evaluative mechanisms. According to Minerva-EM, memory is single system for encoding and storage of episodic memory traces, and retrieval operates by principles of resonance. In the computational instantiation of the theory, memory is a matrix with each trace constituting one vector. An experience is encoded as a series of traces for constituent events. Retrospective evaluation involves probing memory to retrieve a representation matching the specified context. This produces an effect analogous to singing into a piano. The strings of the piano (the traces) resonate (are activated) in response to the singer's voice (the probe). In effect, the piano (memory) produces an echo, with each string (trace) contributing in proportion to its match to the incoming sound (probe). The echo produced at retrieval is an imperfect representation of the target experience because traces from other experiences also contribute to the echo. Evaluation proceeds by comparison of the target evaluative dimension to the corresponding features of the retrieved representation.

I tested the model against empirical data in simulations of *the rating effect*—the effect of explicitly evaluating an experience on retrospective evaluation of that experience (Ibrahim, Häubl, and Waisman, Working Paper). Ibrahim et al. had participants watch an enjoyable time-lapse video and then either rate their enjoyment of it (rating condition), briefly describe the first and last scenes (recall condition), or go on with their day (control condition). One, three, or seven days later participants reported their enjoyment of the video. After one day no difference in retrospective evaluation was apparent across conditions. After three days, participants in the rating condition reported having enjoyed the video marginally more than those in the control condition, with the recall condition in between. The same pattern emerged as significant after seven days. To simulate the rating effect in Minerva-EM the probes and echoes produced via initial rating or recall tasks were encoded as events. Three time intervals were simulated by adding 1000, 5000, or 10000 random traces to memory, and 10000 participants were simulated per condition. Consistent with the empirical results, the evaluative response (echo intensity) was greatest in the rating condition, with the recall condition in the middle, and the difference increased as more events intervened. In another experiment, Ibrahim et al. tested if previously rating an experience increases enjoyment regardless of experience valence. Participants in rating and control conditions watched an unenjoyable history video and seven days later reported how enjoyable it was. Again, simulation results correspond well with the empirical data. Simulated and experimental participants evaluated the experience as less enjoyable if they previously rated the video.

I derived novel hypotheses for future investigation from a parametric analysis across 81 simulation conditions. For instance, the model predicts that a request to rate a dining experience will influence retrospective evaluation to a greater extent when the experience involves grabbing a snack in a familiar fast-food outlet compared to a more involved and lengthy experience such as eating dinner at a new fine dining establishment. Correspondence of simulation and empirical results indicates that the mechanisms described by Minerva-EM account for the rating effect and suggest the model captures basic processes responsible for retrospective evaluation more generally.

This work makes three important contributions. First, the model extends a classic theory of memory (Hintzman 1984) to offer a unifying framework for our understanding of the behavior of consumers when they rely on memory to evaluate consumption experiences. Second, simulation in Minerva-EM can benefit marketers seeking to understand when soliciting consumer feedback is advantageous. Third, I demonstrate that cognitive computational modeling offers a useful and fruitful strategy for investigating and understanding consumer behavior.

What I Like Is What I Remember: Memory Modulation in Preferential Choice

EXTENDED ABSTRACT

Imagine meeting your new next-door neighbor for an afternoon tea. First, try to remember all of the restaurants in your neighborhood to give her a list of available options. Now try to remember these restaurants with the explicit goal of choosing where to go for dinner. It is clear that your choice depends fundamentally on memory: A restaurant cannot be selected unless it is successfully recalled. But what is less clear is how the choice task (the goal of selecting somewhere to eat) modulates memory. How do memory processes during preferential decision making compare with memory processes that guide recall when individuals do not have to make a choice?

Most choices that we make on a day-to-day basis are memory-based, with consideration sets and choice items being retrieved from memory at the time of decision. A large body of work has established the importance of memory for many different decisions (e.g., Dick, Chakravarti, and Biehal 1990; Hertwig, Barron, Weber, and Erev 2004; Lynch, Marmorstein, and Weigold 1988; Murty, FeldmanHall, Hunter, Phelps, and Davachi 2016). While previous work in the field of cognitive psychology has established regularities in memory processes and highlighted the importance of value-based recall using free recall list-learning paradigms, memory processes in choice behavior have not been examined in a similar manner (Klein, Addis, and Kahana 2005; Castel 2007). Thus, we do not know the degree to which memory processes at play in pure-memory tasks influence memory-based choice, and if memory-based choice involves a unique set of decision-specific memory mechanisms.

The order in which people recall items in pure-memory tasks is sensitive to primacy and recency effects (higher likelihood of remembering words that appear at the beginning and end of lists) and temporal and semantic clustering (tendency to make recall transitions among temporally-close and semantically-related items) (Kahana and Miller 2013). Some of these effects have also been shown in memory-based choice. For example, brand memories display serial position effects (e.g., Li 2010; Sherrick et al. 2016), and items recalled in everyday choice are semantically clustered (Hutchinson 1994; Bhatia 2019). That said, thus far, researchers have examined pure-memory and memory-based choice in isolation, and have not systematically compared memory-based choice with pure-memory in list-learning settings. We provide such a systematic comparison.

We first investigated the domain of food choice (Study 1). In the subsequent study (Study 2), we extended our tests into the social decision domain, namely gift choices. In both of our pre-registered studies, we adopted a list learning paradigm from the episodic memory literature. More specifically, we asked our participants to study a list of 25 items (food items or gift items, in Study 1 and 2, respectively), and manipulated the recall task across our participants. We randomly asked half of our participants to recall as many items as they could from the just-presented list (pure-memory condition). The other half of the participants deliberated through the items and recalled them during a decision making task with the ultimate goal of making a choice (choice condition).

By analyzing the particular sequence of presented and recalled items of each participant, we were able to identify memory processes that underlie pure-memory and choice behavior tasks and compare them based on the particular task participants were engaged in. Our results showed that traditional memory regularities such as the primacy effect, as well as semantic and temporal clustering, appear in both pure-memory and decision making situations. That said, we found a stronger influence of temporal clustering in pure-memory than in choice. Additionally, preferences and frequency of consumption have a bigger effect in choice, with participants being more likely to recall items they like or items they have consumed previously. Computational models fit to participant data provided converging support for our results.

Our results suggest a substantial overlap in the memory processes used in pure-memory settings and in choice. However, these processes are not identical. Choice involves the modulation of memory to prioritize the retrieval of decision-relevant items, such as items that are highly desirable. One result of this is that other memory effects, such as temporal clustering, weaken. Ultimately, our experiments showcase a novel experimental paradigm for studying memory in decision making. This paradigm is able to connect decision making with established memory-theories in cognitive psychol-

ogy. Future work should build on these connections, so as to better characterize the domain-general and domain-specific memory mechanisms at play in choice, and to better understand the ways in which memory can be intervened on to influence and improve choice.

Packaging vs. Product: Distinguishing Between Choice Domains With Computational Modeling

EXTENDED ABSTRACT

When people shop, they are undoubtedly influenced by both the products' packaging and their mental representations of the products inside the packaging. Therefore, it is important to understand how people make decisions based on both types of information. Although choosing based on the packaging and choosing based on the product inside the packaging are clearly different decisions, they may have similar underlying mechanisms. For instance, past research has uncovered a consistent effect of visual attention in many different types of choices; specifically, more attention to an option leads to an increased likelihood of choosing that option. This link applies to choices in many domains, including consumer goods (Krajbich et al. 2012), monetary gambles (Stewart, Hermens, and Matthews 2015), and even complex decision environments, like moral dilemmas (Pärnamets et al. 2015). This attention-choice link also extends to perceptual judgments, such as choosing the option that more closely resembles a target stimulus (Tavares, Perona, and Rangel 2017).

However, past research (Polanía et al. 2014) has also demonstrated, using neural (EEG) data, that there may be differences in the decision-making process between preference-based choices (e.g. choosing which food to eat) and perceptual judgments (e.g. deciding which image is larger). However, in our initial example, choosing an item based on its packaging is both a perceptual- and preference-based task. Accordingly, we argue that the separation of perceptual judgments and preference-based choices in the literature thus far has been conflated with the separation of stimulus-based decisions (e.g. choosing which image is larger, based on the image itself) vs. decisions about the object represented by the stimulus (e.g. choosing which food to eat, based on pictures representing the foods). Therefore, it has not been possible to determine if the differences observed between perceptual- and preference-based choices are truly due to the perceptual/preference categorization or instead due to the stimulus/representation split.

Here, we present an alternative way to categorize decisions, based on two independent dimensions: (1) subjective vs. objective and (2) stimulus vs. representation. In this project, we cross these dimensions and investigate the decision-making process in the four resulting categories, using the same stimulus set: food images. Specifically, subjects (N = 42) first gave incentivized ratings for each of the 100 food images in each of the four categories: taste (subjective; representation), weight (objective; representation), attractiveness of the package (subjective; stimulus), and size of the image (objective; stimulus). Then, subjects made 100 incentivized, eye-tracked, binary choices in each of the four categories.

Overall, we find remarkable similarity between the tasks. In line with past research, subjects chose in line with their subjective ratings (i.e. their preferences or perceptions, depending on the task). They also tended to choose the option they looked at more; looking at one option for a half-second longer translates to choosing the more looked-at option ~70% of the time. Subjects also tended to choose the option they looked at last; when subjects were indifferent between the options, they chose the last looked-at option ~70% of the time. However, there were also some divisions between the tasks. For instance, although subjects did not spend more time looking at things they rated more highly, they did spend longer, on average, looking at heavier foods and looking at food images that take up more of the screen.

In order to identify the strongest connections (and thus, separations) between the tasks, we use a combination of subject-level modeling and machine learning. First, we draw on the attentional drift diffusion model (Krajbich et al. 2010)—a computational model of decision making—to characterize the degree to which attention moderates the choice process. We estimate subject-level effects in each task and then examine inter-task correlations (or lack thereof). We find the strongest positive correlations (1) between the two stimulus-based tasks (i.e. image size and package preference) and (2) between the two representation-based tasks (i.e. taste and weight), while the rest of the inter-task correlations were much smaller in magnitude (or even negative). This provides some evidence that subjects' stimulus-based decision processes and mental representation-based decision processes are similar (regardless of whether the decision is objective or subjective in nature), specifically with regard to the link between attention and choice.

In a separate set of analyses, we combine ~30 machine learning classification methods to estimate inter-task (dis)similarity. These machine learning models utilize a wide variety of decision process measures (spanning choice, response time, and attention-based metrics) from the odd-numbered trials to learn patterns in the data. Then, the models use these learned patterns to try to accurately classify the even-numbered trials into the appropriate category. We use pairwise classification accuracy rates as an index of dissimilarity, since the most dissimilar tasks should be the easiest to classify correctly. (On the other hand, the most similar tasks should have the lowest classification accuracy.) The machine learning models are most accurate at distinguishing between the taste and size tasks (in line with Polanía et al. 2014), and the models are least accurate at distinguishing between the representation-based tasks (i.e. taste and weight). Overall, the machine learning results (in combination with the drift diffusion approach described above) imply greater similarity in the decision process within the stimulus/representation categories than within the subjective/objective categories.

In this study, we investigate the separation of perceptual- and preference-based decisions suggested in the literature and demonstrate that a more important distinction is the presentation of the choice (i.e. whether the decision is about the stimulus itself or about a mental representation of the stimulus), rather than in the nature of the choice (i.e. whether it is based on objective or subjective criteria). Therefore, there seems to be greater similarity in the decision process among choices about which food is tastier or heavier (i.e. the representation-based tasks) than there is among choices based on taste or packaging (i.e. the preference-based tasks). Ultimately, this study provides us with evidence that (1) although attention plays a large role across several different choice domains, (2) the choice processes for products and packages are decidedly distinct.

Structural Dependencies in Computational Models of Cognition in Consumer Research

EXTENDED ABSTRACT

One of the major purposes of cognitive modeling in consumer research is measuring latent traits. This procedure is sometimes referred to as "cognitive psychometrics" (Batchelder and Riefer 1999; Riefer, Knapp, Batchelder, Bamber, and Manifold 2002). Despite a model's fit and even despite a model's predictive accuracy out-of-sample, however, the model's parameters might still not be correct operationalizations of the underlying latent traits. Instead, the model

as-a-whole can be a very good proxy for the entire cognitive process, while the individual parameter estimates do not represent the suggested latent traits. An overconfidence in interpreting the parameters of cognitive models is often addressed with the famous quotation: "All models are wrong, but some are useful" (Box 1979). This idea emphasizes that cognitive models remain nonetheless statistical models, being proxies of cognitive processes. Researchers should be cautious when interpreting the model parameters, and even more so if the necessary pre-condition to measuring latent traits is not fulfilled—that is, the independent and reliable estimation of model parameters.

Unfortunately, in several cognitive models that are commonly used in consumer research, parameters are indeed structurally dependent. One particular set of models that is commonly applied in consumer research is subject to very strong parameter intercorrelations. These models assume that behavior can be regarded as a probabilistic choice among alternatives. The alternatives are assigned subjective values. Free parameters in the model govern non-linear functions assigning the subjective values to the alternatives, and other parameters govern probabilistic choice functions, such as a logistic choice function to map the subjective values to the choices. This structure can be found in risky choice models, temporal discounting models or categorization models, to name but a few models that are relevant to consumer research. In these models, parameters that determine the subjective value function also scale the input values, while the response noise parameters in the choice function scale the subjective values to map them to the probability scale. As a consequence, the response noise parameter is dependent not only on the scale introduced by the other parameter, it depends on the parameter itself that is governing the function. The dependency between the parameters leads to strongly correlated parameter estimates as for instance in Cumulative Prospect Theory, CPT (Tversky and Kahneman 1992), Generalized Context Model, GCM (Nosofsky 1986) and the SIMPLE model of free recall (Brown, Neath, and Chater 2007).

In order to illustrate the negative consequences of the correlations, we implemented a *generic choice model* consisting of a power subjective value function with curvature parameter, and a logistic choice function with response noise parameter. By means of simulation and parameter-recovery studies, we show that the correlation between parameters not only decreases the accuracy of parameter estimation, it systematically distorts parameter estimation. We illustrate that inference on the correlation of the parameters with external variables as well as inferences on group differences on the individual parameters are distorted by the correlated parameters.

We then make several proposals for implementation in the concerned models to reduce the dependency of the parameters and thus the negative consequences resulting from the correlation. Those proposals either focus on applying different ways of rescaling the input of the probabilistic choice function, to cut the dependency between parameters, or they replace the individual response noise parameter with a different type of individual error parameter. The latter approach seemed to be most effective. We tested two alternative error models: adding a trembling hand error while fixing the response noise parameter to one and adding stochasticity to the correlated model parameter while likewise fixing the response noise parameter to one. Here, instead of assuming that every individual had one individual parameter, the model assumes that every individual has a distribution of parameters with an individual mean and an individual variance. The variance of the parameter distribution determines the individual stochasticity. In the simulation and parameter-recovery studies, we found that this proposal reduced the correlation and the negative consequences enormously. Implementing it in CPT not only

reduced the parameter correlations, it greatly increased the model's fit to the empirical data.

Adding stochasticity to parameters has been proposed elsewhere as a better approach for risk (Blavatskyy and Pogrebna 2010) as well as temporal discounting data (Apesteguia and Ballester 2018). Our results dovetail with these findings. Following this line of reasoning, adding stochasticity to model parameters may be tested as a better-suited approach to cover the type of noise observed in choice data, in general.

Two major suggestions that are relevant for the application of cognitive models in consumer research can be inferred from these results. First, we suggest that the different model selection criteria should be weighted differently considering the purpose of the cognitive model. Evaluating a model and comparing it with competitors can lead to different results, depending on which model selection criterion is the focus. For instance, a model's fit and out-of-sample prediction are most important if the main purpose lies in predicting behavior across similar tasks. Independent parameter estimation, parameter recovery and parameter correlations with neuronal or process data are important if the researcher aims to measure the underlying cognitive process or latent traits, and if the researcher aims to generalize predictions across tasks and domains. If the goal of the cognitive model lies in measuring latent traits that can subsequently be used for follow-up analyses, it must be guaranteed that the corresponding model parameters are estimated independently, in order to make valid inferences on the parameters. Second, we suggest consumer researchers to conduct a parameter-recovery study. Every introduction of a new cognitive model to measure latent traits or individual differences should be accompanied by a parameter-recovery study to prove that parameter estimation is reliable. If the subsequent application of the cognitive model also involves the calculation of correlations of the model parameters with external variables or the calculation of group difference on the parameters, the parameter-recovery study should prove that group differences and correlations with external variables can be reliably recovered.

REFERENCES

Apesteguia, Jose and Miguel A. Ballester (2018), "Monotone stochastic choice models: The case of risk and time preferences," *Journal of Political Economy*, 126 (1), 74–106.

Babić Rosario, Ana, Francesca Sotgiu, Kristine De Valck, and Tammo HA Bijmolt (2016), "The effect of electronic word of mouth on sales: A meta-analytic review of platform, product, and metric factors," *Journal of Marketing Research*, 53 (3), 297–318.

Bartels, Daniel M. and Eric J. Johnson (2015), "Connecting cognition and consumer choice," *Cognition*, 135, 47-51.

Batchelder, William H. and David M. Riefer (1999), "Theoretical and empirical review of multinomial process tree modeling," *Psychonomic Bulletin & Review*, 6 (1), 57–86.

Bhatia, Sudeep (2019), "Semantic processes in preferential decision making," *Journal of Experimental Psychology: Learning, Memory, and Cognition*, 45 (4), 627.

Bhatia, Sudeep and Timothy J. Pleskac (2019), "Preference accumulation as a process model of desirability ratings," *Cognitive Psychology*, 109, 47-67.

Bhatia, Sudeep and Timothy L. Mullett (2016), "The dynamics of deferred decision," *Cognitive Psychology*, 86, 112-51.

Blavatskyy, Pavlo R. and Ganna Pogrebna (2010), "Models of stochastic choice and decision theories: why both are important for analyzing decisions," *Journal of Applied Econometrics*, 25 (6), 963–86.

Box, George E. P. (1979), "Robustness in the strategy of scientific model building," *Robustness in Statistics*. ACADEMIC PRESS, INC.

Brown, Gordon DA, Ian Neath, and Nick Chater (2007) , "A temporal ratio model of memory," *Psychological Review*, 114 (3), 539–76.

Castel, Alan D. (2007), "The adaptive and strategic use of memory by older adults: Evaluative processing and value-directed remembering," *Psychology of Learning and Motivation*, 48, 225–70.

Dardis, Frank E., Mike Schmierbach, Brett Sherrick, Frank Waddell, Jose Aviles, Sushma Kumble, and Erica Bailey (2016), "Adver-Where? Comparing the Effectiveness of Banner Ads and Video Ads in Online Video Games," *Journal of Interactive Advertising*, 16 (2), 87–100.

Dick, Alan, Dipankar Chakravarti, and Gabriel Biehal (1990), "Memory-based Inferences During Consumer Choice," *Journal of Consumer Research*, 17 (1), 82-93.

Fredrickson, Barbara L. (2000), "Extracting meaning from past affective experiences: The importance of peaks, ends, and specific emotions," *Cognition and Emotion*, 14 (4), 577–606.

Heitmann, Mark, Donald R. Lehmann, and Andreas Herrmann (2007), "Choice goal attainment and decision and consumption satisfaction," *Journal of Marketing Research*, 44 (2), 234–50.

Hertwig, Ralph, Greg Barron, Elke U. Weber, and Ido Erev (2004), "Decisions from experience and the effect of rare events in risky choice," *Psychological Science, 15,* 534–39.

Hintzman, Douglas L. (1984), "MINERVA 2: A simulation model of human memory," *Behavior Research Methods, Instruments and Computers,* 16 (2), 96–101.

Hutchinson, J. Wesley, Kalyan Raman, and Murali K. Mantrala (1994), "Finding choice alternatives in memory: Probability models of brand name recall," *Journal of Marketing Research*, 31 (4), 441–61.

Ibrahim, Nahid, Gerald Häubl, and Rory M. Waisman (Working Paper), "Good gets better, bad gets worse: The polarizing effect of rating a consumption experience."

Kahana, Michael J., and Jonathan F. Miller (2013), "Memory, recall dynamics," *Encyclopedia of the Mind. Thousand Oaks, CA SAGE Publications Inc.*

Keiningham, Timothy L., Bruce Cooil, Tor Wallin Andreassen, and Lerzan Aksoy (2007), "A longitudinal examination of net promoter and firm revenue growth," Journal of Marketing, 71 (3), 39–51.

Klein, Krystal A., Kelly M. Addis, and Michael J. Kahana (2005), "A comparative analysis of serial and free recall," *Memory and Cognition*, 33 (5), 833–39.

Krajbich, Ian, Carrie Armel, and Antonio Rangel (2010), "Visual fixations and the computation and comparison of value in simple choice," Nature Neuroscience, 13 (10), 1292–98.

Krajbich, Ian, Dingchao Lu, Colin Camerer, and Antonio Rangel (2012), "The attentional drift-diffusion model extends to simple purchasing decisions," *Frontiers in Psychology*, 3. Pärnamets, P., Johansson, P., Hall, L., Balkenius, C., Spivey, M. J., and Richardson, D. C. (2015). Biasing moral decisions by exploiting the dynamics of eye gaze. *Proceedings of the National Academy of Sciences*, 112 (13), 4170–75.

Li, Cong (2010), "Primacy effect or recency effect? A long-term memory test of Super Bowl commercials," *Journal of Consumer Behaviour: An International Research Review*, 9 (1), 32–44.

Lynch Jr, John G., Howard Marmorstein, and Michael F. Weigold (1988), "Choices From Sets Including Remembered Brands: Use of Recalled Attributes and Prior Overall Evaluations," *Journal of Consumer Research*, 15 (2), 169-84.

Moore, Sarah G. (2011), "Some things are better left unsaid: How word of mouth influences the storyteller," *Journal of Consumer Research*, *38*(6), 1140-54.

Morwitz, Vicki G., and Gavan J. Fitzsimons (2004), "The mere-measurement effect: Why does measuring intentions change actual behavior?" *Journal of Consumer Psychology*, 14 (1–2), 64-74.

Murty, Vishnu P., Oriel FeldmanHall, Lindsay E. Hunter, Elizabeth A. Phelps, and Lila Davachi (2016), "Episodic memories predict adaptive value-based decision-making," *Journal of Experimental Psychology: General*, 145 (5), 548.

Nielson, A. C. (2015), "Global trust in advertising," *NY: USA, Nielsen Media Research, ACNielsen. Retrieved from* http://www.nielsen.com/us/en/insights/reports/2015/global-trust-in-advertising-2015.html.

Nosofsky, Robert M. (1986) , "Attention, Similarity, and the Identification-Categorization Relationship," *Journal of Experimental Psychology: General*, 115 (1), 39–57.

Polanía, Rafael, Ian Krajbich, Marcus Grueschow, and Christian C. Ruff (2014), "Neural oscillations and synchronization differentially support evidence accumulation in perceptual and value-based decision making," *Neuron*, 82 (3), 709–720.

Reichheld, Frederick F. (2003), "The one number you need to grow," *Harvard business review*, 81 (12), 46–55.

Riefer, David M., Bethany R. Knapp, William H. Batchelder, Donald Bamber, and Victor Manifold (2002), "Cognitive psychometrics: Assessing storage and retrieval deficits in special populations with multinomial processing tree models," *Psychological Assessment*, 14 (2), 184–201.

Stewart, Neil, Frouke Hermens, and William J. Matthews (2015), "Eye movements in risky choice," *Journal of Behavioral Decision Making*, *29*(2-3), 116-136.

Tavares, Gabriela, Pietro Perona, and Antonio Rangel (2017), "The attentional drift diffusion model of simple perceptual decision-making," *Frontiers in Neuroscience*, 11, 468.

Trueblood, Jennifer S., Scott D. Brown, and Andrew Heathcote (2014), "The multiattribute linear ballistic accumulator model of context effects in multialternative choice," *Psychological Review*, 121 (2), 179.

Trueblood, Jennifer S., Scott D. Brown, Andrew Heathcote, and Jerome R. Busemeyer (2013), "Not just for consumers: Context effects are fundamental to decision making," *Psychological Science*, 24 (6), 901-908.

Tversky, Amos and Daniel Kahneman (1992) , "Advances in Prospect-Theory - Cumulative Representation of Uncertainty," *Journal of Risk and Uncertainty*, *5*(4), 297–323.

Vinson, David W., Rick Dale, and Michael N. Jones (2019), "Decision contamination in the wild: Sequential dependencies in online review ratings," *Behavior research Methods*, 51 (4), 1477-1484.

Weber, Elke U., and Eric J. Johnson (2006), "Constructing preferences from memory," In: Lichtenstein, S., and Slovic, P. (Eds.). *The Construction of Preference*. Cambridge University Press.

The Social, Psychological and Behavioral Consequences of Being Poor

Chair: Yuechen Wu, Johns Hopkins University, USA

Paper #1: Resource Sharing in the Sharing Economy: Low Childhood Socioeconomic Status as a Barrier

Yuechen Wu, Johns Hopkins University, USA
Meng Zhu, Johns Hopkins University, USA

Paper #2: Effects of Childhood Socioeconomic Status on Product Retention and Disposal Behavior in Adulthood

Lisa Park, Georgetown University, USA
Rebecca Hamilton, Georgetown University, USA

Paper #3: Are Rich/Educated Consumers less Ethical and Prosocial? Two Direct, Preregistered Replications of Piff et al.'s (2012) Field Studies

Minah Jung, New York University, USA
Joachim Vosgerau, Bocconi University, Italy
Paul Smeets, Maastricht University, The Netherlands
Jan Stoop, Erasmus University, The Netherlands

Paper #4: Impossible Expectations for the Poor

Anuj K. Shah, University of Chicago, USA

SESSION OVERIVEW

Although abundance has emerged as the norm in modern industrialized societies, resource distribution inequality and scarcity remains prevalent across the globe (Roux, Goldsmith and Bonezzi 2015). According to the World Bank, in 2015 about 10 percent of the world population lived on less than $1.90 per day. Even within developed economies like the United States, approximately 38.1 million people lived in poverty in 2018, and more than 25% of children (20.1 million) live in households where no parent has secure employment (Kids Count Data Book 2019). Despite the accumulating interest in topics regarding poverty and scarcity, many questions still need to be answered regarding the consequences of being poor. For example, how are consumption behaviors shaped by the experience of being poor? Does low socioeconomic status make a consumer more selfish? Are there social penalties to being poor?

This session sheds light on these questions; four papers examine the behavioral, psychological, and social consequences of being poor. **Wu and Zhu** investigate whether socioeconomic status influences consumers' participation in the sharing economy as service providers. They find that consumers growing up in a lower socioeconomic environment are less likely to share their own resources the sharing economy, controlling for current SES. Further, they show that greater territorial feelings over one's own possessions serve as a central mechanism driving this effect. Consistent with these territorial feelings, **Park and Hamilton** show that childhood SES influences consumer decision making related to product retention and disposal. Controlling for current SES, low childhood SES consumers are found to experience more negative emotions during disposal, report greater desire to retain products, and dispose of products less frequently than consumers with more abundant resources growing up.

The third and fourth papers examine social interactions and inferences. **Jung, Vosgerau, Smeets, and Stoop** investigate whether socioeconomic status predicts ethical behaviors. Contrary to prior findings suggesting that the poor behave more ethically compared to the rich (e.g., are less likely to cut-off others at intersections and cross-walks), they find no relationship between socioeconomic status and consumers' ethical behaviors. The last paper examines the social consequences of being poor. **Shah** finds that consumers can have inconsistent and even impossible expectations of the poor (e.g., they should do both an overnight work-shift and sleep), and, when the poor fail to meet these impossible expectations, they judge them as lazier and less competent than the rich.

Taken together, this session integrates new perspectives regarding the psychological, behavioral and social consequences of being poor. We believe that this session will appeal to a broad audience, including researchers interested in resource scarcity, socioeconomic status, poverty, the sharing economy, prosocial and ethical behaviors, and person perception.

Resource Sharing in the Sharing Economy: Low Childhood Socioeconomic Status as a Barrier

EXTENDED ABSTRACT

In the past decade, the sharing economy has blossomed across a range of domains such as lodging (e.g., Airbnb, HomeAway) and transportation (e.g., Lyft, Uber, Turo). While extant literature has systematically examined consumers' motivation to join the sharing economy on the demand side as users (Belk 2013; Lamberton and Rose 2012), it remains understudied what factors might impact consumers' willingness to share their own assets on the supply side.

In this paper, we examine one fundamental factor that could impact consumers' tendency of providing their own assets in the sharing economy: socioeconomic status (SES). Somewhat intuitively, current SES might positively impact a person's resource sharing behavior in the sharing-economy, as higher current SES consumers have more assets (e.g., rooms, cars, spare tools) that can be shared with others in the first place. However, it is unclear whether and how the socioeconomic environment one grew up in might exert an independent impact on consumers' willingness to share their resources in the sharing economy. Although current SES and childhood SES are correlated, a rich body of research in psychology and sociology has suggested that SES exposures during childhood, independent of adulthood, are predictive of individuals' preferences, decisions and behaviors in the adulthood, including reproductive timing, eating habits, and health outcomes (Amir et al. 2016; Cohen et al. 2010; Hill et al. 2016). In the present paper, we seek to isolate the effects of childhood SES on consumers' resource sharing decisions from the possible impact of current SES and resource availability.

We propose (and find) that lower childhood SES decreases consumers' willingness to share their own assets in the sharing economy. In particular, drawing from prior research characterizing different socioeconomic environments (Amir et al. 2016; Evans and Kim 2012; Evans and Cassells 2013; Kraus et al. 2011; Stamos, Altsitsiadis, and Dewitte 2019) and past work on territoriality (Brown, Lawrence, and Robinson 2005; Kirk, Peck, and Swain 2017), we argue that the psychological costs of sharing ownership can be higher for consumers growing up in a lower socioeconomic environment, as these consumers might have developed greater territorial feelings towards their own property. As a result of the greater territoriality, lower childhood SES consumers might be less likely to share their own assets in the sharing economy, an effect that goes above and beyond the effect of individuals' current socioeconomic status.

We conducted three preregistered studies as well as used a national-level field dataset to test the proposed effect and the underlying mechanism. Study 1 ($N = 204$) tested the effect in a peer-to-peer car-sharing domain using a real-behavioral dependent variable. Participants first described a car that they currently have, and read

about a short description about Turo, a car-sharing platform. We then asked participants to choose between reading two topics about Turo: an article about how to list cars on Turo, and a recent news article about Turo. Participants then indicated their childhood SES ("When you were growing up, what was your assessment of your family's social and economic status?"; Amir, Jordan and Rand 2018) and current SES (e.g., "I have enough money to buy things I want"; Hill et al. 2016) As predicted, controlling for current SES, individuals with lower childhood SES were significantly less likely to read the article about listing cars on Turo, implying decreased interests of resources sharing.

Study 2 (*N* = 201) explored the underlying mechanism. Participants read a scenario where they imagined that they had a spare room in their house, indicated their likelihood of listing their spare room on Airbnb, and explained in an open-ended question, why they made the decision. We coded the open-ended responses (Khan et al., 2011, Zhu et al. 2018) and found that people with lower SES growing up had stronger territorial feelings over their possessions, which mediated the effect of childhood SES on participating in sharing economy.

Study 3 (*N* = 594) provided further evidence for the territorial-feeling mechanism by directly manipulating participants' level of ownership toward the object. Participants described an object in their house that they purchased (control condition) or other people purchased (low ownership condition) and indicated their likelihood of listing this object on a community resource-sharing platform. We found that in the control condition, lower childhood SES participants were less likely to list their own possessions on the sharing-economy platforms, replicating prior findings. However, in the low ownership condition, the effect of childhood SES on likelihood to share own assets in the sharing economy was attenuated.

Study 4 (*N* = 57,155) employed a publicly available nation-level field dataset: China Family Panel Studies (2010). Our primary DV was whether participants had ever rented out a spare room in their house. We used maternal education attainment as a proxy for early-life socioeconomic stability (Duncan and Brooks-Gunn 1997) and coded individuals as high (vs. low) childhood SES if their mother had completed some formal education (vs. no formal education). We used propensity score matching method to control for confounding variables including the mother's year of birth, household current SES, house space, family size, participants' number of siblings, age, gender, marital status, education and job types. Replicating prior studies, individuals whose socioeconomic stability was high (vs. low) in their early life were more likely to rent out their spare room. Further, as a robustness check, we regressed participants' room-renting behaviors on childhood SES index (i.e., parents' completed schooling and occupational prestige), controlling for the covariate variables, and found similar results.

To conclude, the current research reveals that lower childhood SES can lead to decreased likelihood of sharing own resources the sharing economy, an effect for which greater territorial feelings over one's own possessions emerge as a central driver.

Effects of Childhood Socioeconomic Status on Product Retention and Disposal Behavior in Adulthood

EXTENDED ABSTRACT

Earlier research has demonstrated that socioeconomic status (SES) in childhood has enduring effects on consumers' attitudes towards products (Chaplin et al. 2014), their attitudes towards risk (Griskevicius et al. 2013), and their willingness to wait for products (Thompson, Hamilton and Banerji 2020). Childhood SES reflects the degree to which an individual grew up in a resource abundant versus resource scarce environment (Griskevicius et al. 2011). In our research, we explore the lasting effects of childhood SES on consumer retention and disposal habits. More specifically, when controlling for current SES, we predict that low childhood SES consumers will experience more negative emotion during disposal, report greater desire to retain products, and dispose of products less frequently than high childhood SES consumers.

Because childhood SES adjusts individuals' expectations and patterns of responses, it may be more predictive of adult behavior than current SES (Chen and Miller 2012; Griskevicius et al. 2011; Griskevicius and Kenrick 2013), especially combined with the impact of parental influence. In particular, early life conditions may program individuals to respond to future adversity in different ways. Although adults with different SES backgrounds may behave similarly in benign situations, they may behave very differently when facing threatening conditions. For example, in response to a threat, individuals of low childhood SES were found to be more impulsive, risk-taking, and suggestive to temptation compared to their high childhood SES counterparts (Griskevicius et al. 2011).

We propose that low childhood SES consumers may experience more negative emotion during disposal and greater reluctance to dispose of products than high childhood SES consumers due to early life experiences that encourage them to focus on self-preservation and resource preservation. In a sense, disposal of products contradicts the life history strategy they adopted as resource-scarce children. Notably, childhood SES may have distinct effects across stages of the consumer decision journey (Hamilton et al. 2019). For example, while low childhood SES seems to predict greater impulsiveness during initial choice (Griskevicius et al. 2011), it predicts greater patience after consumers make an initial choice and learn that their choice is not immediately available (Thompson, Hamilton and Banerji 2020). Although there is some evidence that low socioeconomic status consumers tend to repurpose consumption items (see Hill 2001; Rosa et al. 2012), there has not been a systematic examination of the effects of childhood SES on consumers' disposal and retention habits. Thus, we used a multi-method approach to examine the effects of childhood SES on consumers' disposal and retention habits and emotions experienced during disposal.

Our first step was to conduct 22 interviews with consumers to understand their disposal and retention habits, potential relationships between these habits, their current and childhood socioeconomic status and other demographic variables. We leveraged peer networks to recruit participants who varied in gender (10 male, 12 female), age (21-78), ethnicity (13 Caucasion, 7 Asian, 2 Hispanic), and both childhood and current SES. Overall, participants were more likely to self-categorize as "savers" than as "tossers," perhaps due to the social desirability of avoiding wastefulness. However, their descriptions of when and why they preferred to save items rather than dispose of them diverged substantially. Eight prominent themes emerged after analyzing all of the interviews: concerns about price paid for items, emotional attachment to items, clutter/space concerns, desire to re-purpose items, concern over having to replace products, childhood experiences, and the impact of parents on retention and disposal.

These interviews revealed that childhood experiences have a strong impact on post-purchasing habits, primarily through parental influence. Many interviewees admitted to emulating their parents' habits in adulthood. For example, those who observed frugal parents were more likely to be conscious of their disposal and retention habits than those who did not. Moreover, changes in childhood SES seemed to have a particularly strong effect. Participants who experienced financial shocks (e.g., immigrating to a new country, bankruptcy) during their childhood often experienced more nega-

tive emotions when disposing of products in adulthood than those who did not experience financial shocks. Changes in disposal and retention habits also coincided with changes in SES. Ultimately, one of the most critical determinants of retention and disposal habits in adulthood seemed to be how a consumer remembered his or her childhood SES rather than more objective measures of childhood income or parental education.

Next, we conducted confirmatory research to measure the relationship between childhood SES and retention and disposal habits in adulthood. Specifically, we developed items to capture each of the eight themes identified in our exploratory research, disposal and retention habits, and emotions experienced during disposal. We also included measures of both objective and subjective childhood SES and current SES. Two hundred twenty-eight consumers of varying ages, ethnicities, education and income levels were recruited to participate via Amazon MTurk. The results point to a significant relationship between childhood SES and retention and disposal habits in adulthood. Consumers with higher childhood SES reported more frequent disposal and different reasons for disposing of products. Specifically, high childhood SES consumers were more likely to dispose of products based on how they looked and dispose of unfinished products. The data also revealed that positive emotions when disposing, such as pride, strength and enthusiasm, were more closely correlated to high childhood SES than current SES. In contrast, low childhood SES consumers were more likely to report retaining items because they had paid a lot for them or holding onto them based on concern about needing them in the future.

In summary, both our exploratory and confirmatory research suggest that childhood SES has a lasting effect on consumer post-purchase behavior in adulthood. Consumers who reported lower subjective childhood SES are more reluctant to dispose of products than those who reported higher subjective childhood SES. Notably, consumers' memory of financial hardships during childhood seems to be a more important predictor than the accuracy of recall. Building on prior research linking childhood SES to adult choice and consumption behavior, our research suggests that experiences in the formative years of childhood have a particularly strong effect on adult habits related to retention and disposal of products.

Are Rich/Educated Consumers less Ethical and Prosocial? Two Direct, Preregistered Replications of Piff et al.'s (2012) Field Studies

EXTENDED ABSTRACT

Who behaves more miserly and unethically, the poor or the rich? Some psychologists maintain that it is the rich, or more specifically, citizens of high socioeconomic status (SES). It is argued that people of high SES are more independent and less socially attuned than the lower social classes, and thus feel less compassion towards others (Stellar et al. 2012). As a consequence, they are hypothesized to be more likely to engage in antisocial and unethical behaviors (Piff et al. 2010; Kraus et al. 2012). Consistent with this hypothesis, it has been shown that high SES individuals are less likely to give to charity and to help and trust others (Piff et al. 2010), and to be more likely to engage in selfish and unethical behaviors, such as taking candies from children, lying in job negotiations, cheating, pilfering, and outright stealing (Piff et al. 2010; Piff et a. 2012; Côté et al. 2013; Guinote et al. 2015; Dubois et al. 2015). Piff et al. (2012) conducted two field studies, which show that — compared to drivers of less luxurious cars — drivers of luxurious vehicles are more likely to cut off others at intersections and are less likely to yield right of way to pedestrians at crosswalks.

The Piff et al. (2012) paper, and particularly these two field studies, have been discussed extensively in the popular media (e.g., New York Times 2010, 2013, 2015, 2017; The Economist 2010; Business Insider 2012, 2015; BBC 2015; CNN 2018; NPR 2018; The Washington Post 2018) and in the academic literature (at the time of writing this proposal, the paper had over 825 Google Scholar citations).

Research in economics and sociology, in contrast, has hypothesized and found the opposite, a positive relationship between SES and prosocial/ethical behavior. From an economic point of view, social preferences such as caring about others' wellbeing and valuing ethical principles implicate substantial opportunity costs, costs that only those with sufficient resources can afford to bear (Trautmann et al. 2013). In line with this reasoning, individuals living in richer areas have been shown to be more likely than those from poorer areas to send back wrongly addressed letters containing cash (Andreoni, Nikiforakis, & Stoop 2017). Korndörfer et al. (2015), using the German Socio-Economic Panel (SOEP), the GSS, the American Consumer Expenditure Survey (CEX), and the International Social Survey Programme (ISSP), showed that—across 30 countries including the US—high SES individuals are more likely to make charitable donations and to contribute a higher percentage of their family income to charity, to be more helpful and likely to volunteer, and to be more trusting and trustworthy in an economic game when interacting with a stranger than low SES individuals.

We conducted two direct, highly-powered, and pre-registered replications of the two field studies in Piff et al. (2012).

Study 1 is a direct replication of field study 1 in Piff et al. (2012). We observed the behavior of drivers at the same four-way intersection in Berkeley, California, as in the original study. We aimed at collecting 2.5 times the original's study's sample size ($N_{original}$ = 274, $N_{replication}$ = 685). With a correlation of r = .12 between vehicle status and likelihood of cutting off as observed in the original study, the replication had 88% power to detect the effect at the 5% level (two-sided test). The training of the coders (research assistants), coding of vehicle status (1 = cars worth \$3,000 or less; 2 = \$3,001-\$10,000; 3 = \$10,001-\$25,000; 4 = \$25,001-\$40,000; 5 = cars worth more than \$40,000), age and gender of drivers, and position of the coders were the same as in the original study. Unlike in Piff et al.'s (2012) study 1, vehicle status and cutting-off as judged by the first team of coders were not correlated, r = .014, p = .71, nor were vehicle status and cutting-off as judged by the second team of coders, r = -.024, p = .53. Binary logistic regressions on the likelihood of cutting-off other vehicles, controlling for traffic density, time of day, and driver's age and sex, neither showed a relationship between vehicle status and likelihood of cutting-off (ps > 0.60).

Study 2 is a direct replication of field study 2 in Piff et al. (2012) at a crosswalk in Berkeley, California. Research assistants blind to the study hypothesis observed and coded the likelihood of drivers not yielding right of way to pedestrians at the crosswalk. The crosswalk on Bancroft Way at the intersection with Ellsworth in Berkeley was chosen rather than the crosswalk at the intersection of Bancroft Way and Dana Street used in the original study, because Paul Piff informed us that the original crosswalk now has pedestrian lights installed and is hence no longer suited for the study. We aimed at collecting 2.5 times the sample size of the original study (N = 152). The final dataset included 439 observations. Due to a data encoding error we lost 75 observations, leaving us with 364 complete records, 16 short of the 380 that we had pre-registered. With a correlation of r = .17 between vehicle status and likelihood of not yielding right of way to pedestrians as reported in Piff et al. (2012), study 2 had 91% power to detect the effect at the 5% level. Unlike in Piff et al.

(2012), vehicle status and likelihood of not yielding right of way to pedestrians did not correlate, $r = .004$, $p = .93$. Also, binary logistic regressions controlling for traffic, time of day, and driver's age and sex showed no relationship between vehicle status and likelihood of not yielding to pedestrians (lowest $p = .59$).

Impossible Expectations for the Poor

EXTENDED ABSTRACT

People often believe poor individuals should do various things to improve their lives (e.g., work longer hours, sell certain possessions). It is possible that these are just matters of opinion (about which people can agree or disagree). This paper asks whether these beliefs are formed in a way that might lead to inconsistent or impossible expectations for the poor (but not the rich). That is, some of these beliefs might not just be things that people can agree or disagree about, but are actually impossible and violate normative standards.

Why does this occur? When evaluating whether a person should do something to make money, people focus narrowly on the opportunity without considering other things a person might do. There are many intuitive reasons why the poor should take the opportunity (they need money). There are fewer intuitive reasons why the rich should (they have enough money). So when people consider whether the poor should do something to make money, the intuitive answer is "Yes."

Here, I document three effects that stem from this. First, this intuitive belief means that people's expectations for the poor depend heavily on how a question is framed; their expectations are therefore often inconsistent. Moreover, people often argue that the poor should do mutually exclusive things (i.e., do the impossible). Second, when the poor fail to meet these inconsistent or impossible expectations (which is inevitable), they rate the poor are lazier or less competent. Third, this leads people to set inconsistent or impossible conditions for poverty alleviation policies. I find evidence for this across over 10 studies with ~100 participants per cell (e.g., 400 Ps for a 2x2 between-subjects study) in all studies. Below, I highlight a few studies.

Study1 (2x2 between-subjects): Participants read about a rich or poor person, and participants were assigned to Phase1 or Phase2. Phase1 participants were asked how many hours the (rich or poor) person should work for a given wage. Median response for the poor: 10 hours; rich: 5 hours. Phase2 participants were asked a narrower version of this question—whether the person should work more than the median response from Phase1. Normatively, Phase2 answers should be around 50% (because people are asked whether someone should work more than the median number of hours). But, 67% of Phase2 participants said the poor should work more than the Phase1 median; 46% said so for the rich. Depending on the question, people have inconsistent expectations for how much the poor should work. Study2 replicates this within-subjects.

Study3 (2x2 between-subjects) shows that this process leads to impossible expectations. Participants read that a (poor/rich) student could either do an overnight work-shift or sleep before a scholarship exam; options were mutually exclusive. Participants were asked one of two questions: Whether the student should work, or Whether the student should sleep. When asked whether the rich should sleep, 81% said yes. Asked whether the rich should work, 35% said yes. Asked whether the poor should sleep, 78% said yes. Asked whether the poor should work, 66% said yes. A majority of people think the poor should both work and sleep, which is impossible. Study4 shows that when asked how people should allocate their hours in a

day across different tasks, participants' answers sum to more than 24 hours for the poor, not so for the rich.

Studies 5A-D show that the poor are judged as lazier and less competent for failing to meet these (impossible) expectations; the rich are not. For example, in Study 5D participants read a scenario describing how a (poor/rich) person could participate in one of two gig-economy promotions that offered higher wages than usual. One of the promotions was a "driving" promotion (e.g., driving for Uber); the other was a "delivery" promotion (e.g., deliveries for Uber Eats). These two promotions were mutually exclusive. Half of the participants were asked whether they thought the person should do the driving promotion. The other half were asked whether they thought the person should do the delivery promotion. Overall, significantly more participants thought the poor should do the promotion they were asked about (86%) than should the rich (63%). Critically, expectations for the poor were essentially impossible—88% of participants said the poor should do the delivery promotion, 85% said they should do the driving promotion (both significantly greater than 50%).

The next phase of the study asked participants to make an attribution about the person they just read about. Participants were either assigned to the "control" condition or the "failure" condition. Participants in the control condition were asked how lazy they think the person is (on a scale from 1 to 7). Participants in the failure condition were asked to first imagine that the person does not do the promotion that the participants were just asked about. Then participants were asked how lazy they think the person is. There was a significant interaction such that participants in the failure condition rated the poor as significantly lazier (M=3.47) than in the control condition (M=2.36). But participants did not rate the rich significantly differently in the failure condition (M=2.86) and control condition (M=2.68). Taken together, people have impossible expectations for the poor (more so than for the rich) and people judge the poor more harshly (but not the rich) when they fail to meet these expectations.

Studies 6A-B show that this leads people to set inconsistent and impossible conditions for anti-poverty policies. For example, when participants are asked how long the poor should have to work in order to qualify for food stamps, the median response is age 50. But when asked whether the poor should have to work past age 51 to qualify for food stamps, 64% of people say yes. This leads to escalating requirements for the poor to receive benefits.

REFERENCES

Amir, Dorsa, Matthew R. Jordan, and Richard G. Bribiescas (2016), "A Longitudinal Assessment of Associations Between Adolescent Environment, Adversity Perception, and Economic Status On Fertility and Age of Menarche," *PLoS One*, *11*, e0155883.

Andreoni, James, Nikos Nikiforakis, and Jan Stoop (2017), "Are The Rich More Selfish Than The Poor, Or Do They Just Have More Money? A Natural Field Experiment," *National Bureau of Economic Research, No. w23229.*

BBC. Are drivers of luxury cars less likely to stop for pedestrians? [video file] (2015, March 13). Retrieved from http://www.bbc.com/news/av/magazine-31854075/are-drivers-of-luxury-cars-less-likely-to-stop-for-pedestrians.

Belk, Russell W. (2013). "Extended Self in A Digital World," *Journal of Consumer Research*, *40*, 477–500.

Business Insider (2012), retrieved on March 03, 2018, from http://www.businessinsider.com/how-rich-people-think-differently-from-the-poor-2012-8?IR=T.

Business Insider (2015), retrieved on March 03, 2018 from http://www.businessinsider.com/rich-people-teach-their-kids-to-be-rich-2015-9?IR=T.

Brown, G., Lawrence, T. B., & Robinson, S. L. (2005). Territoriality in organizations. *Academy of Management Review*, 30(3), 577-594.

Chaplin, L. N., Hill, R. P., and John, D. R. (2014), "Poverty and Materialism: A Look at Impoverished versus Affluent Children," *Journal of Public Policy & Marketing*, 33, 78–92.

Chen, E., and Miller, G. E. (2012), "'Shift-and-persist' Strategies: Why Low Socioeconomic Status Isn't Always Bad for Health," *Perspectives on Psychological Science*, 7(2), 135–158.

CNN (2018), retrieved on March 03, 2018 from https://edition.cnn.com/2017/12/18/health/poor-rich-happiness-study/index.html.

Cohen, S., Janicki-Deverts, D., Chen, E., & Matthews, K. A. (2010). Childhood socioeconomic status and adult health. *Annals of the New York Academy of Sciences*, 1186(1), 37-55.

Côté, Stéphane, Julian House, and Robb Willer (2015), "High Economic Inequality Leads Higher-Income Individuals To Be Less Generous," *Proceedings of the National Academy of Sciences,* 112(52), 15838-15843.

Cutti, S. (2018, February). More money can mean Scrooge-like pride, study says. CNN. Retrieved from https://edition.cnn.com/2017/12/18/health/poor-rich-happiness-study/index.html.

Dubois, David, Derek D. Rucker, and Adam D. Galinsky (2015). "Social Class, Power, And Selfishness: When And Why Upper And Lower Class Individuals Behave Unethically," *Journal of Personality and Social Psychology,* 108(3), 436-449.

Duncan, Greg J., and Jeanne Brooks-Gunn (Eds.) (1997). *Consequences of growing up poor*. New York, NY: Russell Sage.

Economist (2010). Retrieved on March 03, 2018 from https://www.economist.com/node/16690659.

Evans, Gary W., and Rochelle C. Cassells (2013), "Childhood Poverty, Cumulative Risk Exposure, and Mental Health in Emerging Adults," *Clinical Psychological Science*, 2, 287-296.

Evans, Gary W. and Pilyoung Kim (2012), "Childhood Poverty and Young Adults' Allostatic Load: The Mediating Role Of Childhood Cumulative Risk Exposure," *Psychological Science*, 23, 979-983.

Griskevicius, V. and Kenrick, D. T. (2013), "Fundamental Motives: How Evolutionary Needs Influence Consumer Behavior," *Journal of Consumer Psychology*, 23(3), 372–386.

Griskevicius, V., Tybur, J. M., Delton, A. W., & Robertson, T. E. (2011), "The Influence of Mortality and Socioeconomic Status on Risk and Delayed Rewards: A Life History Theory Approach," *Journal of Personality and Social Psychology*, 100(6), 1015–1026.

Guinote, Ana, Ioanna Cotzia, Sanpreet Sandhu, and Pramila Siwa (2015). "Social status modulates prosocial behavior and egalitarianism in preschool children and adults." *Proceedings of the National Academy of Sciences*, 112(3), 731-736.

Hamilton, Rebecca W., Debora Thompson, Sterling Bone, Lan N. Chaplin, Vladas Griskevicius, Kelly Goldsmith, Ronald Hill, Deborah Roedder John, Chiraag Mittal, Thomas O'Guinn, Paul Piff, Caroline Roux, Anuj Shah and Meng Zhu (2019), "The Effects of Scarcity on Consumer Decision Journeys," *Journal of the Academy of Marketing Science*, 47 (3), 532-550.

Hill, Sarah E., Marjorie L. Prokosch, Danielle J. DelPriore, Vladas Griskevicius, and Andrew Kramer (2016), "Low Childhood Socioeconomic Status Promotes Eating In The Absence Of Energy Need," *Psychological Science*, 27, 354–364.

Hill, R. P. (2001). *Surviving in a Material World: The Lived Experience of People in Poverty*. Notre Dame: University of Notre Dame Press.

Khan, U., M. Zhu & A. Kalra (2011),"When Tradeoffs Matter: The Effect of Choice Construal on Context Effects," *Journal of Marketing Research*, 48(1), 62-71.

Kirk, C. P., Peck, J., & Swain, S. D. (2018). Property lines in the mind: Consumers' psychological ownership and their territorial responses. *Journal of Consumer Research*, 45(1), 148-168.

Korndörfer, Martin, Boris Egloff, and Stefan C. Schmukle (2015). "A large scale test of the effect of social class on prosocial behavior." *PloS one,* 10(7), e0133193.

Kraus, Michael W., Paul K. Piff, Rodolfo Mendoza-Denton, Michelle L. Rheinschmidt, and Dacher Keltner (2012). "Social class, solipsism, and contextualism: how the rich are different from the poor." *Psychological Review,* 119(3), 546-572.

Kraus, Michael W., E. J. Horberg, Jennifer L. Goetz, and Dacher Keltner (2011), "Social Class Rank, Threat Vigilance, and Hostile Reactivity," *Personality and Social Psychology Bulletin*, 37, 1376–1388.

Lamberton, Cait Poynor, and Randall L. Rose. (2012), "When Is Ours Better Than Mine? A Framework For Understanding And Altering Participation In Commercial Sharing Systems," *Journal of Marketing*, 76, 109–125.

National Public Radio (NPR 2018), retrieved on March 03, 2018 from https://www.npr.org/2018/01/23/579976635/the-power-hour.

New York Times (2010), retrieved on March 03, 2018 from http://www.nytimes.com/2010/08/22/magazine/22FOB-wwln-t.html?_r=1.

New York Times (2013), retrieved on March 03, 2018 from https://wheels.blogs.nytimes.com/2013/08/12/the-rich-drive-differently-a-study-suggests/.

New York Times (2015), retrieved on March 03, 2018 from https://www.nytimes.com/2015/05/07/style/the-shaky-moral-compass-of-silicon-valley.html.

New York Times (2017), retrieved on March 03, 2018 from https://www.nytimes.com/2017/11/07/your-money/money-bubble-economic-inequality.html

Piff, Paul K., Michael W. Kraus, Stéphane Côté, Bonnie Hayden Cheng, and Dacher Keltner. (2010). "Having less, giving more: the influence of social class on prosocial behavior." *Journal of Personality and Social Psychology,* 99(5), 771-784.

Piff, Paul K., Daniel M. Stancato, Stéphane Côté, Rodolfo Mendoza-Denton, and Dacher Keltner (2012). "Higher social class predicts increased unethical behavior." *Proceedings of the National Academy of Sciences,* 109(11), 4086-4091.

Rosa, J. A., Geiger-Oneto, S., and Fajardo, A. B. (2012), "Hope and Innovativeness: Transformative Factors for Subsistence Consumer-merchants," In *Transformative Consumer Research for Personal and Collective Well-Being*, eds. David, Glen M., Simone Pettigrew, Cornelia Pechmann and Julie L. Ozanne, New York, NY: Routledge, 151–70.

Roux, Caroline, Kelly Goldsmith, and Andrea Bonezzi (2015), "On The Psychology Of Scarcity: When Reminders Of Resource Scarcity Promote Selfish (And Generous) Behavior," *Journal of Consumer Research*, *42(4)*, 615-631.

Stellar, Jennifer E., Vida M. Manzo, Michael W. Kraus, and Dacher Keltner (2012). "Class and compassion: Socioeconomic factors predict responses to suffering." *Emotion,* 12(3), 449-460.

Stamos, Angelos, Efthymios Altsitsiadis, and Siegfried Dewitte (2019), "Investigating The Effect Of Childhood Socioeconomic Background On Interpersonal Trust: Lower Childhood Socioeconomic Status Predicts Lower Levels Of Trust," *Personality and Individual Differences*, *145*, 19-25.

The Annie E. Casey Foundation. 2019 Kids Count Data Book: State Trends in Child Well-Being. https://www.aecf.org/m/resourcedoc/aecf-2019kidscountdatabook-2019.pdf.

The Washington Post (2018). "Are rich people more likely to lie, cheat, steal? Science explains the world of Manafort and Gates." retrieved on August 14th 2018 from https://www.washingtonpost.com/news/speaking-of-science/wp/2018/08/13/are-rich-people-more-likely-to-lie-cheat-steal-science-explains-the-world-of%E2%80%A6/

Thompson, Debora V., Rebecca W. Hamilton and Ishani Banerji (2020), "The Effect of Childhood Socioeconomic Status on Patience," *Organizational Behavior and Human Decision Processes*, 157 (March), 85-102.

Trautmann, Stefan T., Gijs van de Kuilen, and Richard J. Zeckhauser (2013). "Social class and (un) ethical behavior: A framework, with evidence from a large population sample." *Perspectives on Psychological Science,* 8(5), 487-497.

Vernon-Feagans, Lynne, Patricia Garrett-Peters, Allison De Marco, and Mary Bratsch-Hines (2012), "Children Living In Rural Poverty: The Role Of Chaos In Early Development," In V. Maholmes & R. King (Eds). *The Oxford handbook of poverty and child development* (pp. 448-466). Oxford: Oxford University Press.

Zhu, M., Y. Yang & C. K. Hsee (2018), "The Mere Urgency Effect," *Journal of Consumer Research*, 45(3), 673-90.

The Troubles of Gifts: Exploring the Challenges Faced by Givers and Receivers

Chair: Lingrui Zhou, Duke University, USA

Paper #1: Buying Gifts for Multiple Recipients: How Culture Affects Whose Desires Are Prioritized

Ruomeng Wu, Western Kentucky University, USA

Mary Steffel, Northeastern University, USA

Sharon Shavitt, University of Illinois at Urbana-Champaign, USA

Paper #2: Buying Love: Gifts as a Form of Social Support

Hillary Wiener, University at Albany, USA

Holly Howe, Duke University, USA

Tanya Chartrand, Duke University, USA

Paper #3: The Burden of Gifts: How Givers Mispredict Negative Reactions of Receivers

Lingrui Zhou, Duke University, USA

Tanya Chartrand, Duke University, USA

Paper #4: Thanks for Nothing: When Giving a Gift is Worse than Giving Nothing at All

Morgan Ward, Emory University, USA

Michael L. Lowe, Georgia Institute of Technology, USA

Taly Reich, Yale University, USA

Tatiana M. Fajardo, Florida State University, USA

SESSION OVERVIEW

Gift exchange is a common societal practice that has been a tradition for thousands of years (Culture and Society 2015). The purchasing of gifts is a giant industry all across the world. The average American was expected to spend over $900 on gifts in 2019, a number that has been steadily growing over the past few years (Haury 2019). Moreover, gifts have important psychological effects, being able to bring people closer together and perpetuate relationships (Belk and Coon 1993; Chan and Mogilner 2016). On the other hand, gifts also have the potential to create conflict and negatively impact relationships (Sherry, McGrath, and Levy 1993). Given such immense financial and psychological consequences, understanding the potential impacts, both positive and negative, that underly gift exchange can provide important insight for consumers. In particular, this session aims to shed light on the challenges faced during gift giving, from both the givers' and receivers' perspectives.

Papers 1 and 2 examine the burdens givers experience when given the opportunity to give a gift. In paper 1, Wu, Steffel, and Shavitt explore the overindividualization of gift giving for multiple recipients from a cross-cultural perspective. The authors find that while both Easterners and Westerners tend to overindividuate when choosing for multiple others, Easterners are more likely to overindividuate when there are status differences amongst recipients.

Sometimes gift giving is the response to a difficult situation rather than the cause of one. Wiener, Howe, and Chartrand look at gift giving as a method of social support. They demonstrate that when encountering someone in need of support, consumers are more likely to give gifts instead of providing emotional support when the other is perceived as difficult to support. Interestingly, gift giving actually reduces the receiver's negative affect more so than providing emotional support.

Papers 3 and 4 explore the potential negative reactions that receivers experience when getting a gift. Zhou and Chartrand examine the mismatch between givers and receivers in terms of predicting receivers' feelings of indebtedness caused by the gift. They find that givers underestimate the amount of indebtedness experienced by re-

ceivers, and that this is caused by mispredictions in feelings of guilt. Indebtedness then leads to increased likelihood for receivers to get a return gift, which givers also do not anticipate.

In paper 4, Ward, Lowe, Reich, and Fajardo examine circumstances where giving a spontaneous gift results in worse outcomes than not giving a gift. The authors find that for high-investment relationships, receiving a low-expenditure gift decreases affiliation with the giver compared to not receiving a gift at all. The effect is attenuated for low-investment relationships.

These four papers highlight the various obstacles givers and receivers encounter and some of the unintended consequences of gifts. Taken together, we provide insight on givers' thought processes when choosing what to give, as well as the potentially negative reactions experienced by receivers. Accordingly, this session should have broad appeal to those who are interested in gift giving, cultural differences, social support, and consumer relationships.

Individuating Gifts out of Liking and Respect: Expanding Gift Giving Theory with a Cross-Culture Perspective

EXTENDED ABSTRACT

Gift givers often tailor their gift selections to show consideration to recipients. Consequently, givers who shop for multiple recipients at once tend to pass up gifts that they know would be preferred in favor of different gifts for each recipient (Steffel and LeBoeuf 2014). Although prior research illuminates how the immediate context influences overindividuation, little is known about the influence of the broader cultural context. The present research explores how cultural values influence overindividuation.

We predict that overindividuation is not a uniquely Western phenomenon—Westerners' independent values may foster overindividuation by emphasizing the value of treating people as unique individuals, but Easterners' interdependent values may also foster overindividuation by emphasizing the value of moderating choices based on the social context (Fukuoka et al. 2005). Additionally, how people from different cultures individuate gifts may differ depending on norms regarding how to properly acknowledge others' standing within a given social context. Whereas Western values emphasize choosing mainly based on personal preferences, Eastern cultures emphasize choosing based on social hierarchy and status (Riemer et al. 2014). As a result, the criteria that consumers use to decide whose preferences to prioritize should differ across cultures. We predict that Westerners will prioritize the preferences of recipients that they like better by choosing a better-liked gift for personally preferred recipients and a unique but less-liked gift for less preferred recipients. But they will not differentiate recipients based on their social status. By contrast, Easterners will prioritize the preferences of recipients who have higher social status and not necessarily the preferences of recipients they like better.

Experiment 1 examined whether givers from both a Western culture (United States) and an Eastern culture (China) overindividuate gifts for multiple recipients. Participants were recruited simultaneously from the U.S. ($N = 114$) and China ($N = 149$) and randomly assigned to imagine choosing a birthday gift for either one or two unacquainted recipients. In the two-recipient condition, the target recipient preferred silver but also liked gold, and the other recipient preferred only silver. In the one-recipient condition, participants

chose gifts only for the target recipient. Despite their cultural differences, givers in both cultures were less likely to get the silver frame for the target recipient in the two-recipient condition than in the one-recipient condition (41% vs. 76%; $p < .001$), and overindividuation did not vary based on culture ($p = .98$).

Experiment 2 sought to determine whether givers from Western and Eastern cultures overindividuate differently based on personal liking, relative status, or both, and whether these differences are driven by cultural values dictating who should be shown greater consideration. Participants from the U.S. ($N = 318$) and China ($N = 341$) imagined choosing iPad cases for two unacquainted recipients who either differed in how much they were liked (favorite coworker vs. liked coworker) or in their status (higher-status coworker vs. same-status coworker). Both recipients preferred a black case, but the higher-status/favorite coworker also liked brown, and the same-status/liked coworker also liked beige. Participants were free to choose the same or different iPad cases for the recipients. Finally, participants reported to what extent they felt they should show consideration to each recipient.

Overall, participants overindividuated by choosing the preferred black iPad case for the higher status/favorite coworker more often than for the same status/liked coworker ($p < .001$). More importantly, there was a three-way interaction between culture, relationship, and recipient on gift choices ($p = .01$). Both Chinese and American participants chose the preferred gift more often for the favorite coworker than the liked coworker (both $p = .001$). By contrast, Chinese participants chose the preferred gift more often for the higher-status coworker than the same-status coworker ($p < .001$), but American participants did not differentiate between recipients based on status ($p = 1.00$). Furthermore, both American and Chinese participants felt their favorite (vs. liked) coworker should be treated with greater consideration (both $p < .05$). However, Chinese participants felt their higher (vs. same)-status coworker should be treated with greater consideration more so than did American participants ($p < .001$ vs. $p = .07$, respectively).

Experiment 3 examined whether power distance belief, the degree to which people believe in or endorse hierarchy and status differences in society, predicts gift choices in the same manner as the national culture differences. The design of Experiment 3 was similar to that of Experiment 2, except that participants completed a measure of power distance belief ($\alpha = .55$; Zhang et al. 2010) rather than a measure of consideration norms.

As expected, Westerners and Easterners followed different criteria to overindividuate gifts for multiple recipients. U.S. givers ($N = 210$) prioritized the preference of the better-liked recipient according to their relative attitudes towards the recipients, such that U.S. givers ($p < .001$), but not Chinese givers ($N = 241$, $p = .26$), chose the preferred gift more often for the best friend than for the acquaintance. However, Chinese givers prioritized the preferences of the higher-status recipient according to the relative social status of the recipients, as Chinese givers ($p < .001$), but not U.S. givers ($p = .11$) chose the preferred gift more often for the manager than the coworker. Moreover, power distance belief predicted gift choices (the three-way interaction: $p < .05$) in the same manner as did national culture differences. This pattern of results was consistent with prior research, such that individual differences in power distance belief predict attention to the status signals sent by one's consumption (e.g. Gao et al. 2016). In line with this, givers higher in power distance belief prioritized the preferences of the recipient with higher status, whereas those lower in power distance belief prioritized the preferences of the recipient that they liked better, but not vice versa.

Overindividuating gifts for multiple recipients occurs across cultures. However, the dimensions along which overindividuation occurs vary in ways that reflect cultural values. Although Americans overindividuate based only on personal liking, Chinese overindividuate based on both liking and status.

Buying Love: Gifts as a Form of Social Support

EXTENDED ABSTRACT

Social support is critically important to people's health and happiness (Thoits 1995), and not providing or providing low-quality social support damages relationships (Dakof and Taylor 1990). However, people often do not provide support to others. When confronted with a loved one's tragedy, would-be support providers often avoid the affected, refuse to talk about the difficult topic, or minimize the problem (Barbee and Cunningham 1995; Dakof and Taylor 1990). One reason people avoid providing support is because providing high-quality emotional support can be difficult and unpleasant (Wortman and Dunkel-Schetter 1987).

In this paper we propose an alternate way that consumers can support others who are struggling: giving them a gift. Gifts have been found to be important in relationship maintenance, but most gift research has focused on gifts given for celebratory events (Ward and Chan 2015). We focus on gifts given in response to others' negative events, such as a loved one's death. Consumers regularly give gifts, such as flowers or care packages, under these circumstances (Post and Senning 2017). However, little is known about when consumers are most likely to give these gifts or how supported recipients feel when receiving them.

We propose that the more difficult it is to provide emotional support, the more likely the support provider is to give a gift. In particular, support providers report that providing support to pessimistic, negative people is stressful and difficult (Forest et al. 2014). Giving a gift is an alternative way to fulfil the support obligation (Clark 1987), so we propose that givers will be more likely to provide support by giving a gift when the recipient is pessimistic.

We also investigate how effective recipients find emotional support versus gifts to be. Recipients may view gifts negatively, as givers "buying their affection" but also report that emotional support is often ineffective (Lehman, Ellard, and Wortman 1986). Therefore, we propose that receiving a gift will lead to a larger improvement in mood than receiving emotional support will.

Study 1a examines when givers choose to support someone with a gift rather than by providing emotional support. Participants ($n = 48$) came to the lab in groups and were told that they would be paired with another participant. They were shown the personality profile of their "partner." They did not have a partner; instead these profiles contained the recipient personality manipulation: The partner was either pessimistic or optimistic. Then participants were told their partner had been through a break-up and were asked whether they wanted to spend five minutes talking to them about it (i.e., provide emotional support) or pay $1 (from their $7 study payment) to give them a gift. Participants were significantly more likely to provide support by giving a gift, rather than by providing emotional support, when the support recipient seemed pessimistic (54%) rather than optimistic (25%, $\chi^2 = 4.27$, $p = .039$).

Study 1b ($n = 225$) is a conceptual replication of study 1a. Participants read a scenario about a pessimistic or optimistic person in need of support. Participants chose whether to support the recipient by sending them a care package or talking to them on the phone and indicated how difficult providing support would be. Participants who read about the negative recipient were significantly more likely to

send a care package (46%) than were those who read about the positive recipient (27%, $\chi^2 = 9.60$ $p = .002$). A mediation analysis showed that difficulty of providing support mediated the effect of condition on gift giving (95% CI: [.02, .48]).

Study 2 ($n = 118$) is a dyadic lab study (59 dyads) that investigates how recipients feel about receiving social support through a gift. This study had a 2 (emotional supported provided v. no emotional support provided) x 3 (time: initial, post-support manipulation, post-gift opportunity) mixed design. Participants came to the lab with a close other. One participant from each pair was randomly assigned to the role of giver or recipient. Recipients first wrote about a current life problem that did not involve their partner and answered questions about their mood and feelings about the problem. Then they talked to their partner for five minutes about their problem (emotional support condition) or completed a control task before completing the attitude measures again. Then givers were given the option to spend some of their study payment to purchase 0-4 gifts for their partner. The research assistant gave recipients their gift(s) if they were given one, and recipients completed the measures a third time.

We first examined whether receiving emotional support made recipients feel better than did completing a control task. We conducted a repeated measures ANOVA with the time at which the recipient rated their feelings as the within-subjects factor (time 1 [immediately after writing about their problem] v. time 2 [post-manipulation]) and whether they received emotional support as the between-subjects factor. Receiving emotional support did not reduce participants' negative mood (F (1, 57) = 2.15, $p = .15$), and only marginally reduced their negative feelings toward the problem (F (1, 57) = 3.03, $p = .087$) more than completing the control task did.

In contrast, receiving a gift reduced negative mood and feelings about the problem significantly more than not receiving a gift did. We conducted a repeated measures ANOVA with the time at which the recipient rated their feelings as the within-subjects factor (time 2 [post-manipulation] v. time 3 [post-gift]) and whether or not they received emotional support as the between-subjects factor. Participants who received a gift experienced a larger decrease in negative emotions (F (1, 57) = 7.61, $p = .008$) and negative feelings toward the problem (F (1, 57) = 8.56, $p = .005$) than those who did not. There was no main effect of having received support on post-gift feelings ($ps > .15$).

In conclusion, these three studies show that gifts are not consumers' default way of providing social support, but they use them when they think the recipient will be difficult to support, and that they are quite effective at improving recipient mood.

The Burden of Gifts: How Givers Mispredict Negative Reactions of Receivers

EXTENDED ABSTRACT

Givers make many mispredictions when it comes to getting gifts for receivers. For example, they mistakenly think that unsolicited gifts would be appreciated more (Gino and Flynn 2011; Ward and Broniarczyk 2016) and that desirability matters more than practicality (Baskin et al. 2014). Additionally, givers often focus on maximizing the happiness of receivers (Baskin et al. 2014), but do not seem to consider the potential negative consequences of the gift. Thus, the present research focuses on givers' mispredictions of receivers' negative feelings during gift giving.

Social norms dictate that we cannot always be on the receiving end of exchanges (Ruth, Otnes, and Brunel 1999). Thus, we propose that from the receiver's perspective, receiving a gift will lead to more feelings of indebtedness that givers are unable to anticipate. Furthermore, we hypothesize that this effect is driven by recipients feeling more guilty than givers expect them to feel after receiving the gift. People experience guilt when they think they have gone against an important value (Sznycer 2019), in this case feeling currently unbalanced on reciprocity norms. We propose that feelings of guilt lead to a cognitive recalibration of the situation (Tooby and Cosmides 2008) in which receivers realize they are indebted. This indebtedness increases a need for reciprocity (Belk and Coon 1993), leading receivers to want to give a return gift in order to reinstate equilibrium. Across four studies, we demonstrate the inaccuracy of givers in (under)anticipating the burdens placed on receivers.

In study 1, we examined the mismatch between feelings of indebtedness that givers predict receivers will experience compared to what receivers actually experience. Participants were recruited right after Christmas and were randomly assigned to think back to the winter holidays to either recall a gift they gave to someone or to recall a gift they received from someone. Givers then rated how indebted they thought the recipient would feel while receivers rated how indebted they actually felt (100-point slider scale). Results revealed that those who recalled giving a gift ($M = 17.21$) significantly underestimated the indebtedness felt by those who recalled receiving a gift ($M = 26.8$; $t(198) = -2.53$, $p = .01$).

Study 2 conceptually replicated the results of study 1 using dyads in the lab. Participants came into the lab in pairs (63 pairs), with one partner assigned as the giver and the other assigned as the receiver. The giver chose a gift for the receiver on the premise that one receiver would be picked from the lottery to obtain the gift the giver chose for them. Givers and receivers then rated feelings of the receiver's indebtedness. Using a multi-level modeling approach to account for violations of statistical independence for pairs (Kenny, Kashy, and Cook 2006), we again find that givers underestimated feelings of indebtedness ($B = 7.77$, $t(64.22) = 2.03$, $p = .05$).

In study 3, we conducted a 2 (role: giver vs. receiver) x 2 (friend: close vs. distant) experiment to test the proposed mechanism and examine whether closeness with the exchange partner would affect the results. Participants first named either a close friend or an acquaintance. Then they read a scenario in which they met with the friend and either gave or received a gift. Givers predicted receivers' feelings of indebtedness and guilt while receivers rated own feelings of indebtedness and guilt. An ANOVA revealed only a main effect of role ($F(1, 395) = 15.34$, $p < .001$), with givers again mispredicting indebtedness ($M_{giver} = 20.25$ vs. $M_{receiver} = 31.01$). There was no effect of closeness or interaction between role and closeness ($ps > .46$). Receivers also felt more guilty after getting the gift than givers anticipated ($M_{giver} = 7.40$ vs. $M_{receiver} = 11.55$; $F(1, 395) = 15.34$, $p = .03$). Ratings of guilt mediated the mispredictions on indebtedness ($ab = -3.05$, SE = 1.36, 95% CI [-5.63, -.36]).

Finally, in study 4, we examined the predictions for both the negative experiences of indebtedness and guilt as well as the positive emotion of happiness. We conducted a 2 (role: giver vs. receiver) x 2 (gift: desirable vs. not) experiment in which the pretested gift was either a desirable or undesirable gift card. Then givers predicted while receivers rated own feelings of happiness, indebtedness and guilt. We also measured predicted likelihood to give a return gift as a downstream consequence of indebtedness (1 = not likely, 7 = very likely). First, we ran an ANOVA on happiness, which revealed a main effect of role ($F(1, 397) = 16.66$, $p < .001$), a main effect of desirability ($F(1, 397) = 7.35$, $p = .007$), and a marginal interaction between the two ($F(1, 397) = 3.10$, $p = .08$). For desirable gifts, givers and receivers had similar estimates of happiness ($M_{giver} = 79.35$ vs. $M_{receiver} = 84.68$; $p = .10$), whereas for undesirable gifts, givers un-

derestimated the happiness that receivers actually felt (M_{giver} = 69.10 vs. $M_{receiver}$ = 82.50; $p < .001$).

Next, we ran an ANOVA on indebtedness and guilt ratings. For indebtedness, we found a main effect of role (M_{giver} = 18.81 vs. $M_{receiver}$ = 31.51; $F(1, 397) = 21.80, p < .001$), but no significant effect of gift desirability or interaction ($ps > .66$). We found the same pattern for feelings of guilt. Finally, we examined likelihood of buying a return gift. Although there were no effects regarding desirability, we found a main effect of role such that receivers felt more obligated to get a return gift for givers than the givers anticipated (M_{giver} = 5.05 vs. $M_{receiver}$ = 6.06; $F(1, 397) = 50.97, p < .001$). This effect was serially mediated by the mismatch between giver and receiver on feelings of guilt and indebtedness (index = .03, SE = .02, 95% CI [.002, .07].

Taken together, we demonstrate that givers chronically underestimate how indebted receivers actually feel after getting a gift because they cannot foresee the guilt experienced by the receiver. As a downstream consequence, receivers become more likely to give a return gift for the giver, which givers also do not anticipate.

Thanks for Nothing: When Giving a Gift is Worse than Giving Nothing at All

EXTENDED ABSTRACT

Receiving a gift is generally regarded by both the giver and recipient as a relationship-validating experience. Prior research shows that even when a giver chooses a *less* preferred item, the relationship between giver and recipient is typically enhanced (Dunn et al. 2008) as the recipient is likely to view the gift as a signal of the giver's positive intentions toward the recipient. Given strong social endorsement to avoid 'looking gift horses in the mouth,' coupled with consumers' motivation to interpret gifts as positive relational symbols, it may seem unlikely that receiving a gift would harm the giver-recipient relationship. However, we predict and find that there *are* instances in which certain gifts may damage relationships.

The context in which gift exchange takes place influences the recipient's interpretation of the offering. Much of the prior gifting research focuses on 'normative' gift contexts wherein recipients have high expectations of receiving a gift (e.g., birthday) and the items chosen are pre-determined by social norms (Joy 2001). However, many gifts are offered spontaneously -- outside of prescribed giving occasions. According to Carrier (1990), spontaneous gifts represent the truest form of giving because givers select these items for recipients without the pressure of social obligation. Consequently, we suggest that recipients are likely to be *more* attuned to the messages imbued in spontaneous gifts, because they are perceived to demonstrate the giver's 'true' perceptions of the relationship (Belk and Coon 1993).

We predict that the context of spontaneous gift giving recipients will interpret givers' expenditures of resources on gifts as proxies for givers' value for the relationships (Ruth et al. 1999). Thus, low-expenditure gifts may devalue the relationship relative to receiving no gift; in response recipients may distance themselves from the giver.

We suggest that when gifts are offered spontaneously, low expenditure gifts have especially detrimental effects on high-investment relationships (HIR) – relationships in which individuals have committed substantial time or effort to one another. Conversely, in the context of low-investment relationships (LIR) – relationships in which the individuals are less involved with or committed to one another – recipients are likely to have lower expectations for the gifts they receive. Thus, receiving a low expenditure gift should be less damaging for LIRs.

Gift giving is a cultural tradition meant to perpetuate future relationships. Given the future-looking nature of gift exchange, we consider recipients' predicted future relationship 'affiliation' with givers as the focal dependent measure.

In Study 1, an RA asked students who had completed various research studies, if they would complete an 'additional task' to help the PR department at the university. Participants were told that no compensation would be given but that their participation would be of great assistance to the PR department. Participants were instructed to search the university's name on Google.com/news, then read and summarize the top search results. To manipulate relationship investment, students were either assigned to summarize 10 (vs. 2) articles. Those in the 10 article condition felt they had worked harder and thus were more highly invested in their relationship with the organization. After completing the task, participants were given either a low expenditure gift (i.e. three plain pencil erasers) or nothing at all. Subsequently, participants endorsed their feelings of affiliation with the PR department. An ANOVA conducted on the affiliation measure revealed a significant interaction between the two factors ($F(1, 296) = 4.04, p = .04$). When HIR participants received a low-expenditure gift, they expressed lower feelings of affiliation (M_{LE} = 4.09) than when they received no gift ($M_{No\ Gift}$ = 4.67; $t = -3.04, p < .01$). However, in LIRs, this effect was attenuated (M_{LE} = 4.62 vs. $M_{No\ Gift}$ = 4.69; $t = -.32, p = .75$).

In Study 2, we examined whether HIR recipients were more sensitive to the relational implications of low-expenditure gifts received under spontaneous (vs. normative) conditions. In a 2 (Gift: None vs. Low-Expenditure) by 2 (Gifting Context: Normative vs. Spontaneous) participants read a scenario. To manipulate gift context, participants read a scenario in which they imagined completing a project at work, after which their employer *usually* presented them a gift (normative) or *did not usually* present one (spontaneous). Next they imagined receiving a low-expenditure gift (a $5.00 gift card to a restaurant) or no gift. Subsequently, participants endorsed their affiliation with the firm.

An ANOVA on affiliation revealed a significant interaction between gift context and gifting scenario ($F(1,178) = 5.24, p = .02$). In normative conditions, there was no significant difference in affiliation when participants received no (vs. low-expenditure) gift ($M_{No\ Gift}$ = 4.03 vs. M_{LE}= 3.96; $F(1, 178) = .082, p = .76$). However, in spontaneous conditions, receiving no (vs. low-expenditure) gift resulted in significantly higher feelings of affiliation with the giver ($M_{No\ Gift}$ = 4.83 vs. M_{LE} = 3.83; $F(1, 178) = 10.93, p = .001$). Thus, low-expenditure gifts given under normative circumstances ameliorated recipients' feelings of disaffiliation.

In Study 3, in the context of interpersonal relationships, we examine how recipients' perceptions of givers' individual resources influence their predicted affiliation. In a 2 (Relationship investment: High vs. Low) x 3 (Giver resources: Control vs. Restricted vs. Unrestricted) x 2 (Gift Expenditure: Low vs High) between-subjects experiment, participants imagined receiving either a low-expenditure gift (a $3, easily found, generic keychain) or no gift, after a book club meeting (spontaneous context). Notably, recipients were told that their HIR (LIR) friend either had "a really tight (light) schedule this semester." Under control conditions, participants were given no information about the giver's time resources.

An ANOVA revealed a significant three-way interaction ($F(2,378)=5.07, p<.01$). When no mention of the givers' resources was made in the unrestricted resource condition, results reveal significant two-way interactions between relationship investment and gift type (Control: ($F(1,378)=3.88, p<.05$); Unrestricted: ($F(1, 378)=4.31, p<.05$)). However, when participants knew the giver had

restricted resources, the focal interaction among high investment relationships was attenuated (M_{LEt}=4.69, M_{NoGift}=4.66; $F(1,378)$=0.25, p=.87).

In conclusion, we demonstrate that in spontaneous gift contexts, giving nothing to an HIR recipient may be more likely to preserve the relationship than giving a low-expenditure gift.

REFERENCES

Barbee, Anita P. and Michael R. Cunningham (1995), "An Experimental Approach to Social Support Communications: Interactive Coping in Close Relationships," *Communication Yearbook*, 18(1), 381-413.

Baskin, Ernest, Cheryl J. Wakslak, Yaacov Trope, and Nathan Novemsky (2014), "Why Feasibility Matters More to Gift Receivers than to Givers: A Construal-level Approach to Gift Giving," *Journal of Consumer Research*, 41(1), 169-182.

Belk, Russell W., and Gregory S. Coon (1993), "Gift giving as Agapic Love: An Alternative to the Exchange Paradigm Based on Dating Experiences," *Journal of Consumer Research*, 20(3), 393-417.

Carrier, James G. (1990), "Gifts in a World of Commodities: The Ideology of the Perfect Gift in American Society," *Social Analysis*, 29, 19-37.

Chan, Cindy and Cassie Mogilner (2017), "Experiential Gifts Foster Stronger Social Relationships Than Material Gifts," *Journal of Consumer Research*, 43(6), 913-931.

Clark, Candace (1987), "Sympathy Biography and Sympathy Margin," *American Journal of Sociology*, 93 (2), 290-321.

Culture and Society (2015), *Curious History*, Retried from: http://www.curioushistory.com/the-origins-and-history-of-gift-giving/

Dakof, Gayle A. and Shelley E. Taylor, "Victims' Perceptions of Social Support: What is Helpful From Whom?," *Journal of Personality and Social Psychology*, 58(1), 80-89.

Dunn, Elizabeth W., Jeff Huntsinger, Janetta Lun, and Stacey Sinclair (2008), "The Gift of Similarity: How Good and Bad Gifts Influence Relationships," *Social Cognition*, 26(4), 469-81.

Forest, Amanda, David R. Kille, Joanne V. Wood, and John G. Holmes (2014), "Discount and Disengage: How Chronic Negative Expressivity Undermines Partner Responsiveness to Negative Disclosures," *Journal of Personality and Social Psychology*, 107(6), 1013-1032.

Fukuoka, Yoshimi, Kathleen Dracup, Sally H. Rankin, Erika Sivarajan Froelicher, Fumio Kobayashi, Haro Hirayama, Miyoshi Ohno, and David Matsumoto (2005), "Prehospital Delay and Independent/Interdependent Construal of Self Among Japanese Patients with Acute Myocardial Infarction," *Social Science & Medicine*, 60(9), 2025-2034.

Gao, Huachao, Karen Page Winterich, and Yinlong Zhang (2016), "All that Glitters is Not Gold: How Others' Status Influences the Effect of Power Distance Belief on Status Consumption," *Journal of Consumer Research*, 43(2), 265-281.

Gino, Francesca and Francis J. Flynn (2011), "Give them what they want: The Benefits of Explicitness in Gift Exchange," *Journal of Experimental Social Psychology*, 47(5), 915-922.

Haury, Amanda (2019), "Average Cost of an American Christmas," Retrieved from: https://www.investopedia.com/financial-edge/1112/average-cost-of-an-american-christmas.aspx

Joy, Annamma (2001), "Gift Giving in Hong Kong and the Continuum of Social Ties," *Journal of Consumer Research*, 28(2), 239-56.

Kenny, David A., Deborah A. Kashy, and William L. Cook (2006), Dyadic Data Analysis. Guilford Press.

Lehman, Darrin R., John H. Ellard, and Camille B. Wortman (1986), "Social Support for the Bereaved: Recipients' and Providers' Perspectives on What is Helpful," *Journal of Consulting and Clinical Psychology*, 54 (4), 438-446.

Post, Lizzie and Daniel Post Senning, *Emily Post's Etiquette, 19th Edition: Manners for Today*, New York, New York: HarperCollins Publishers.

Riemer, Hila, Sharon Shavitt, Minkyung Koo, and Hazel Rose Markus (2014), "Preferences Don't Have to be Personal: Expanding Attitude Theorizing with a Cross-cultural Perspective," *Psychological Review*, 121(4), 619-648.

Ruth, Julie A., Cele C. Otnes, and Frederic F. Brunel (1999), "Gift Receipt and The Reformulation of Interpersonal Relationships," *Journal of Consumer Research*, 25(4), 385-402.

Sherry Jr, John F., Mary Ann McGrath, and Sidney J. Levy (1993), "The Dark Side of the Gift," *Journal of Business Research*, 28(3), 225-244.

Steffel, Mary and Robyn A. Le Boeuf (2014), "Overindividuation in Gift Giving: Shopping for Multiple Recipients Leads Givers to Choose Unique but Less Preferred Gifts," *Journal of Consumer Research*, 40(6), 1167-1180.

Sznycer, Daniel (2019), "Forms and Functions of the Self-conscious Emotions," *Trends in Cognitive Sciences*, 23(2), 143-157.

Thoits, Peggy A. (1995), "Stress, Coping and Social Support Processes: Where are we? What's Next?"," *Journal of Health and Social Behavior*, (Extra Issue), 53-79.

Tooby, John and Leda Cosmides (2008), "The Evolutionary Psychology of the Emotions and Their Relationship to Internal Regulatory Variables," in *Handbook of Emotions*, ed. M. Lewis, J. M. Haviland-Jones, and L. F. Barrett, The Guilford Press, 114-137.

Ward, Morgan K. and Cindy Chan (2015), "Gift Giving" in *The Cambridge Handbook of Consumer Psychology*, Michael I. Norton, Derek D. Rucker, and Cait Lamberton, eds. Cambridge, UK: Cambridge University Press, 398-418.

Ward, Morgan K., and Susan M. Broniarczyk (2016). "Ask and You Shall (Not) Receive: Close Friends Prioritize Relational Signaling over Recipient Preferences in Their Gift Choices." *Journal of Marketing Research*, *53*(6), 1001-1018.

Wortman, Camille B. and Christine Dunkel-Schetter (1987), "Conceptual and Methodological Issues in the Study of Social Support," in *Handbook of Psychology and Health: Stress,* Vol. 5, Andrew Baum and Jerome E. Singer, eds. Hillsdale, NJ: Lawrence Erlbaum Associates, Inc., 63-108.

Zhang, Yinlong, Karen Page Winterich, and Vikas Mittal (2010), "Power Distance Belief and Impulsive Buying," *Journal of Marketing Research*, 47(5), 945-954.

Subjective to Objective Value of Humans and Algorithms

Chairs: Gizem Yalcin, Erasmus University, The Netherlands
Evan Weingarten, Arizona State University, USA

Paper #1: Thumbs Up or Down: Consumer Reactions to Decisions by Algorithms Versus Humans

Gizem Yalcin, Erasmus University, The Netherlands
Sarah Lim, Cornell University, USA
Stefano Puntoni, Erasmus University, The Netherlands
Stijn van Osselaer, Cornell University, USA

Paper #2: People Prefer Forecasting Methods Similar to the Event Being Predicted

Lin Fei, University of Chicago, USA
Berkeley J. Dietvorst, University of Chicago, USA

Paper #3: Stress, Addiction, and Artificial Intelligence

Mohamed Ayman Hussein, Stanford University, USA
Szu-chi Huang, Stanford University, USA

Paper #4: Experts Outperform Technology in Creative Markets

Evan Weingarten, Arizona State University, USA
Michael Meyer, University of California – San Diego, USA
On Amir, University of California – San Diego, USA
Amit Ashkenazi, Fiverr, USA

SESSION OVERVIEW

With the accelerated demand for new technologies, algorithms / artificial intelligence (AI) have integrated diverse and refined skills. These advancements make them a viable alternative to using humans to complete the same tasks. Algorithms can outperform humans on medical diagnoses (Hutson 2017), taste-based recommendations (Yeomans et al. 2019), predictions (Grove et al. 2000), and games (Hosanagar 2019).

Despite advancements in these new technologies in businesses, however, the literature diverges on the extent consumers embrace or dislike algorithms. It is still unclear from the literature when consumers are open to using algorithms (e.g., Dietvorst et al. 2015; Logg et al. 2019). This disagreement raises important questions about the dynamics between humans and their valuation of technology: What factors affect consumers' reactions towards decisions by algorithms (vs. humans)? Do consumers value decisions differently when generated by algorithms or humans? Does the framing of algorithms change consumers' willingness to use it? Under which situations are consumers more likely to (de)value algorithms? Can algorithms objectively outperform humans in domains involving aesthetics?

This session aims to identify the boundary conditions of when consumers appreciate algorithms more than humans (subjective valuation), and when algorithms do or do not objectively outperform humans (objective). In the first paper, **Yalcin et al.** study consumers' reactions to decisions that are made by algorithms versus humans. Across seven studies, they reveal less positive reactions to favorable outcomes (e.g., acceptances) by algorithms (vs. humans), whereas they find no increased negative responses to algorithms when the outcome is unfavourable (e.g., rejections). They also show that these differences are explained by a shift in perceptions depending on the valence of the decision outcome. **Lin** and **Dietvorst** explore how the way algorithms are described changes consumers' likelihood of using them. Across seven studies and different prediction methods (e.g., navigation), they demonstrate that consumers prefer methods of prediction that replicate the event in question even when doing so is counterproductive. Next, **Hussein** and **Huang** investigate what type of professional help consumers value more when dealing with

stress and compulsive behaviors. In four studies, the authors find that consumers perceive AI (vs. human) mental health providers to be less warm, which harms their perceived competence, resulting in higher aversion of AI providers. Finally, the paper by **Weingarten et al.** tests whether AI outperform human experts in creative markets, specifically in logo design. The authors consistently find that the quality of the logos from human experts outperform those from artificial intelligence.

This session provides timely insight into objective and subjective valuation of algorithms and humans, an increasingly important topic given the proliferation of this technology in consumer contexts. Our proposed session directly addresses the ACR 2020 conference theme as it examines the value of deep thinking, rational thought, and reason for humans relative to algorithms in a new era of machine intelligence. We believe that this proposed session should be of interest to a broad audience of scholars and practitioners working on judgment and decision-making, advice/recommendations, aesthetics, and new technologies. All projects have at least four completed studies.

Thumbs Up or Down: Consumer Reactions to Decisions by Algorithms Versus Humans

EXTENDED ABSTRACT

Companies are increasingly adopting algorithms to make decisions that affect existing and potential customers, such as accepting and rejecting applications. Today, algorithms are commonly used to decide who a company should hire (e.g., JetBlue) or provide services to (e.g., rayatheapp.com). This growing trend calls for marketing researchers to gain a better understanding of customers' reactions to decisions made by algorithms and humans. Previous research has predominantly focused on how individuals choose between an algorithmic and human service provider (Castelo et al. 2019; Logg et al. 2019; Longoni et al. 2019). Unlike this line of research, we investigate the responses of individuals as a recipient of decisions made by either an algorithm or a human.

In this research, we propose that customers react to decision-makers (algorithms vs. humans) differently depending on the valence of decision outcomes, namely whether they are accepted or rejected by a firm. Specifically, we hypothesize that customers react less positively (e.g., less perceived self-worth, less positive attitudes towards the firm), to an algorithm than a human decision-maker in the case of favorable decisions (e.g., acceptances), whereas such a negative reaction to an algorithm (vs. a human) would be attenuated in the case of unfavorable decisions (e.g., rejections). Our theorizing is based on attribution theory demonstrating that individuals tend to attribute their successes and failures in a self-serving way (Halperin et al. 1976). Namely, people tend to take credit for their success but blame others for failures so as to defend their self-esteem. Accepted customers would be motivated to view the positive outcome as a result of their individual characteristics, thereby reacting more positively to a human (vs. an algorithmic) decision-maker, who is perceived as more capable of incorporating individuals' uniqueness into the decision. Rejected customers, however, would attribute the unfavorable outcome to decision-makers (regardless of who the decision-maker is), viewing a human decision-maker as less objective and an algorithm as more ignorant of their individual uniqueness.

We tested our predictions across seven experiments (N = 3,535) and showed that customers react differently to favorable (vs. unfavorable) decisions that are told to be made by algorithms and humans across various contexts (e.g., dating websites, bank loans). In studies 1 and 2, we demonstrated that participants felt lower feelings of self-worthiness when favorable decisions were made by an algorithm (vs. a human). This relatively negative reaction to algorithms is, however, mitigated when the decision outcome is unfavorable. Extending these findings, study 3 revealed the same pattern of customers' reactions towards firms: participants demonstrated less positive attitudes towards the firm when an algorithm (vs. a human) accepts them, but such a relatively negative reaction to algorithmic decision-making was mitigated in the case of unfavorable decisions.

In studies 4a, 4b and 5, we aimed to understand possible drivers of such an interaction effect. In studies 4a-b, we revealed the negative impact of disclosing algorithmic decision-makers. Specifically, when the decision-maker was not explicitly mentioned by the company, participants reacted similarly as they did to a human decision-maker. Next, study 5 tested whether participants would react more positively to humans even when they do not actively engage in decision-making but monitoring the process. In line with our theorization, our results demonstrated that the relatively positive effect of human decision-making is driven by knowing that a human *actively made a decision* to accept the applicants instead of passively monitoring the evaluation process. Finally, in study 6, we directly examined the psychological mechanism underlying different reactions to algorithmic versus human decision-makers. In these studies, we showed that the differences in customers' reactions stem from how they perceive these two decision-makers and that their perceptions of algorithms and humans (i.e., perceived objectivity, consideration of applicants' uniqueness).

We believe that our research makes several contributions. Extending the previous work that has predominantly studied situations where people *choose whether to rely on algorithms or humans*, we study situations where *customers are recipients of decisions made by algorithms versus humans*. Furthermore, the current research demonstrates how motivated attribution plays a role in people's perception of algorithmic versus human decision-making. From a practical perspective, our work offers important managerial guidance. Managers are often worried about deploying algorithms in customer-facing functions as they fear algorithms to amplify customers' negative reactions in the case of unfavorable decisions. Our findings, however, suggest that managers should be more concerned about deploying algorithms in the case of favorable experiences as it can result in less positive customer reactions. Together, our work provides valuable insights on how firms can effectively communicate decision outcomes to customers.

People Prefer Forecasting Methods Similar to the Event Being Predicted

EXTENDED ABSTRACT

Consumers face many scenarios where they have to make predictions by choosing between prediction methods. People can check multiple navigation tools for traffic predictions, analysts choose between models to make financial market predictions, and patients can choose between doctors and AI for medical diagnosis. It is clear from past research that people don't always pick the best performing method (Arkes et al. 1986; Dietvorst et al. 2015; Yeomans et al. 2019). However, it is still unclear how consumers choose between prediction methods. What features do people look for in prediction methods?

In this paper, we find that the more similar a prediction method is to the event being predicted (e.g. in its outcome distribution, process, etc.), the more people like it, even when it does not perform as well as alternatives. Humans often learn by mimicking and mirroring others' actions (Meltzoff and Moore 1977), and people tend to "over-imitate" - copying actions that are unnecessary to accomplish the given goal (McGuigan et al. 2011; Hoehl et al. 2019). We propose that this innate behavior transfers to consumers' preferences for prediction methods: consumers prefer prediction methods that best resemble the event being predicted. However, this preference can lead consumers to prefer prediction methods that offer suboptimal performance. For example, when the outcomes of an event are at least partially determined by random chance (Fox and Ülkümen 2011), mimicking the event in question to predict its outcome will result in overfitting of random error. In a set of 7 studies, we investigate consumers' preference for similar prediction methods using both incentivized studies and real-world consumer scenarios.

In Study 1, we present evidence that people like a prediction method to be similar to the event in question by having participants predict the outcome of a die roll. We chose this task because rolling a die has a clear process to be replicated, and its outcome is determined by random chance. Participants were tasked with predicting the outcome of a 7-sided die roll (sides 1,2,3,4,5,6,7). Participants chose between two prediction methods: one that always predicts "4" (constant), and another that chooses a random number between 1 and 7 (similar). Participants learned that they would receive a linearly increasing bonus depending on the difference between their prediction and the actual outcome ($0.21 for a perfect prediction, -$.03 for each unit of error). With this payment scheme, choosing "4" (i.e. the constant method) offers the highest possible return in expectation. Thus, choosing the similar method instead of the constant method is costly. However, we found that a substantial proportion of participants (44.5%) chose the similar method. Even among participants who passed a comprehension check by reporting that choosing "4" produced the highest expected earnings, 36.8% chose the similar method, which suggests that consumers' preference for a similar method is not due to ignorance.

In Studies 2 and 3, we found that the more similar a prediction method is to the event in question, the more people like it. In study 2, we offered participants a choice between two randomly selected methods out of a set of three: the similar and constant options from Study 1, and a "mixed" option that was a combination of the two. The mixed option used the similar method with a probability of 50% and the constant method with a probability of 50%. Participants were more likely to select the similar method both when the alternative was the constant method (58%) and the mixed method (56.2%). In Study 3, we show that method similarity can be increased along multiple dimensions. Specifically, we hypothesized that participants would prefer a method that uses the same process as the event (rolling a die instead of drawing a marble) in addition to matching the outcome distribution. Participants rated the constant method and 4 methods that varied on their proximity to the event being predicted (a fair 7-sided die roll) on 5-point scales: rolling a die that is skewed towards the optimal answer (process resemblance), drawing a marble with values 1-7 from a jar (outcome resemblance), rolling a die with the same numbers as the focal die (perfect resemblance), and drawing a marble with values skewed towards the optimal answer (no resemblance). Participants also rated the similarity of each prediction method to the event being predicted on two 5-point scales. Consistent with our hypothesis, participants rated the prefect resemblance method higher than all other methods (t's(404)≥ 7.16, p's<.001). Further, participants ratings of the similarity between

each method and the focal die roll mediate the differences in method ratings [10.29,35.99]. These results suggest that the more similar a prediction method is to the event in question, the more people like it.

In the remaining studies, we extend these findings to real-world consumer scenarios. In study 4, participants made an incentivized choice between two prediction methods to predict a consumer's rating of a movie. Participants chose between a similar method that finds the person who gave the most similar responses to the focal consumer in a survey of movie preferences and uses their rating, and an alternative that uses the average rating of the movie among all consumers. 71% of participants chose the similar method even though it performs 1.5 times worse than the alternative. In study 5, participants preferred a navigation tool that based a travel time prediction on the most similar trip in its data over another that averaged among many somewhat similar trips. In follow up studies (Studies 6 and 7), we investigate how companies can frame the prediction methods that they offer consumers to be more similar to the event in question.

People's systematic preference for similar prediction methods provides novel insight into consumer decision making, and suggests interventions to boost consumers' use of a prediction method. For example, it suggests that framing a prediction method as similar to the event in question will make it more palatable to consumers, which can help companies boost the use of prediction methods that they offer consumers (e.g. recommendation systems, calculators, etc.).

Stress, Addiction, and Artificial Intelligence

EXTENDED ABSTRACT

About 90.2% of people suffering from mental illness worldwide do not receive adequate treatment (Alonso et al. 2018). A solution to this problem is therapy powered by artificial intelligence (AI), which is scalable at a low cost, convenient, and private. Are consumers open to adopting AI to manage their mental health? We first investigate if consumers would choose an AI adviser over other types of human advisers present in the marketplace to treat anxiety and stress (Studies 1a-e). We find that consumers are averse to choosing an AI provider to manage their mental health. We replicate our finding in a highly stigmatized context—porn addiction (Study 2)—and using additional dependent variables, such as willingness to pay and sharing intentions (Studies 3 & 4). We argue that perceptions of warmth shape consumers' aversion to AI mental health providers: AI (vs. human) providers were perceived as less warm, which harmed their perceived competence, resulting in higher aversion.

In Study 1a, we asked college students to fill out a survey about stress-related resources. After reflecting on an instance in which they experienced academic stress, participants were offered three types of advisers to choose from to help them improve how they deal with stress. Descriptions for all three advisers were based on real-world descriptions. We scrapped the top 500 Google search results for mental health care providers, and two independent coders catalogued the providers into 5 categories. Three types of advisors—clinical, integrative, and virtual/AI—together form more than 80% of the market. We thus focus on these three types of mental health providers. The first was a clinical adviser with an MD from the university, who has published peer-reviewed articles on stress. The second was an integrative adviser, a life coach who has triumphed over dealing with stress. The third was a virtual adviser powered by artificial intelligence; the order of these advisers was counterbalanced. We find that only 5.4% of the participants chose the AI adviser ($\chi^2 = 59.14$, *p-value<0.001*), compared to 64.9% choosing the integrative adviser and 29.7% choosing the clinical adviser.

We replicate this finding in a variety of different stress domains (Studies 1b-e). We consistently find that the AI adviser is dominated by the two other advisers. The percentage of participants choosing an AI adviser ranges from 5.41% (academic/relationship stress) to 20.99% (financial stress).

In Study 2, we investigate consumers' choice of mental health adviser in a high-stigma context: porn addiction, which has harmful consequences such as cognitive decline and isolation (Alarcón et al. 2019). We recruited men who watch at least 5 hours of porn per week (2 SD higher than average). We provided these participants with an article that described the negative consequences of porn overuse and asked them to choose which of the three advisers they would consider discussing their porn consumption habits with. Similar to the results above, we find that the AI adviser is dominated by the two other choices ($\chi^2 = 12.6$, *p-value<0.001*). Interestingly, the percentage of participants willing to choose the AI adviser was higher (23%) than in the stress-related domains we tested.

In Study 3, participants were told about a new service in which customers share symptoms with a (virtual vs. human) doctor who diagnose if they have common mental health disorders, such as depression and anxiety. Participants then reported their willingness to pay for the service. We found that participants in the AI condition reported a lower willingness to pay compared to the human condition (= -2.8, $t(402)$ = -2.8, p = .005). Importantly, we found support for our proposed serial mediation model, such that an AI (vs. human) provider was associated with lower perceived warmth, which lowered the perceived competence of the provider, thereby leading to lower willingness to pay for the service (indirect effect = −.91, SE = .27, 95% CI [−1.44, −.39]). As a robustness check, we included uniqueness neglect as a parallel mediator in the model and found that, while the indirect effect through warmth and competence remained significant (indirect effect = −.89, SE = .26, 95% CI [−1.40, −.38]), the indirect effect through uniqueness neglect was not significant (indirect effect = −.012, SE = .048, 95% CI [−.11, .082]), suggesting that uniqueness neglect did not affect consumers' willingness to pay for mental health providers in this context.

In Study 4, participants were first asked to reflect on a recent time they experienced financial stress. Participants were then presented with a [virtual] mental health coach [powered by artificial intelligence] that could help them deal with stressful situations. To ensure that consumers' AI aversion generalized across other dependent variables of importance to marketers, we included a measure of participants' intent to share information about the provider with others. Consistent with Study 3, we found that participants in the AI (vs. human) condition reported a lower willingness to pay (β = −2.56, $t(498)$ = −3.23, p = .001) and a lower interest in sharing information about this provider with others (β = −.39, $t(498)$ = −2.05, p = .041). Importantly, perceptions of warmth again mediated the effect of provider on perceived competence, which in turn influenced participants' willingness to pay (indirect effect = −.83, SE = .30, 95% CI [−1.42, −.23]) and sharing intentions (indirect effect = −.41, SE = .07, 95% CI [−.55, −.28]).

Overall, we found that consumers are reluctant to use AI mental health advisers, and that perceptions of warmth played an important role in shaping consumers' preference for a mental health provider. AI (vs. human) providers were judged as less warm, which harmed their perceived competence, and resulted in higher aversion. We replicated this finding across different types of mental health domains, such as stress and addictive behaviors (e.g. porn addiction), across experimental paradigms (within-subject and between-subject), and across dependent variables (choice, willingness to pay, and sharing intentions).

Experts Outperform Technology in Creative Markets

EXTENDED ABSTRACT

Recent decades have seen an increase in machines and other technological advancements coopting jobs from humans (Autor 2015; Brynjolfsson and McAfee 2014; Hosanagar 2019). Notably, in many cases algorithms or technology based on training from initial human inputs can outperform humans (see Dawes et al. 1989; Dietvorst et al. 2015, 2016). Once thought unlikely, the machines have become dominant in games of human skill such as Jeopardy, chess, and Go (Hosanagar 2019).

Recently, there has been discussion of technology based on artificial intelligence supplanting workers (Lohr 2018; Peiser 2019). While this replacement is argued to occur more for lower-skilled jobs (Autor 2015; Mokyr et al. 2015) and is expected more for jobs involving thinking (Waytz and Norton 2014), there have also been market entrants from artificial intelligence in domains that are typically considered to require the human spark of creativity (Rand 1968). For example, for logos design, sites such as logomaster.ai and Wix offer affordable artificial intelligence builders for logos. Like with human experts, these artificial intelligence makers present people with multiple initial design concepts from which they can choose, and they allow for iteration and revision on the initial concept they like most (Goodwin 2009).

Does artificial intelligence outperform human experts in creative markets, such as in logo design? To explore this question, we run two logo elicitation studies (Studies 1 and 2) in which subjects worked with artificial intelligence and/or human expert designers, and then run seven follow-up studies (Studies 1a-1d and 2a-2c), using both ratings and incentivized choice, in which an external set of participants evaluate the quality of the logos.

Importantly, we align the logo design process in the two logo elicitation studies. In each, participants start with a creative brief, have a designer selected for them or by them, see at least two initial concepts for a logo, and then go through a revision process before arriving at a final logo. In Study 1, we impose more experimental control by providing a fixed set of creative briefs for three (fictitious) companies (the data science company Empirical, the fashion company Forward, and a restaurant Hyperion) and assigning participants to work with either human experts or artificial intelligence logo makers, both of which provide initial concepts and a revision process. In Study 2, with a separate set of participants we allow for more natural design by having participants write creative briefs for a company (ONAK, an origami canoe company), and then let them work both with one human expert designer of their choice and one artificial intelligence logo maker. Study 1 yielded 17 human expert logos and 30 artificial intelligence logos, while Study 2 yielded 62 logos (31 human expert, 31 artificial intelligence). In Study 1, the participants were MBA students enrolled in a new product development course; in Study 2, the participants were managers enrolled in an evening MBA program.

In Study 1a, we first seek overall evaluations on the logos from Study 1 using external raters. Amazon Mechanical Turkers evaluated all of the logos from one of the three companies (Empirical, Hyperion, or Forward) from Study 1 on a seven-point scale (1 = Very Bad, 7 = Very Good). Importantly, this evaluation was blind to whether the logos were produced by artificial intelligence or human experts (see Dietvorst et al. 2015). Across all three companies, relative to artificial intelligence logos, human expert logos were evaluated more favorably ($F(1, 287) = 222.78$, $p < .001$). In Study 1b, human expert designers with at least fourteen years industry experience evaluated all logos and showed directionally consistent results.

In Study 1c, we replicate Studies 1a and 1b but with additional ratings designed to determine what dimensions the human expert logos exceeded artificial intelligence logos on. Undergraduates in a design course completed the procedure from Study 1a and also rated to what extent the logos conveyed the company's industry, were aesthetically pleasing, and were unique. In addition to replicating Study 1a on overall evaluations ($F(1, 144) = 131.92$, $p < .001$), human expert logos were also evaluated, relative to artificial intelligence, to convey the company's industry better ($F(1, 144) = 290.20$, $p < .001$), to be more aesthetically pleasing ($F(1, 144) = 51.85$, $p < .001$), and to be more unique ($F(1, 144) = 57.40$, $p < .001$).

In Study 1d, we conceptually replicated the previous studies with incentivized choice with a set of west coast laboratory participants. That is, participants were informed that those participants who chose the logo that was selected most often would be eligible for a $50 Amazon Gift card as a prize. Consistent with the previous studies, participants chose logos produced by human experts more often than would be expected by chance ($z = 8.49$, $p < .001$).

Study 2a replicates Study 1a on the 62 logos produced for ONAK using Amazon Mechanical Turkers. Again, compared with the artificial intelligence logos, the human expert logos were evaluated more favorably ($F(1, 394) = 114.47$, $p < .001$). Further, Study 2b replicated Study 1c on overall evaluations (i.e., human expert logos were judged to be better than artificial intelligence logos) with a set of west coast laboratory participants ($F(1, 423) = 170.40$, $p < .001$).

Finally, Study 2c attempts to replicate Study 1d on choice with a sample of west coast laboratory participants. When choosing among logos for ONAK, participants were only marginally more likely to select logos produced by human experts ($z = 1.95$, $p = .051$).

Overall, using two types of logo elicitation methods, we find that logos from human experts outperform those from artificial intelligence. This advantage may result from human expert logos being superior on aesthetics and clarity. However, subsequent coding and analyses revealed that those managers in Study 2 who invested more effort into their creative briefs (based on an expert designer coding the strength of each brief) had more favorably evaluated artificial intelligence logos, which might mean that the advantage to human experts may disappear with more experience or clarity of what is desired from the design process.

REFERENCES

Alarcón, Rubén de, Javier de la Iglesia, Nerea Casado, and Angel Montejo (2019), "Online Porn Addiction: What We Know and What We Don't—A Systematic Review." *Journal of Clinical Medicine* 8 (1), 91.

Alonso, Jordi, Zhaorui Liu, Sara Evans-Lacko, Ekaterina Sadikova, Nancy Sampson, Somnath Chatterji, Jibril Abdulmalik, et al. (2018), "Treatment Gap for Anxiety Disorders Is Global: Results of the World Mental Health Surveys in 21 Countries." *Depression and Anxiety* 35 (3), 195–208.

Arkes, Hal R., Robyn M. Dawes, and Caryn Christensen (1986), "Factors influencing the use of a decision rule in a probabilistic task," *Organizational behavior and human decision processes,* 37 (1): 93-110.

Autor, David H. (2015), "Why Are There Still So Many Jobs? The History and Future of Workplace Automation," *Journal of Economic Perspectives*, 29 (3), 3-30.

Blanco, Carlos, Mayumi Okuda, Crystal Wright, Deborah S. Hasin, Bridget F. Grant, Shang-Min Liu, and Mark Olfson (2008), "Mental Health of College Students and Their Non–College-Attending Peers: Results from the National Epidemiologic Study on Alcohol and Related Conditions," *Archives of General Psychiatry* 65 (12), 1429.

Brynjolfsson, Erik, and Andrew McAfee (2014), *The Second Machine Age: Work Progress, and Prosperity in a Time of Brilliant Technologies*.

Castelo, Noah, Maarten W. Bos, and Don R. Lehmann (2019), "Task-Dependent Algorithm Aversion," *Journal of Marketing Research*, 56 (5), 809−25.

Dawes, Robyn M., David Faust, and Paul E. Meehl (1989), "Clinical Versus Actuarial Judgment," *Science*, 243 (4899), 1668-74.

Dietvorst, Berkeley J., Joseph P. Simmons, and Cade Massey (2015), "Algorithm Aversion: People Erroneously Avoid Algorithms After Seeing Them Err," *Journal of Experimental Psychology: General*, 144 (1), 114−26.

Dietvorst, Berkeley J., Joseph P. Simmons, and Cade Massey (2016), "Overcoming Algorithm Aversion: People Will Use Imperfect Algorithms If They Can (Even Slightly) Modify Them," *Management Science*, 64 (3), 1155-70.

Ferrari, Francesco, Maria Paola Paladino, and Jolanda Jetten (2016), "Blurring Human–Machine Distinctions: Anthropomorphic Appearance in Social Robots as a Threat to Human Distinctiveness," *International Journal of Social Robotics* 8 (2), 287–302.

Fox, Craig R., and Gülden Ülkümen (2011), "Distinguishing two dimensions of uncertainty," *Perspectives on thinking, judging, and decision making*, 21-35.

Goodwin, Kim (2009), *Designing for the digital age: How to create human-centered products and services*. John Wiley & Sons.

Grove, William M., David H. Zald, Boyd S. Lebow, Beth E. Snitz, and Chad Nelson (2000), "Clinical Versus Mechanical Prediction: A Meta-analysis," *Psychological Assessment*, 12 (1), 19-30.

Halperin, Keith, C. R. Snyder, Randee J. Shenkel, and B. Kent Houston (1976), "Effects of Source Status and Message Favorability on Acceptance of Personality Feedback," *Journal of Applied Psychology*, 61 (1), 85−88.

Hoehl, Stefanie, Stefanie Keupp, Hanna Schleihauf, Nicola McGuigan, David Buttelmann, and Andrew Whiten (2019), "'Over-imitation': A review and appraisal of a decade of research," *Developmental Review*, 51, 90-108.

Hosanagar, Kartik (2019), *A Human's Guide to Machine Intelligence: How Algorithms Are Shaping Our Lives and How We Can Stay in Control*.

Hunt, Justin, and Daniel Eisenberg (2010), "Mental Health Problems and Help-Seeking Behavior Among College Students," *Journal of Adolescent Health*, 46 (1), 3–10.

Leung, Eugina, Gabriele Paolacci, and Stefano Puntoni (2018), "Man versus machine: Resisting automation in identity-based consumer behavior," *Journal of Marketing Research*, 55 (6), 818-31.

Logg, Jennifer M., Julia A. Minson, and Don A. Moore (2019), "Algorithm Appreciation: People Prefer Algorithmic to Human Judgment," *Organizational Behavior and Human Decision Processes*, 151, 90−103.

Longoni, Chiara, Andrea Bonezzi, and Carey Morewedge (2019), "Resistance to Medical Artificial Intelligence," *Journal of Consumer Research,* 46 (4), 629–50.

McGuigan, Nicola, Jenny Makinson, and Andrew Whiten (2011), "From over-imitation to super-copying: Adults imitate causally irrelevant aspects of tool use with higher fidelity than young children," *British Journal of Psychology*, 102 (1), 1-18.

McQueen, Amy, and William M. P. Klein (2006), "Experimental Manipulations of Self-Affirmation: A Systematic Review," *Self and Identity* 5 (4), 289–354.

Meltzoff, Andrew N., and M. Keith Moore (1977), "Imitation of facial and manual gestures by human neonates," *Science*, 198 (4312), 75-78.

Mokyr, Joel, Chris Vickers, and Nicolas L. Ziebarth (2015), "The History of Technological Anxiety and the Future of Economic Growth: Is This Time Different?," *Journal of Economic Perspectives*, 29 (3), 31-50.

Rand, Paul (1968), The Designer's Problem. *A Designer's Art*. Yale University Press.

Sontag-Padilla, Lisa, Michael S. Dunbar, Feifei Ye, Courtney Kase, Rebecca Fein, Sara Abelson, Rachana Seelam, and Bradley D. Stein (2018), "Strengthening College Students' Mental Health Knowledge, Awareness, and Helping Behaviors: The Impact of Active Minds, a Peer Mental Health Organization," *Journal of the American Academy of Child & Adolescent Psychiatry* 57 (7), 7500−7.

Steele, Claude M. (1988), "The Psychology of Self-Affirmation: Sustaining the Integrity of the Self." In *Advances in Experimental Social Psychology*, edited by Leonard Berkowitz, 21, 261–302.

Waytz, Adam, and Michael I. Norton (2014), "Botsourcing and Outsourcing: Robot, British, Chinese, and German Workers Are for Thinking—Not Feeling—Jobs," *Emotion*, 14 (2), 434−44.

Yeomans, Michael, Anuj Shah, Sendhil Mullainathan, and Jon Kleinberg (2019), "Making Sense of Recommendations," *Journal of Behavioral Decision Making,* 32, 403-414.

Rejecting over Choosing: The Unknown Strengths of the Reject Frame

Chair: Adelle X. Yang, National University of Singapore, Singapore

Paper #1: Decision Diagnosticity: Rejecting Induces a Larger Post-Decision Evaluation Gap Than Choosing

Adelle X. Yang, National University of Singapore, Singapore
Jasper Teow, National University of Singapore, Singapore

Paper #2: "Swipe Left for No": Why Options That Survive Rejection Lead to Greater Purchase

Jen H. Park, Stanford University, USA
Itamar Simonson, Stanford University, USA

Paper #3: Rejections Are Stickier than Choices

Minzhe Xu, University of Florida, USA
Yang Yang, University of Florida, USA

Paper #4: When More Is Less: How Rejecting (vs. Selecting) Food Ingredients Leads to Lower Estimates of Calories

Ali Besharat, University of Denver, USA
Marisabel Romero, Colorado State University, USA
Kelly L. Haws, Vanderbilt University, USA

SESSION OVERVIEW

Many consumer decisions can be reached by either choosing preferred options, or rejecting less preferred options. While prior research has established that framing a decision as choosing versus rejecting influences the decision-making process, much of the previous studies focuses on how decision framing produces inconsistent decision outcomes that violate the principle of procedural invariance (e.g., Dhar and Wertenbroch 2000; Shafir 1993; Sokolova and Krishna 2016). By contrast, the downstream consequences of choose versus reject framing, beyond the decision outcomes, have been relatively underexplored.

This special session presents four papers that examine interesting consequences of decision framing, and highlight previously unexamined strengths of the reject frame over the choose frame. Each paper uncovers an important consumer-relevant consequence of decision framing, from post-decision preference updating (paper 1), satisfaction and purchase likelihood (paper 2), variety seeking in repeated consumption (paper 3), and perceptions of consumption outcomes (paper 4).

Yang and Teow examine how decision framing influences post-decision preference updating. They find the reject frame leads to a bigger post-decision evaluation gap between the wanted and unwanted options, compared with the choose frame, a finding attributable to the act of rejecting being perceived as more diagnostic than the act of choosing. This effect was mitigated when the focal decision induced a high level of decision difficulty, and reversed when all options were negatively-valenced.

Park and Simonson test how the availability of an explicit rejecting procedure in sequential evaluation influences psychological closure and subsequent consequences. They demonstrate that, being able to explicitly reject options, such as "swipe left to reject," heightens evaluation closure over the forgone options compared with when the decision procedure involves implicit rejection procedures only. Consequently, when explicit rejection is allowed, it increases the likelihood of subsequent purchase.

Xu and Yang investigate the effect of decision framing on variety-seeking behaviors in repeated decisions. Their experiments reveal that, consumers seek less variety when the repeated decisions are framed as rejecting than choosing, because rejecting reduces the liking of the less preferred options, and hence renders the preferred

options "stickier" in subsequent decisions. The rejecting procedure can thus be adopted to mitigate variety-seeking tendencies that impede consumer welfare.

Besharat, Romero, and Haws find that the choose versus reject frames can influence the perception of customized products in the context of food ordering. Their studies demonstrate that the rejecting procedure (i.e., eliminating ingredients) leads consumers to estimate the customized food as containing fewer calories and being healthier than the choosing procedure (i.e., selecting ingredients), which also induces positive changes in intended future consumption and the type of subsequent consumption.

Together, this special session sheds new light on when and how decision framing can be adopted to influence important post-decision consequences.

Decision Diagnosticity: Rejecting Induces a Larger Post-Decision Evaluation Gap Than Choosing

EXTENDED ABSTRACT

A decision can be framed as either choosing wanted options or rejecting unwanted options in a consideration set. For example, when managers make a hiring decision between two job candidates, the decision may be posed either as "Which candidate would you recommend to accept?" or "Which candidate would you recommend to reject?" While the difference between the two decision frames may appear nominal, research shows that framing a decision as choose versus reject produces systematically different decision outcomes and consequences (Dhar and Wertenbroch 2000; Shafir 1993; Nagpal and Krishnamurthy 2008; Perfecto, Galak, Simmons, and Nelson 2017; Sokolova and Krishna 2016).

In this research, we examine how decision framing affects choice-induced preference changes. Six pre-registered experiments ($N = 3,412$) show that when a decision is framed as rejecting unwanted options, it leads to a larger post-decision evaluation gap between the wanted and unwanted options, than when the decision is framed as choosing wanted options. Building on self-perception theory (Bem 1972), and previous findings that rejecting tends to invoke greater processing depth (e.g., Nagpal and Krishnamurthy 2008; Sokolova and Krishna 2016) and greater attitude strength (Bizer and Petty 2005; Bizer, Larsen, and Petty 2011), we propose that people perceive rejecting as more diagnostic of one's true underlying preferences. Across the studies, we find process evidence consistently supporting the role of decision diagnosticity underlying the effect.

The studies followed a similar basic paradigm, with participants randomly assigned into 2 (choose vs. reject) between-subjects conditions. Each participant was simultaneously presented with two or more options, and asked to either choose the wanted option(s) or reject the unwanted option(s). After their decision, participants were asked to evaluate each option. We calculated the post-decision evaluation gap by taking the difference between their evaluation of the wanted option(s) and their evaluation of the unwanted option(s).

Study 1 ($N = 256$) established the effect with a pair of visually different consumer products (smartphone cases). Participants' post-decision evaluation gap was larger after the rejecting decision than after the choosing decision ($M_{choose} = 2.08$, $SD = 1.87$ vs $M_{reject} = 3.02$, $SD = 2.78$, $F(1, 254) = 10.14$, $p = .002$, $\eta_p^2 = .04$). Moreover, we measured the perceived decision diagnosticity, decision difficulty, and decision finality associated with each option, and found that decision

diagnosticity best accounted for the effect: rejecting was perceived as more diagnostic of one's true underlying preferences than choosing (M_{choose} = 5.56, SD = 2.09 vs M_{reject} = 6.12, SD = 2.31, $F(1, 254)$ = 4.20, p = .042), which induced more post-decision preference updating (indirect effect in mediation analysis = -.282, $CI_{95\%}$ = [-.57, -.01]). The other process measures only partially contributed to the effect, and choice share of the options did not differ between conditions. Similar results on the process measures were observed in later studies.

Study 2a (N = 308) replicated this effect with consumer products that were presented with descriptions of multiple attributes, to be more in line with related prior research (e.g., Meloy and Russo 2004). Replicating our initial findings, participants' post-decision evaluation gap was larger after the rejecting decision than after the choosing decision (M_{choose} = 2.00, SD = 2.53 vs M_{reject} = 2.94, SD = 2.81, $F(1,306)$ = 9.54, p = .002, η_p^2 = .03), and decision diagnosticity mediated the effect (indirect effect = -.275, $CI_{95\%}$ = [-.56, -.01]). In addition, decision difficulty moderated this effect (2-way ANOVA $F(1,304)$ = 6.47, p = .011): the framing effect was attenuated when the participants perceived a high level of decision difficulty (> 4.4, the Johnson-Neyman value), which impeded the self-inferential process that lead to post-decision preference updating. The effect was also replicated in study 2b (N = 875) with visually different photographs.

Next, study 3 (N = 461) expanded the generalizability of this effect by crossing the framing manipulation (choose vs reject) with the size of the choice set: (picking 1/2 vs 2/4 paintings). The effect generalized to both the 1/2 and 2/4 conditions: participants' post-decision evaluation gap was marginally larger after the rejecting decision than after the choosing decision (M_{choose} = 2.50, SD = 1.62 vs M_{reject} = 2.80, SD = 2.33, $F(1,457)$ = 2.78, p = .096), regardless of the size of the choice set, which had a separate main effect ($M_{1/2}$ = 2.30, SD = 2.2, $M_{2/4}$ = 2.99, SD = 1.73; $F(1,457)$ = 2.08, p < .001), and did not significantly interact with framing ($F(1,457)$ = 2.07, p = .151).

Study 4 (N = 1,051) revealed that the effect reversed when the options were negatively valenced instead of positively valenced (2-way ANOVA: $F(1,1047)$ = 6.5, p = .011, η_p^2 = .01), consistent with prior findings supporting a compatibility effect between framing and attribute valence (e.g., Nagpal and Krishnamurthy 2008; Perfecto, Galak, Simmons, and Nelson 2017; also see Tversky et al. 1988).

Study 5 (N = 461) replicated the effect when participants explicitly expressed their preference before the decision (M_{choose} = 2.81, SD = 2.14 vs M_{reject} = 3.49, SD = 2.43; $F(1,457)$ = 5.31, p = .022, η_p^2 = .01; overall main effect $F(1,457)$ = 4.52, p = .034, η_p^2 = .01). Thus, the effect was not contingent on existing preference uncertainty.

Last, we explored the potential influence of the weak axiom of revealed preference (WARP) across these studies. When treating violation of WARP (i.e., choosing A over B, yet rating A lower than B) as an attention failure, we screened out participants who had internally inconsistent choice and preferences, and compared their results with those previously reported. This comparison allowed us to examine if the findings were attributable to an alternative explanation: if participants were more impelled to appear consistent after the rejecting procedure than the choosing procedure. The ratio of inconsistent responses was low (6% on average) and similar between choose and reject conditions. Moreover, this screening did not significantly affect the main results. In sum, the reject frame enlarges the post-decision evaluation gap primarily because of greater preference diagnosticity perceived in reject decisions.

"Swipe Left for No": Why Options That Survive Rejection Lead to Greater Purchase

EXTENDED ABSTRACT

Most alternatives considered by decision makers are rejected or not chosen, yet the manner in which individuals pass on alternatives has not received much attention. In social apps like Tinder, users "swipe left" to make an explicit rejection before proceeding to the next match, while interviewers often pass on a job candidate rather implicitly by looking at the next candidate. Despite the common use of rejection strategies in everyday life, little research has examined how individuals make rejections and the psychological consequences of rejection.

We suggest that having the option to explicitly reject each alternative during sequential evaluation increases subsequent purchase from the narrowed set, largely due to the feeling of "evaluation closure." Building on prior literature on psychological closure (Gu, Botti, and Faro 2013), we propose "evaluation closure"— the state experienced by consumers when their evaluation is perceived to be complete—as a key driver of determining whether consumers proceed to the next phase of decision-making: making a purchase. We test in four experiments the predicted difference between options that survive explicit rejection (e.g., add-or-reject) and those identified through implicit rejection (e.g., add-only). The implications of this research are discussed with respect to our understanding of evaluation modes in the current information environment.

Study 1 (N = 296) tested the effect of explicit rejection during sequential evaluation on purchase. Participants reviewed 10 paintings and indicated their liking of each painting. In the *like-only* condition, participants were asked to "swipe right" (drag the slider to the right) for the paintings that they liked before moving onto the next painting. In the *like-or-dislike* condition, participants had to not only "swipe right" on the paintings that they liked but also "swipe left" on the paintings that they did not like. Then, participants indicated their purchase likelihood ("Assuming that the price is reasonable, would you buy any of the 10 paintings that you have just evaluated?"). Results revealed that participants who made explicit rejections were more likely to purchase a painting than those who did not make rejections ($M_{like-or-dislike}$ = 91.7% vs. $M_{like-only}$ = 84.4%), $\chi^2(1)$ = 3.80, p = .051.

In Study 2 (N = 605), we extended the rejection effect to non-binary purchase intentions and added another condition (i.e., *dislike-only*) to further delineate the effect of rejection. Participants were randomly assigned to one of three conditions (*like-only, like-or-dislike, and dislike-only*) and engaged in the sequential evaluation task as in Study 1; participants in the *dislike-only* condition were instructed to "swipe left" to reject the paintings and proceed to the next painting if otherwise. Then, participants reported their overall satisfaction with the paintings that survived the evaluation (1 = *Not at all*, 7 = *Very much*). We found that compared to participants who did not make explicit rejections ($M_{like-only}$ = 5.94), those who had the option to reject each painting reported greater satisfaction ($M_{like-or-dislike}$ = 6.22, $M_{dislike-only}$ = 6.15), p = .008. This effect persisted even after controlling for the number of surviving paintings, p = .007.

Study 3 (N = 320) extended the effect to the shopping cart context and captured evidence of "evaluation closure." Participants evaluated nine microwaves one at a time and decided whether to add each microwave to their cart. While the button to add microwaves ("add this item to shopping cart") remained the same, the button to reject before looking at the next microwave differed across three conditions: "reject this item" (explicit rejection condition), "look at other items" (implicit rejection), no button (add-only). After

reviewing all microwaves, participants reported how much closure they had experienced and decided whether they would purchase any microwave from their cart. Consistently, participants who made explicit rejections were more likely to make a purchase from their cart ($M_{\text{reject this item}}$ = 92.8%) compare to those who did not make such rejections ($M_{\text{look at others}}$ = 88%; $M_{\text{add-only}}$ = 86.7%), p = .039. Importantly, participants also reported feeling greater closure over their evaluations after making explicit rejections ($M_{\text{reject this item}}$ = 4.75) vs. implicit rejections ($M_{\text{look at others}}$ = 4.02; $M_{\text{add-only}}$ = 3.91), $t(317)$ = 3.40, p = .001.

Study 4 (N = 394) examined the effect of rejection on purchase likelihood in a free search task whereby participants viewed as many or as few alternatives as they wished. Participants reviewed an unknown number of $25 gift cards that differed in their brands, and we used the stopping point (i.e., the number of cards participants reviewed before terminating their search) as an indicator of the evaluation completion; at any point during this task, participants could end their evaluation by clicking the checkout button. To ensure that participants treated their evaluation as consequential, they were entered into a lottery to win the gift card of their final choice. Similar to Study 3, the button to reject each card was labelled as either an explicit rejection ("reject this item") or an implicit rejection ("look at other items"). Finally, when participants reached their checkout, they could choose a gift card option in their cart or defer (i.e., receive a bonus payment of $10 instead). Results showed that making explicit rejections led to earlier stopping points after evaluating fewer cards ($M_{\text{reject this item}}$ = 28.64) compared to making implicit rejections ($M_{\text{look at other items}}$ = 31.07), $t(392)$ = 2.02, p = .044. As expected, participants who passed on gift cards through explicit (vs. implicit) rejections were more likely to commit to an option from their "rejection survivors" rather than to defer ($M_{\text{reject this item}}$ = 89.9% vs. $M_{\text{look at other items}}$ = 84.2%), $\chi^2(1)$ = 2.86, p = .091. Importantly, this effect remained after controlling for the number of evaluated options (B = .62, Wald's $\chi^2(1$, N = 394) = 3.86, p = .050).

In four studies, we demonstrate that explicit rejection during a sequential evaluation of alternatives can increase consumers' choice commitment (e.g., purchase) to the "rejection survivors." Overall, this research has not only theoretical implications for understanding rejection motivations but also practical implications for marketers to recapture online consumers' commitment.

Rejections Are Stickier than Choices

EXTENDED ABSTRACT

Consumers often make the same decision repeatedly, ranging from which product to buy, which restaurant to visit, to which song to listen to. A prominent pattern in repeated decisions is variety-seeking—instead of sticking to their favorite option, consumers tend to alternate between different options due to satiation (Inman 2001; McAlister 1982), preference uncertainty (Kahneman and Snell 1992; Simonson 1990), information-seeking (McAlister and Pessemier 1982), need for stimulation (Huang et al. 2019; Menon and Kahn 1995), or merely for the sake of variety (Ratner, Kahn, and Kahneman 1999).

Although existing literature on variety-seeking has enriched our understanding of when and why people seek variety, it predominantly focuses on choices when eliciting consumer preferences, asking participants to make decisions by choosing what they like more. This focus on choices, however, may not fully capture what happens in the real world where it is equally likely that consumers make decisions by rejecting what they like less (Perfecto et al. 2017; Shafir 1993; Sokolova and Krishna 2016). The current research investigates whether choosing versus rejecting influences the degree of variety-

seeking. Imagine, for instance, you need to decide which restaurant to go to for lunch every day. Would you be more likely to stick to your favorite restaurant if you decide by choosing or rejecting?

Across five studies and a wide range of product decisions, we find that rejections are stickier than choices—consumers tend to seek less variety across repeated decisions when the decisions are framed as rejections (vs. as choices). This effect occurs because the act of rejecting has an asymmetric effect on one's preference for different options: while it does not influence the liking of the more-preferred option(s), it significantly reduces the liking of the less-preferred option(s). As a result, the act of rejecting broadens the liking gap between options, increasing one's likelihood of selecting the more-preferred option(s) in future decisions.

Study 1 (N=111) tested our hypothesis in a natural setting involving real decisions. Specifically, participants made two snack decisions—they first selected a snack to eat at the end of the lab session, and then selected a snack to take home. Participants made these two decisions by either choosing or rejecting between snacks. We found that participants who rejected between snacks sought less variety than those who chose between snacks (5% vs. 36%, $\chi^2(1)$=15.47, p<.001) because the act of rejecting reduced the liking of the less-preferred snack (3.07 vs. 3.82, $F(1, 109)$=7.37, p=.008; 95% CI=[.036, .501]).

Study 2 (N=400) tested whether our framing effect is attributable to the increased level of deliberation associated with rejections. Specifically, participants imagined that they were using a meal kit service and needed to select three out of six recipes each week for the upcoming two weeks. We orthogonally manipulated framing and the amount of deliberation by asking participants to either deliberate or not before they made choice or rejection decisions. We found that 1) deliberation did not moderate our effect ($F(1, 396)$ = .79, p = .374); 2) participants who removed three less-preferred recipes (i.e., rejecting) sought less variety, compared with those who added three preferred recipes (i.e., choosing; switches: 1 vs. 1.42, $F(1, 398)$=18.43, p<.001); 3) the liking of the less-preferred recipes mediated the framing effect on variety-seeking (95% CI=[.058, .167]).

Study 3 (N=301) replicated the framing effect in real decisions involving real consumption experiences, and demonstrated an interesting boundary condition. Participants were told that they would view one of two photos across five iterations. During each iteration, they decided which photo to view and then viewed the selected photo for 10 seconds. Critically, this study included three conditions: choosing, rejecting, and a new choosing-and-rejecting condition where participants indicated which option they would choose and which option they would reject simultaneously. Replicating our previous findings, participants in the rejecting condition sought less variety than those in the choosing condition (switches: 1.84 vs. 2.28, $F(1, 298)$=6.19, p=.013). Interestingly, the newly added choosing-and-rejecting condition yielded the same pattern as the choosing condition (switches: 2.19 vs. 2.28, $F(1, 298)$=.26, p=.610).

Study 4 (N=404) further tested the generalizability of our effect by manipulating option valence. Participants imagined that they had to consume a serving of sparkling water on each of three consecutive days. Half of the participants were asked to either choose or reject among three pleasant flavors (i.e., watermelon, lime, and blueberry), while the other half were asked to either choose or reject among three unpleasant flavors (i.e., buffalo wing, ranch dressing, and clam chowder). Rejecting decreased variety-seeking among both positive (switches: 1.28 vs. 1.84, $F(1, 400)$=24.42, p<.001) and negative options (switches: 1 vs. 1.38, $F(1, 400)$=10.88, p=.001).

Consumers have been found to seek more variety than normatively warranted (Ratner, Kahn, and Kahneman 1999; Read and

Loewenstein 1995; Steffel and LeBoeuf 2014). Study 5 (N=400) aimed to demonstrate that in situations where consumers tend to seek too much variety, framing the decisions as rejections (vs. as choices) will lead to better decisions. This study is incentive compatible. Each participant listed two friends and then selected gifts for either one or both friends. When the gifting decisions were framed as choices, we replicated the overindividuation effect (Steffel and LeBoeuf 2014): while more than 79.8% of participants correctly selected the better-liked gift for either friend individually, only 55.0% of participants selected the better-liked gift for both friends ($\chi^2(1)$=14.34, p<.001). When the gifting decisions were framed as rejections, however, 79.0% of participants selected the better-liked gift for both friends ($\chi^2(1)$=.02, p=.892).

In sum, this research identifies a novel framing effect on variety-seeking and significantly extends the literatures on variety-seeking and decision framing. Practically, it offers recommendations for firms on how to increase market shares and enhance consumer loyalty without incurring additional cost. It also yields implications for consumer welfare: for domains in which consumers typically seek more variety than normatively warranted, framing decisions as rejections can improve decision quality and increase consumer welfare, whereas for domains in which consumers typically seek too little variety, framing decisions as rejections may exacerbate the problem and reduce consumer welfare.

When More Is Less: How Rejecting (vs. Selecting) Food Ingredients Leads to Lower Estimates of Calories

EXTENDED ABSTRACT

Consumers are increasingly interested in customizing their food orders. As such, restaurants often allow customers to tailor their products, but this can be achieved in different ways. For instance, consumers can order a pizza using a "pare-down" approach in which they eliminate undesired ingredients from a specialty pizza or a "build up" approach in which they add desired ingredients to a base product (Coker and Nagpal 2013; Nagpal, Lei, and Khare 2015; Park et al. 2000). An important benefit of these strategies is that they allow consumers to tailor food consumption based not only on taste preferences but also on health considerations.

Prior literature on product customization and decision frames documents how a pare-down, versus a build-up, strategy shifts focus to negative product attributes (Laran and Wilcox 2011; Shafir 1993; Huber, Neale, and Northcraft 1987). Different from the previous discussion, our work focuses on the influence of rejection versus selection customization routes on calorie estimation. Our work proposes that the nature of the customization task can serve as a signal that biases calorie estimation of the final product. For instance, the process of rejecting is considered to be in line with a consumption-limiting mindset (Krishnamurthy and Prokopec 2009). Given that the rejection (vs. selection) approach highlights the food items consumers are avoiding, the process of rejecting (vs. selecting) is more likely to be associated with avoiding immediate pleasure to achieve long-term benefits (Hung and Labroo 2010; Vohs and Baumeister 2016). Thus, the literature suggests that the nature of the rejection (vs. selection) is related with a higher degree of restraint. Moreover, because consumers lack expertise to accurately estimate calories (Burton et al. 2006; Sharpe, Staelin, and Huber 2008), they generally use impressions to infer calorie content (Chandon and Wansink 2007). Given that in the rejection task, consumers focus on the food options that they denied themselves, they may rely on this association to estimate fewer calories in their final product. Furthermore, this calorie underestimation

can have important implications on consumers' desire to visit the restaurant and subsequent food orders.

We test this premise in a series of four studies using various approaches. In all of our studies, we measured calorie estimation by calculating the difference between actual and estimated calories and then dividing by the actual number of calories. Therefore, higher numbers indicate lower estimation of calories.

In Study 1, we utilized a controlled approach that involved a step-by-step customization task designed to be as realistic as possible, holding constant the contents of the final product. Undergraduate students ($n = 133$) were shown either a selection or rejection path to a chicken burrito with shredded cheese, lettuce, and sour cream that another customer was ordering and asked to estimate the final calories. They were provided with calorie counts for the base product and the product with all six possible ingredients included, such that the possible range for the calorie estimation was restricted. Consumers estimated a lower amount of calories in the final product when they were performing a rejection compared to a selection task ($M_{rejection} = 3.19\%$ vs. $M_{selection} = -11.70\%$; $F(1,129) = 9.21$, $p < .01$).

In the next studies, we allow participants to customize their own food product using either a selection or elimination task. Even though the selection of ingredients could vary across conditions, the index of calorie estimation accounts for this difference. In Study 2, students ($n = 190$) built their own nachos that they received at the end of the session through a selection or rejection approach and then estimated calories in the final product. The results of an ANOVA revealed that the rejection (vs. selection) condition led to a lower estimation of calories ($M_{rejection} = 24.44\%$, $M_{selection} = -11.27\%$; $F(1, 172) = 5.54$, $p < .001$; $\eta2= .18$).

Studies 3-4, asked participants to customize their own sandwich and then estimated calories. After customization, participants in Study 3 ($n = 111$) indicated how likely they would be to order food from this restaurant. An ANOVA on the individualized calorie estimation measure revealed that participants in the rejection (vs. selection) task estimated lower calories ($M_{rejection} = 13.18\%$; $M_{selection} = -8.13\%$; $F(1, 102) = 19.22$, $p < .001$; $\eta2= .16$). Furthermore, we found that participants that rejected (vs. selected) ingredients had a higher desire to visit the restaurant ($M_{rejection} = 4.79$; $M_{selection} = 4.18$; $F(1, 102) = 4.02$, $p < .05$; $\eta^2= .04$). We also found a significant indirect effect of calorie estimation on patronage (Hayes 2013; 95% CI = .02, .53).

Study 4 explores the influence of customization on subsequent food choices. Given that a rejection task leads to lower calorie estimates, we expect that they will feel more licensed to eat an unhealthier snack after this process takes place. MTurk panelists ($n = 116$) rejected (vs. selected) ingredients for a sandwich and then estimated calories in the final product. Next, participants indicated how likely they would be to add a cookie to their order (1 = not at all likely, 7 = very likely). An ANOVA on this measure revealed that participants in the rejection (vs. selection) task estimate lower calories ($M_{rejection} = 6.54\%$; $M_{selection} = -7.50\%$; $F(1, 106) = 3.95$, $p < .05$; $\eta2= .04$). Participants in the rejection (vs. selection) task were also more likely to add a cookie to their order after the initial customization occurred ($M_{rejection} = 3.85$; $M_{selection} = 2.98$; $F(1, 106) = 4.38$, $p < .05$; $\eta^2= .04$). We also found a significant indirect effect of calorie estimation on likelihood to order dessert (Hayes 2013; 95% CI = .02, .45).

Across multiple scenarios, we find that a customization task that involves rejecting unwanted ingredients, versus selecting desired ingredients, leads to lower estimation of the caloric intake, even when the final product is exactly the same. As the customization trend continues to grow, consumers are continuously modifying their food orders. Our research provides a deeper understanding of the detri-

mental consequences that a specific food customization process can have on caloric estimation, future food choices, and retail evaluation.

REFERENCES

Bem, Daryl J. (1972). "Self-perception theory." *Advances in Experimental Social Psychology* 6, no. 1 1-62.

Bizer, George Y., and Richard E. Petty. (2005). "How we conceptualize our attitudes matters: The effects of valence framing on the resistance of political attitudes." *Political Psychology* 26, no. 4, 553-568.

Bizer, George Y., Jeff T. Larsen, and Richard E. Petty. (2011). "Exploring the valence-framing effect: Negative framing enhances attitude strength." *Political Psychology* 32, no. 1 59-80.

Burton, S., Creyer, E. H., Kees, J., and Huggins, K. (2006). "Attacking the Obesity Epidemic: The Potential Health Benefits of Providing Nutrition Information in Restaurants." *American Journal of Public Health, 96*(9), 1669-1675.

Chandon, Pierre and Brian Wansink (2007), "The Biasing Health Halos of Fast-Food Restaurant Health Claims: Lower Calorie Estimates and Higher Side-Dish Consumption Intentions," *Journal of Consumer Research*, 34 (3), 301-14.

Coker, Brent and Anish Nagpal (2013), "Building-up Versus Paring-Down: Consumer Responses to Recommendations When Customizing," *Journal of Retailing*, 89 (2), 190-206.

Dhar, Ravi, and Klaus Wertenbroch. (2000). "Consumer choice between hedonic and utilitarian goods." *Journal of Marketing Research* 37, no. 1, 60-71.

Gu, Y., Botti, S., & Faro, D. (2013). Turning the page: The impact of choice closure on satisfaction. *Journal of Consumer Research, 40*(2), 268-283.

Hayes, Andrew F. (2013), "Methodology in the Social Sciences," Introduction to mediation, moderation, and conditional process analysis: A regression-based approach. New York: Guilford Press.

Huber, Vandra L, Margaret A Neale, and Gregory B Northcraft (1987), "Decision Bias and Personnel Selection Strategies," *Organizational Behavior and Human Decision Processes*, 40 (1), 136-47.

Huang, Zhongqiang (Tak), Yitian (Sky) Liang, Charles B. Weinberg, and Gerald J. Gorn (2019), "The Sleepy Consumer and Variety Seeking," *Journal of Marketing Research*, 56 (2), 179–96.

Hung, I. W., and Labroo, A. A. (2010). "From Firm Muscles to Firm Willpower: Understanding the Role of Embodied Cognition in Self-regulation." *Journal of Consumer Research, 37*(6), 1046-1064.

Inman, J. Jeffrey (2001), "The Role of Sensory-Specific Satiety in Attribute-Level Variety Seeking," *Journal of Consumer Research*, 28 (1), 105–20.

Kahneman, Daniel and Jackie Snell (1992), "Predicting a Changing Taste: Do People Know What They Will Like?," *Journal of Behavioral Decision Making*, 5 (3), 187–200.

Krishnamurthy, P., and Prokopec, S. (2009). "Resisting that Triple-chocolate Cake: Mental Budgets and Self-control." *Journal of Consumer Research, 37*(1), 68-79.

Laran, Juliano and Keith Wilcox (2011), "Choice, Rejection, and Elaboration on Preference Inconsistent Alternatives," *Journal of Consumer Research*, 38 (2), 229-41.

McAlister, Leigh (1982), "A Dynamic Attribute Satiation Model of Variety-Seeking Behavior," *Journal of Consumer Research*, 9 (2), 141–50.

McAlister, Leigh and Edgar Pessemier (1982), "Variety Seeking Behavior: An Interdisciplinary Review," *Journal of Consumer Research*, 9 (3), 311–22.

Menon, Satya and Barbara E. Kahn (1995), "The Impact of Context on Variety Seeking in Product Choices," *Journal of Consumer Research*, 22 (3), 285–95.

Nagpal, Anish, Jing Lei, and Adwait Khare (2015), "To Choose or to Reject: The Effect of Decision Frame on Food Customization Decisions," *Journal of Retailing*, 91 (3), 422.

Park, C Whan, Sung Youl Jun, and Deborah J MacInnis (2000), "Choosing What I Want Versus Rejecting What I Do Not Want: An Application of Decision Framing to Product Option Choice Decisions," *Journal of Marketing Research*, 37 (2), 187-202.

Perfecto, Hannah, Jeff Galak, Joseph P. Simmons, and Leif D. Nelson. (2017)."Rejecting a bad option feels like choosing a good one." *Journal of personality and social psychology* 113, no. 5, 659.

Ratner, Rebecca K., Barbara E. Kahn, and Daniel Kahneman (1999), "Choosing Less-Preferred Experiences For the Sake of Variety," *Journal of Consumer Research*, 26 (1), 1–15.

Read, Daniel and George Loewenstein (1995), "Diversification Bias: Explaining the Discrepancy in Variety Seeking Between Combined and Separated Choices," *Journal of Experimental Psychology: Applied*, 1 (1), 34–49.

Shafir, Eldar (1993), "Choosing Versus Rejecting: Why Some Options Are Both Better and Worse Than Others," *Memory and Cognition*, 21 (4), 546-56.

Sharpe, K. M., Staelin, R., and Huber, J. (2008). Using Extremeness Aversion to Fight Obesity: Policy Implications of Context Dependent Demand." *Journal of Consumer Research, 35*(3), 406-422.

Simonson, Itamar (1990), "The Effect of Purchase Quantity and Timing on Variety-Seeking Behavior," *Journal of Marketing Research*, 27 (2), 150–62.

Sokolova, Tatiana, and Aradhna Krishna. (2016). "Take it or leave it: How choosing versus rejecting alternatives affects information processing." *Journal of Consumer Research* 43, no. 4, 614-635.

Steffel, Mary and Robyn A. Le Boeuf (2014), "Overindividuation in Gift Giving: Shopping for Multiple Recipients Leads Givers to Choose Unique but Less Preferred Gifts," *Journal of Consumer Research*, 40 (6), 1167–80.

Vohs, K. D., and Baumeister, R. F. (2016). *Handbook of Self-regulation: Research, Theory, and Applications*: Guilford Publications.

Being a Human in the Age of Artificial Intelligence

Chairs: Gizem Yalcin, Erasmus University, The Netherlands
Nofar Duani, New York University, USA

Paper #1: Defending the Human Need to Be Seen: Recipient Identifiability Aggravates Algorithm Aversion in Resource Allocation Decisions

Jasper Teow, National University of Singapore, Singapore
Adelle X. Yang, National University of Singapore, Singapore

Paper #2: The Human Black Box: Illusionary Understanding Drives Preference for Human over Algorithmic Decision-Making

Andrea Bonezzi, New York University, USA
Massimiliano Ostinelli, Winthrop University, USA
Johann Melzner, New York University, USA

Paper #3: How Will AI Affect Job Choice?

Noah Castelo, University of Alberta, Canada
Gerald Häubl, University of Alberta, Canada

Paper #4: Cyber-Creativity: Unraveling the Dynamics Between Humans and Algorithms in Creative Processes

Gizem Yalcin, Erasmus University, The Netherlands
Ravi Mehta, University of Illinois at Urbana-Champaign, USA
Darren W. Dahl, University of British Columbia, Canada

SESSION OVERVIEW

With rapid technological progress and data proliferation, decisions previously made by humans are increasingly being delegated to algorithms and Artificial Intelligence (AI) technologies, which have been shown to outperform humans in a wide array of domains (Donnelly 2017; Lohr 2016; Silver 2012). Prior research has shown that consumers are often averse to algorithms (Castelo et al. 2019; Önkal et al. 2009; Longoni et al. 2019) and are concerned that these technologies could one day replace them (Granulo et al. 2019; Rainie and Anderson 2017). Though they engender substantial resistance, the widespread adoption of these technologies appears inevitable. The papers in this session utilize different methodological approaches to explore how consumers can adapt to this impending transformation. Together, they explore what it means to be human in the age of AI, and how technology may change how consumers think and act.

The session's first two papers discuss impediments to human-AI collaborations. **Teow** and **Yang** show that consumers' algorithm aversion in resource allocation decisions depends on their empathetic reactions towards the recipients. Seven studies reveal stronger algorithm aversion when an identifiable person is highlighted among the decision recipients, than when no identifiable person is highlighted. This is because the presence of an identifiable recipient heightens the sentiment that individual human circumstances should be attended to by fellow human beings instead of emotionless algorithms. In the second paper, **Bonezzi, Ostinelli and Melzner** show that people foster an illusion of understanding human better than algorithmic decision-making, when in fact both are black boxes. This occurs because, for human decision-makers, people confuse a superficial, high-level understanding of what the decision-maker does, for a deeper, low-level understanding of how the decision-maker operates. Such confusion is less likely to occur for algorithmic decision-makers.

The remaining papers explore potential pathways for successful human-AI collaborations. **Castelo** and **Häubl** report five studies that show that students and workers are discouraged from pursuing jobs that AI can also perform. Importantly, they find that the effect hinges on whether consumers perceive the technology as helping humans or competing with them and is reduced when the job is seen as highly subjective or consisting of unstandardized tasks. In the final paper, **Yalcin, Mehta** and **Dahl** present a conceptual framework for integrating AI in creative cognitive processes. Given that creativity is no longer a process that is single-handedly achieved by humans, the authors develop *Cyber-Creativity Framework,* that captures the dynamics of the relationship between humans and AI in creative processes. Specifically, they theorize that collaborating with AI enhances humans' performances in earlier stages whereas humans have an edge over AI in the later stages.

This session provides timely insight into how-and when-consumers are able to cooperate with algorithms, an increasingly important topic given the proliferation of this technology in consumer-contexts. This session directly addresses ACR's call for papers that generate new knowledge on how consumers make decisions in the age of new technology. This session should be of interest to scholars working on choice and decision making, inference-making, recommendations, creativity, innovation, and new technologies.

Defending the Human Need to Be Seen: Algorithm Aversion and the Identifiable Human Recipient in Resource Allocation Decisions

EXTENDED ABSTRACT

Many important allocation decisions, which used to rely on human judgment, can now be made by algorithms with advanced data processing and analytic capabilities. While algorithms are widely adopted in market predictions and product recommendations, the involvement of algorithms have provoked much resistance in the decisions that distribute scarce resources among individuals. For instance, a recent survey indicated that 67% of Americans find it unacceptable to use algorithms in hiring decisions (Pew Research 2018).

Recent research shed important light on people's general attitudes towards algorithms in decision making: while people appreciate algorithmic advice for its superior efficiency and accuracy, they are less tolerant of algorithms' mistakes (Dietvorst, Simmons, and Massey 2015; Logg, Minson, and Moore 2019). In certain domains, such as medical decision making, people tend to reject the use of algorithms due to a concern that algorithms may overlook the unique characteristics of each individual (Longoni, Bonezzi, and Morewedge 2019).

Joining this growing literature, we examine people's preference between human experts and algorithms in resource allocation decisions. We find in seven pre-registered experiments ($N = 2,732$) that information about an identifiable decision recipient exacerbates algorithm aversion by evoking greater empathic reactions than information about statistical recipients. In particular, the empathic reactions evoked by the identifiable decision recipient highlight the concern that algorithms cannot produce appropriate emotions in response to each recipient's circumstance. These findings may reflect a shared sentiment for the "compassionate gaze," namely, that individual human beings' circumstances should be attended to by fellow human beings.

In each study, we introduced participants to a resource allocation decision, and asked them to indicate their preference between two decision methods: a committee of human experts versus an algorithmic judge. The context of the focal decision varied across studies.

Across these studies, we also find process evidence in support of our theorization and rule out important alternative explanations.

Studies 1 ($N = 241$), 2a ($N = 232$), 2b ($N = 427$), 2c ($N = 417$), and 2d ($N = 231$) all followed a mixed design, with 2 repeated measures (recipient description: statistical versus identifiable), and counterbalancing of the presentation order of the recipient description between-subjects. The description of the statistical recipients emphasized the number of total recipients and the differences in their circumstances, whereas the description of the identifiable recipient featured an image of one individual recipient with descriptions of the person's circumstance. Participants were first presented with one version of recipient description (either statistical or identifiable), followed by an 8-point scale measuring participants' preference between the two decision methods for the focal allocation decision (1 = definitely prefer human committee; 8 = definitely prefer algorithmic judge), as well as a binary choice between the two decision methods. Then, participants were asked to indicate their empathic reactions on a 6-point scale adopted from Erlandsson, Björklund, and Bäckström (2015), followed by a 9-point scale measuring the compassionate gaze belief (with 4 items, e.g., "I believe that their [her] situation should be seen"). Next, the same participant was presented with the other version of recipient description, following by the same dependent variables and process measures. Therefore, each participant was presented with both versions of recipient descriptions, and explicitly informed that both descriptions were about the same decision scenario.

These studies revealed highly consistent results: featuring an identifiable decision recipient evoked stronger algorithm aversion than presenting statistical recipients (despite participants being explicitly reminded that the focal decision applies to each individual as well as the entire group); regardless of presentation order. More specifically, these inconsistent preferences were observed both between-subjects and within-subjects. We thus collapsed the data to compare the average preference under each version of recipient description. In addition, the process measures in these studies suggest that, an identifiable decision recipient evoked stronger emotional reactions and a stronger endorsement of the compassionate gaze belief. Serial mediations supported their roles underlying the observed effect (e.g., serial mediation in study 1: indirect effect = -.39, $CI_{95\%}$ = [-.56, -.25]).

Next, study 3 ($N = 441$) included the same mixed design with another between-subjects factor of recipient prospect (good vs bad). In a college admission scenario, the identifiable decision recipient was either a more qualified candidate with a good prospect of getting admitted to a top university, or a less qualified candidate with a poor prospect of getting admitted. We found highly similar results between conditions (more qualified recipient: $M_{statistical}$ = 4.89, SD = 1.92 vs $M_{identifiable}$ = 2.94, SD = 1.64, $F(1,878)$ = 139.00, p < .001; less qualified recipient: $M_{statistical}$ = 4.68, SD = 1.96 vs $M_{identifiable}$ = 2.44, SD = 1.31, $F(1,878)$ = 187.33, p < .001), and no interactions between identifiability and recipient prospect ($F(1,878)$ = 1.54, p = .216). These results suggest that the effect is generalizable across identifiable decision recipients and not attributable to participants perceiving the identifiable individual to be more deserving than the average recipient.

Last, study 4 ($N = 743$) crossed the same mixed design with another between-subjects factor (recipient category: victim vs. villain), to further examine if the effect holds when the decision recipients evoke negative emotional reactions, or if participants (mis)perceive human decision makers to be more lenient towards any identifiable individual. Again, we observed the main effect ($M_{statistical}$ = 4.27, SD = 2.61 vs $M_{identifiable}$ = 3.31, SD = 2.54, $F(1,1484)$ = 50.97, p < .001), and no significant reversal between recipient description and recipi-

ent category. Thus, the stronger algorithm aversion evoked by an identifiable recipient reflects the concern that algorithms are unable to understand emotions.

The Human Black Box: Illusionary Understanding Drives Preference for Human over Algorithmic Decision-Making

EXTENDED ABSTRACT

Algorithms are increasingly used to make judgments and decisions that profoundly impact people's lives, from whom gets incarcerated or admitted to universities, to whom gets hired or granted credit. Prior research shows that people are often hesitant to trust algorithmic over human decision-makers (Castelo, Bos, and Lehmann 2019; Dietvorst, Simmons, and Massey 2014; Longoni, Bonezzi, and Morewedge 2019). We propose that people's reluctance to trust algorithmic over human decision-makers stems, at least in part, from an illusion of explanatory depth (IOED; Rozenblitz and Keil 2002). Specifically, people foster the illusion that they understand how human decision-makers arrive at judgments and decisions better than how algorithmic decision-makers do so, when in fact both are black boxes. This occurs because, for human decision-makers, people are more likely to confuse a superficial, high-level understanding of what the decision-maker does, for a deeper, low-level understanding of how the decision-maker does it. This is less likely to occur for algorithmic decision making.

Study 1. The goal was to provide initial evidence that people foster the illusion that they understand human decision-makers better than algorithmic decision-makers. We test this hypothesis using a typical IOED paradigm, which unveils illusionary understanding by asking people to explain in detail how something works (Alter, Oppenheimer, and Zemla 2010).

401 MTurkers were randomly assigned to a 2(decision-maker: algorithm, judge) by 2(explanation: yes, no) between-subjects design. Respondents were presented with a news story about a man found guilty of stealing a car and sentenced to five years in prison, on the basis of a recidivism assessment conducted either by a judge/algorithm. In the no explanation condition, respondents were asked to rate to what extent they understood how the judge/algorithm evaluated the risk that the defendant would re-offend (three items on 7-point scales, α=.94, averaged into a sense of understanding score). In the explanation condition, respondents were asked to explain in detail how the judge/algorithm evaluated the risk that the defendant would re-offend, before rating their understanding.

A 2(decision-maker: algorithm, judge) x 2(explanation: yes, no) ANOVA revealed a significant main effect of explanation, $F(2,397)$=5.27, p=.022 and a marginally significant interaction $F(2,397)$=3.73, p=.054. Participants in the no explanation condition indicated a lower sense of understanding when the decision-maker was an algorithm (M=2.83, SD=1.61) rather than a judge (M=3.46, SD=1.80, p=.013). However, in the explanation condition, participants' sense of understanding did not differ significantly as a function of decision-maker (judge: M=2.70, SD=1.88; algorithm: M=2.76, SD=1.83, p=.819). Key to our hypothesis, asking to provide an explanation significantly reduced sense of understanding when the decision-maker was a judge (p=.003), but not when it was an algorithm (p=.795). These results provide evidence that people foster an illusion of understanding human decision makers better than algorithmic decision makers.

Study 2. The goal was to provide converging evidence for our illusionary understanding hypothesis, and test our proposed process via moderation.

442 undergraduate students were randomly assigned to a 2(decision-maker: algorithm, judge) by 3(mindset: how, why, control) between-subjects design. Respondents in the how/why mindset conditions were instructed to consider how/why they would improve and maintain their health (Freitas, Gollwitzer, and Trope 2004). The control group did not complete this manipulation. Respondents then read the same news story described in the previous study, and answered the same three items aimed to measure their sense of understanding (α=.78).

A 2(Decision-maker: algorithm, judge) x 3(mindset: how, why, control) ANOVA revealed a significant interaction, $F(2,436)$=5.11, p=.006. In the control condition, sense of understanding was higher when the decision-maker was a judge (M=4.37, SD=1.51) rather than an algorithm (M=3.68, SD=1.38, p=.003). This result replicates the findings from Study 1. When the decision-maker was an algorithm, sense of understanding did not differ across mindsets (algorithm control: M=3.68, SD=1.38; algorithm how: M = 3.86, SD =1.15; algorithm why: M=4.09, SD=1.18, p=.191), but when the decision-maker was a judge, sense of understanding differed across mindsets (judge control: M=4.37, SD=1.51; judge how: M=3.59, SD=1.52; judge why: M=4.00, SD=1.34, p=.003). Importantly, when the decision-maker was a judge, participants in the how mindset reported a significantly lower sense of understanding than participants in the control condition (p=.001). These results provide further evidence that people foster an illusion of understanding human decision-makers better than algorithmic decision-makers, because they construe human decision-making in terms *why* and algorithmic decision-making in terms of *how*.

Study 3: The goal was to probe our proposed process via mediation, test for consequential outcomes, and extend the investigation to a different domain.

198 MTurkers were presented with five activities in the HR domain (e.g., screening job candidates). Respondents indicated how much they would trust a manager/algorithm to perform each of these activities on a 7-point scale (α=.89). Respondents then indicated the degree to which they understand how a manager/algorithm performs each of these activities (α=.92). Finally, respondents completed a task, designed in the spirit of the behavioral identification form (BIF; Vallacher and Wegner 1989), aimed to measure how they construed each of the five activities performed by a manager/algorithm. Finally, to measure perceived accuracy, respondents rated the likelihood of a manager/algorithm being inaccurate when performing each task (α=.84).

Respondents indicated higher trust ($M_{Manager}$=5.45, SD=.95; $M_{Algorithm}$=3.76,SD=1.27; $t(196)$=10.55, p<.001), higher sense of understanding ($M_{Manager}$=5.32, SD=1.11; $M_{Algorithm}$=3.93, SD=1.55; $t(196)$=7.21, p<.001), and more *why* identifications ($M_{Manager}$=3.11, SD=1.19; $M_{Algorithm}$=1.44, SD=1.39; $t(196)$=9.06, p<.001) in the manager versus the algorithm condition. We conducted a mediation analysis with decision-maker as independent variable and trust as dependent variable. Behavioral identification and sense of understanding were specified as serial mediators, and accuracy as an alternative mediator. The results revealed a significant sequential indirect effect (decision-maker -> abstraction -> understanding -> trust: b=.16, CI95% [.06;.29]). The indirect effect through accuracy (decision-maker -> accuracy -> trust) was also significant (b=.19, CI95% [.06;.36]). The direct effect (decision-maker -> trust) was reduced after accounting for both processes (b=1.17, CI 95% [.82;1.51]), indicating partial mediation.

Across three studies, we show that people foster an illusion of understanding human better than algorithmic decision-making, because they construe human decision-making at a higher level of abstraction (Kim and Duhachek 2020) and confuse a superficial understanding of the process for a deeper understanding of *how* the process actually works.

How Will AI Affect Job Choice?

EXTENDED ABSTRACT

We explore how learning about the existence of AI in a given job alters students' and workers' willingness to pursue that job. We show that perceiving AI as competing with humans in a given job decreases willingness to pursue that job, while perceiving AI as helping humans in a job increases willingness. We also propose two moderators of this effect.

The first is whether the job is seen as more objective or subjective. Objective jobs require the use of quantifiable facts and data to perform them successfully, relative to subjective jobs which require the use of intuition or personal opinion. People tend to see algorithms as more capable of performing objective vs. subjective tasks. Thus, emphasizing that a given job is best accomplished by subjective (vs. objective) means may encourage more people to pursue that job even if AI is competing in that job.

A related factor is whether people focus on the standardized vs. unstandardized aspects of a given job. Independent of whether people believe that a job is best accomplished by objective or subjective means, most jobs also consist of some tasks that are relatively rule-based, repetitive, routine, and standardized, as well as some tasks that are relatively qualitative, non-repetitive, variable, and unstandardized. Emphasizing the more unstandardized aspects of a given job may therefore also encourage more people to pursue that job even in the presence of AI. In Study 1,221 business students read an article either about AI being used in accounting, or about a neutral topic, before indicating their interest in accounting careers. Reading the article about AI in accounting significantly decreased students' interest in accounting careers (β = -.86, p = .002). In the control condition, 70% of students scored at or above the scale mid-point on the dependent variable, indicating at least moderate interest in accounting careers; in the AI condition, this figure was 50% (χ^2 = 8.34, p = .004).

In Study 2, 151 Prolific participants chose to work on 1 of 2 prediction tasks; after working on their chosen task for several rounds (i.e., making several predictions), we introduced an AI system to the task, which we told them would be either competing with them for bonus payments, helping them at the task, or we left the AI's role ambiguous. We measured whether they chose to continue working on their chosen task with the AI or switch to the other task where there was no AI. Participants in the ambiguous AI condition chose to work alongside the AI 76% of the time, those in the AI help condition 86% of the time, and those in the AI competition condition 65% of the time. The only significant two-sample proportions test was between the competition and help conditions (χ^2 = 5.16, p = .023).

500 Prolific participants completed Study 3, choosing to work on a task either alone or with AI. We again manipulated whether the AI would help them or compete against them. We also told them that they could expect a higher bonus payment if they chose to work with AI, since the per-round bonus payment would be higher. Nevertheless, 11% chose to work alone in the "AI help" condition, and 28% did so in the "AI competition" condition (χ^2 = 20.6, p < .001). Thus, a preference to avoid working with AI persists despite financial incentives to the contrary.

Study 4 manipulated both help vs. compete framing as in Study 3 and framed the task itself as either objective or subjective. We again measured the choice to work alone or with AI on the task. A

2x2 regression revealed that the choice of working alone was more likely when AI was competing vs. helping ($\beta = .52$, $p < .001$) and more likely when the task was framed as being subjective ($\beta = .10$, $p = .068$); there was also a significant interaction ($\beta = .24$, $p = .002$). When the task was framed as being highly objective, 70% of participants chose to work alone when AI was competing, compared to 18% choosing to work alone when AI was helping ($\chi^2 = 62.32$, $p < .001$). When the task was framed as being highly subjective, 80% chose to work alone when AI was competing, compared to 52% when AI was helping ($\chi^2 = 21.41$, $p < .001$). Thus, in both cases, there was a strong effect of AI helping vs. competing, but the effect was significantly smaller when the task was seen as subjective.

Finally, Study 5 manipulated 267 business students' focus on the standardized vs. unstandardized aspects of accounting before reading one of the same articles from Study 1 (about either AI in accounting or a neutral topic). We mentioned that accountants mainly work on tasks like "calculating taxes owed and filling out tax filing forms" which are largely repetitive and rule-based, or like "interacting with clients in order to understand their short- and long-term financial goals and obligations" which are non-repetitive and intuition based. We again measured interest in accounting careers.

A 2 (AI vs. control article) x 2 (high vs. low job standardization) ANOVA revealed a significant interaction, $F(1,265) = 7.13$, $p = .008$, but no significant main effects, F's < 2.20, p's $> .139$. When accounting was described as consisting of highly standardized tasks, reading about AI in accounting decreased students' interest in accounting careers ($M = 2.84$) relative to reading about a neutral topic ($M = 4.17$, $t(126) = 3.04$, $p = .003$). When accounting was described as consisting of highly unstandardized tasks, reading about AI in accounting did not decrease interest in accounting careers ($M = 3.38$) relative to reading about a neutral topic ($M = 3.02$, $t(124) = .79$, $p = .431$).

Students and workers are therefore discouraged from choosing jobs in which AI can also perform, especially when AI is seen as competing; this effect can be reduced by highlighting the subjective or unstandardized nature of the job.

Cyber-Creativity: Unraveling the Dynamics Between Humans and Artificial Intelligence in Creative Processes

EXTENDED ABSTRACT

For decades, the role of advancing technology had been limited to helping humans perform tasks more efficiently and with higher quality (van Bruggen et al. 1998). As technologies became more sophisticated; however, they started taking over tasks from humans, performing them autonomously. Recent reports indicate that an increasing percentage of human labor has been replaced either partially or completely by new technologies in the last decade (Arntz et al. 2016; Brynjolfsson et al. 2018), and people who hold jobs that are easy to automate (e.g., frontline service employees)– that corresponds to 30 million American workers– are expected to continue being replaced (Muro et al. 2019).

In addition to their adoption in easy-to-standardize business processes, many companies have been utilizing artificial intelligence (AI) technologies in business areas that are fundamentally driven by high-order human cognition, such as creativity. Due to the widespread adoption of novel AI technologies, creativity is no longer a process that is single-handedly achieved by humans. Today, many companies (e.g., Google, IBM) increasingly employ AI in their creative processes (Ringel et al. 2019) to generate and execute ideas (e.g., medicine, food; Fry 2018), to design clothes (e.g., Glitch), and even to compose songs (e.g., Watson Beat). This widespread adoption of AI technologies in tasks that require higher-order cognitive processes raises a vital question about the future of the relationship between humans and AI in creative industries.

Despite the widespread adoption of AI in creative industries, what is known in the CB academic literature is based on human creativity. Previous work on creativity predominantly studies the cognitive processes that lead to an output that is not only different from what is already known but also is effective in solving the problem at hand (Moreau and Dahl 2005). In their influential paper, Finke and colleagues (1992) propose that such cognitive processes can be categorized into two critical phases that define creative cognition and present the "Geneplore Model" of creative thinking. The authors argue that *generative processes* entail constructing mental representations or preinventive cognitive structures of a desired creative solution (Murphy 1988). Once these preliminary mental structures are generated, *exploratory processes* are engaged to interpret these preinventive structures in a meaningful way until a satisfactory creative solution is reached.

In the current work, we evaluate and assess how AI technologies may redefine creative cognitive processes. Building on an influential theory of human creative processes (Geneplore model by Finke et al. 1992), we present the *Cyber-Creativity Framework,* that captures the dynamics of the relationship between humans and AI in creative processes.

The creative cognitive process starts with the generative phase during which one constructs mental representations and preinventive structures that are evaluated in the exploration phase to reach a final creative solution (Murphy 1988; Perkins 1981). In this initial phase, individuals retrieve mental information, form associations among retrieved mental concepts, and then synthesize or transform these concepts/information to generate preliminary mental structures. We propose that AI can augment human performance during generative processes by mitigating their possible weaknesses (e.g., limited computing power, limited memory, mental blocks, unconscious plagiarism; e.g., Baddeley 2013; Dahl and Moreau 2002; Miller 1956). Specifically, our model demonstrates that collaborating with AI improves humans' performances by enhancing their memory, flexibility, and comprehension. In contrast, we argue that AI shows a more secondary role during exploratory processes. Exploratory process entails interpreting the newly defined structures in meaningful ways (Finke et al. 1992). Such evaluations of preinventive structures utilize cognitive processes that encompass metaphorical or theoretical interpretations of the generated concepts, exploration of different meanings and functional inferences of structures, as well as testing and searching limitations of these interpretations. We suggest AI to have a secondary role during the exploratory stage as humans have an edge due to their (relative) advanced capabilities of intuition, adaptive decision-making and their ability to assess effectiveness across contexts. Put differently, even though collaboration with AI can enhance the overall effectiveness of exploratory processes, we propose that AI is best to play an assistive role during this phase of creative cognition.

We believe that our work builds on the current comprehension of human creativity and proposes a framework that captures the dynamics of the relationship between AI and human creative processes. By theorizing how humans and AI can collaborate instead of replacing one another, we also contribute to literature on technology by offering an alternative approach to studying a dark future that awaits humanity (Castelo and Lehmann 2019; Granulo et al. 2019). Additionally, our work offers timely and actionable strategies for managers and creative professionals. We provide understanding on how the integration of AI can impact the creative process and facilitate creative outcomes across different stages of the creative process. By

doing so, we provide managers with insights into defining and designing more successful creative processes (e.g., new product development), and how to determine the effective distribution of tasks and resources shared between AI and humans.

REFERENCES

Alter, Adam L., Daniel M. Oppenheimer, D. M., and Jeffrey C. Zemla. (2010), „Missing the Trees for the Forest: A Construal Level Account of the Illusion of Explanatory Depth. *Journal of Personality and Social Psychology,* 99, 436–51.

Arntz, Melanie, Terry Gregory, and Ulrich Zierahn (2016), "The Risk of Automation for Jobs in OECD Countries: A Comparative Analysis," *OECD Social, Employment and Migration Working Papers*, No. 189, OECD Publishing, Paris, http://dx.doi.org/10.1787/5jlz9h56dvq7-en

Baddeley, Alan (2013), *Essentials of Human Memory (classic edition)*, Psychology Press.

Brynjolfsson, Erik, Tom Mitchell, and Daniel Rock (2018), "What can machines learn, and what does it mean for occupations and the economy?," in *AEA Papers and Proceedings,* (108), 43.

Castelo, Noah, and Donald R. Lehmann (2019), "Be Careful What You Wish For: Unintended Consequences of Increasing Reliance on Technology," *Journal of Marketing Behavior*, 4 (1), 31.

Castelo, Noah, Maarten W. Bos, and Donald R. Lehmann (2019), "Task-Dependent Algorithm Aversion," *Journal of Marketing Research*, 56 (6), 809-25.

Dietvorst, Berkeley J, Joseph P Simmons, and Cade Massey (2015), "Algorithm Aversion: People Erroneously Avoid Algorithms after Seeing Them Err," Journal of experimental psychology: General, 144 (1), 114.

Erlandsson, Arvid, Fredrik Björklund, and Martin Bäckström (2015), "Emotional Reactions, Perceived Impact and Perceived Responsibility Mediate the Identifiable Victim Effect, Proportion Dominance Effect and in-Group Effect Respectively," Organizational behavior and human decision processes, 127, 1-14.

Finke, Ronald A., Thomas B. Ward, and Steven M. Smith (1992), *Creative cognition: Theory, research, and applications.*

Freitas, Antonio L., Peter Gollwitzer, and Yaacov Trope (2004), "The Influence of Abstract and Concrete Mind-sets on Anticipating and Guiding Others' Self-regulatory Efforts," *Journal of Experimental Social Psychology,* 40, 739–52.

Fry, Hannah (2018), *Hello World: How to be Human in the Age of the Machine*, Random House.

Granulo, Armin, Christoph Fuchs, and Stefano Puntoni (2019), "Psychological Reactions to Human versus Robotic Job Replacement," *Nature Human Behaviour*, 3 (10), 1062-9.

Kim, Tae Woo and Adam Duhachek(2020), "The Impact of Artificial Agents on Persuasion: A Construal Level Account, *Psychological Science,* 31 (4), 363-380.

Logg, Jennifer M, Julia A Minson, and Don A Moore (2019), "Algorithm Appreciation: People Prefer Algorithmic to Human Judgment," Organizational behavior and human decision processes, 151, 90-103.

Longoni, Chiara, Andrea Bonezzi, and Carey K Morewedge (2019), "Resistance to Medical Artificial Intelligence," Journal of Consumer Research, 46 (4), 629-50.

Miller, George A. (1956), "The magical number seven, plus or minus two: Some limits on our capacity for processing information," *Psychological Review*, 63 (2), 81.

Moreau, C. Page, and Darren W. Dahl (2005), "Designing the solution: The impact of constraints on consumers' creativity," *Journal of Consumer Research*, 32 (1), 13-22.

Muro, Mark, Robert Maxim, and Jacob Whiton (2019), "Automation and Artificial Intelligence: How Machines are Affecting People and Places," *Metropolitan Policy Program at Brookings*.

Murphy, Gregory L. (1988), "Comprehending complex concepts," *Cognitive Science*, 12 (4), 529-562.

Perkins, David N. (1981), *The Mind's Best Work*, Cambridge, MA: Harvard University Press.

Pew Research (2018), "Public Attitudes toward Computer Algorithms."

Ringel, Michael, Florian Grass, Michael Spira, Derek Kennedy, and Ramon Baeza (2019), "AI Powers a New Innovation Machine" Most Innovative Companies 2019," Available at: https://www.bcg.com/publications/2019/most-innovative-companies-artificial-intelligence-innovation-machine.aspx

Rozenblit, Leonid and Frank Keil, (2002), "The misunderstood limits of folk science: An illusion of explanatory depth," *Cognitive Science,* 26, 521–562.

Vallacher, Robin R., and Daniel M. Wegner (1989), "Levels of Personal Agency: Individual Variation in Action Identification," *Journal of Personality and Social Psychology,* 57 (4), 660-71.

Van Bruggen, Gerrit H., Ale Smidts, and Berend Wierenga (1998), "Improving decision making by means of a marketing decision support system," *Management Science*, 44 (5), 645-658.

Yeomans, Michael, Anuj Shah, Sendil Mullainathan, and Jon Kleinberg (2019), "Making Sense of Recommendations," *Journal of Behavioral Decision Making*, 32 (4), 403-14.

Discrimination and Inclusiveness in the Marketplace

Chair: Martina Cossu (Bocconi University)

Paper #1: Belief-based Discrimination: Beauty Premium and Beauty Penalty

Meng Zhu, Johns Hopkins University, USA
Tingting Nian, University of California at Irvine, USA
Joachim Vosgerau, Bocconi University, Italy

Paper #2: Racial Discrimination in Customer Service: A Field Experiment

Alexandra Feldberg, Harvard Business School, USA
Tami Kim, University of Virginia, Darden School of Business, USA

Paper #3: Paying for Parity: Consumer Response to Gender Pay Gaps

Bhavya Mohan, University of San Francisco, USA
Tobias Schlager, University of St. Gallen, Switzerland
Katy DeCelles, University of Toronto, Canada
Michael Norton, Harvard Business School, USA

Paper #4: Uncommon Beauty: Physically Disabled Models Positively Affect Consumers' Attitudes and Choices

Martina Cossu, Bocconi University, Italy
Zachary Estes, Bocconi University, Italy
Joachim Vosgerau, Bocconi University, Italy

SESSION OVERVIEW

The public debate about discrimination and inclusiveness is intensifying in our societies. Social media is proliferating the means to socially connect, thereby exposing consumers to more and more information on different cultures and giving voice to vulnerable minorities. The #metoo movement has made it possible to openly talk about sexual discrimination at the workplace, a topic that had been taboo just a few years ago. And the notion of discrimination itself is changing and no longer covers only race and gender but is extended to other dimensions such as body image and beauty. Given these encouraging developments, one may be optimistic about the marketplace overall becoming more inclusive. This special topic session is aimed at providing an insight as to how inclusive the marketplace has become. The evidence is mixed. While consumers and service providers are found to still be discriminating in certain areas, consumers are also observed to be willing to punish companies that discriminate and to reward those that promote inclusiveness.

In particular **Zhu, Nian and Vosgerau** show that discrimination based on beauty—a beauty premium or a beauty penalty—can occur because consumers hold incorrect beliefs about the relationship between beauty and productivity. Consumers discriminate in favor of the attractive when social skills are deemed important, but discriminate against the attractive when analytical skills are deemed important.

Feldberg and Kim investigate discrimination in the service sector in a national field experiment involving 6,000 hotels. Hotels received emails from one of twelve fictitious email accounts (varying race, gender, and education) asking for local restaurant recommendations. Hotel representatives' email responses revealed racial discrimination along three dimensions of service quality: responsiveness, helpfulness, and rapport.

While those first two papers document extant discrimination in the marketplace, the next two papers show that consumers are also willing to punish companies that are still discriminating and to reward those that promote inclusiveness. **Mohan, Schlager, DeCelles and Norton** investigate how a company's gender pay gap affects consumers' willingness to pay. When firms' gender pay gaps are revealed, consumers are found to be less willing to pay for their goods, an effect driven by consumer perceptions of unfairness and moderated by gender.

Finally, **Cossu, Estes and Vosgerau** show that consumers are willing to reward companies for their inclusiveness, specifically for using disabled models in their advertisements. While disabled models to some extent evoke negative emotions (e.g., pity), they are shown to more strongly trigger positive emotions such as admiration that transcend to the advertisement and the brand. These positive effects cannot be accounted for by social desirability alone.

We expect the session to generate significant interest among conference attendees in general given the timeliness of the research topic; it should specifically attract researchers interested in inclusiveness, discrimination, and minorities.

Belief-based Discrimination: Beauty Premium and Beauty Penalty

EXTENDED ABSTRACT

The positive discrimination in favor of attractive workers—the so-called beauty premium—is a robust phenomenon. Explanations for the beauty premium fall into three classes: taste-based accounts (Becker, 1957) which maintain that beauty is in itself valued by consumers, statistical-based explanations (Phelps, 1972; Arrow, 1973) which argue that beauty serves as a reliable indicator for productivity, and belief-based explanations (Mobius and Rosenblat 2005; Bohren, Imas & Rosenberg 2019) which suggest that the beauty premium is caused by consumers' mistaken beliefs about the relationship between beauty and productivity.

We conjecture that both beauty premium and beauty penalty can occur due to belief-based discrimination. The psychology literature has shown that attractive people are perceived as more sociable, dominant, sexually warm, mentally healthy, interpersonally competent, confident, and better adjusted than unattractive people (Dion, Berscheid & Walster, 1972; Feingold 1992; Langlois et al., 2000). Based on this validated positive link between beauty and social skills, we conjecture that consumers positively discriminate in favor of the attractive for activities in which social skills are important. In contrast, a beauty penalty may occur for activities that require analytical skills and extensive solitary training, because consumers believe that less attractive individuals incur higher cost in social interactions than attractive individuals.

In Study 1 (preregistered https://aspredicted.org/blind.php?x=mf7pe7), 5704 MTurkers each rated a set of 30 photos of the same gender and race along one of the following dimensions: attractiveness, intelligence, responsibility, trustworthiness, social skills, analytical skills, and age. The set of 30 photos for each respondent was created out of a total of 8 sets with varying gender (male vs. female) and race (Asian, African Americans, Hispanics vs. Caucasians; photos were sampled from the Chicago Face Database: https://faculty.chicagobooth.edu/bernd.wittenbrink/cfd/index.html). For each of the 240 photos, we averaged the standardized ratings across respondents within dimensions (attractiveness, intelligence, responsibility, trustworthiness, social skills, analytical skills, age). With photo as the unit of analysis, we then regressed the averaged and standardized social and analytical skill ratings onto the averaged and standardized

ratings of attractiveness, intelligence, responsibility, trustworthiness, and age in two separate regressions. Consistent with our prediction, people (photos) perceived as more attractive were perceived to have better social skills (standardized b = 0.53, t(235) = 10.76, p <.001) but worse analytical skills (standardized b = -0.26, t(235) = -5.95, p < .001).

In Study 2 (N = 205), we manipulated the relative importance of social skills to analytical skills within the same profession (i.e., computer science professors). Half of the participants were asked to predict the professors' teaching performance (a domain where social skills are more important), and the other half were asked to predict their research performance (a domain where analytical skills are more important). Consistent with our prediction, professors (photos) perceived as more attractive by one set of subjects were rated to be better teachers by another set (β = 0.219, SE = .059; t(35) = 3.71, p < .001) but worse researchers by a third set (β = -0.294, SE = .065; t(35) = -4.49, p < .001).

Can such beauty penalties also be observed in the marketplace? To address this question, we investigated the influence of physical attractiveness on users' evaluations of others' on an online question-and-answer site for professional programmers, Stack Overflow. We randomly sampled 126,573 profile images, and using Face ++ API, we calculated a physical attractiveness score for each image. Based on the belief-based discrimination account by Bohren, Imas and Rosenberg (2019), we hypothesized that new programmers with low reputation scores should incur a beauty penalty because for programming, analytical skills are deemed more important than social skills. In contrast, among programmers with high reputation scores, attractive programmers must produce higher quality output than unattractive programmers to overcome the initial beauty penalty, resulting in a beauty premium. Consistent with these predictions, among (new) low-reputation programmers, the questions/answers of attractive programmers received more downvotes and fewer upvotes (a beauty penalty). In contrast, among experienced high-reputation programmers, the questions/answers of attractive programmers received more upvotes than downvotes (a beauty premium).

The results of our three studies suggest that discrimination based on beauty is belief-based, and hence context dependent. Consumers may discriminate in favor of attractive individuals when social skills are deemed important, but may discriminate in favor of the plain-looking when analytical skills are more important. Likewise, discrimination against the attractive can switch to discrimination in favor of the attractive when objective performance criteria are present.

Racial Discrimination in Customer Service: A Field Experiment

EXTENDED ABSTRACT

Service interactions between service providers and customers are ubiquitous in everyday life; they are also rife with service providers' discretion and subjective assessments and may be especially susceptible to discrimination. Yet, much of the existing research on discrimination has tended to focus on formal transactions—such as the buying and selling of goods and services, or the interactions with organized bureaucracies. Here we study discrimination in the context of customer service—the *manner* in which service providers (i.e., frontline employees) assist customers.

We chose the United States hotel industry, which generated over $170 billion in sales revenue and employed 1.9 million people in 2015 (AHLA, 2015), as our experimental setting. We conducted a field experiment using the audit study methodology with 6,000 ho-

tels, investigating the manner in which their service representatives would treat potential customers based on perceived race, gender, and class of customers. Through a simple email inquiry, we examined how much knowledge about restaurants—and the way in which—hotel service representatives were willing to share by asking whether hotel staff had recommendations for "unique" dining experiences in their cities.

Prior to beginning data collection, we set the sample size for this experiment based on previous audit (e.g., Bertrand & Mullainathan, 2004; Milkman et al., 2015; Tilcsik, 2011) and aimed for 500 hotels per condition. We randomly selected 6,000 hotels from ORBIS, a global company database, using a random number generator.

The experiment employed 12 treatment groups based on the perceived race (white, black, Asian), gender (male, female), and class of customers. Based on previous research (Milkman et al., 2012, 2015), we generated six different names to signal both the race and gender associated with each name. To vary perceptions of class, we either included or excluded "MD/PhD" at the end of each name. We validated the list of names and titles through a pretest on Amazon's Mechanical Turk. We emailed hotels from one of 12 fictitious accounts with a simple inquiry. The emails were identical except for two components: (1) the city that the customer planned to visit (which corresponded to the city of the recipient hotel) and (2) the customer's signature at the end of the email. We worded emails as follows: "Hello, I will be visiting [hotel's city location inserted here] in a few weeks. I'm interested in dining experiences unique to your city—could you make some recommendations? Thank you, [Customer's signature inserted here]." Using an email help tool, we scheduled all emails to be sent at 10am in the time zone corresponding to each hotel's location.

We assessed information availability and quality on the following three dimensions: responsiveness, helpfulness, and rapport. Responsiveness refers to the accessibility of information from hotel representatives, which we measured in two ways: whether or not each hotel responded and email length (i.e., the number of characters in each email). Helpfulness evaluates how directly and extensively representatives addressed the customer's inquiry, which we measured in three ways: (1) number of restaurants recommended, (2) whether or not hotels referred the customer to another source instead of making any restaurant recommendations, and (3) whether or not hotels inquired after the customer's dining preferences. Note that the act of referring to another source is not helpful, given that responders are not directly answering the customer's question. Conversely, inquiring about one's restaurant preferences is helpful, since it represents an attempt to customize the content of a response. Rapport considers the extent to which representatives attempted to establish a relationship with the customer, for example, by conveying personal engagement and providing unsolicited information that goes beyond responding to the inquiry. Finally, five variables measured efforts to establish rapport: whether or not hotels (1) provided extraneous information not about restaurants (e.g., attractions in the city, history of the city), (2) acknowledged the customer as a guest, (3) encouraged the customer to stay at the hotel, (4) addressed the customer using his/her name or honorific in the response (e.g., Dr. Washington, Mr. Andersen) and (5) signed the email with a complimentary close (e.g., Best, Sincerely).

Patterns across these variables broadly reflect a white advantage in customer service. Compared to customers with white names (42.9%), those with black names and Asian names were less likely to receive a response (Black: 39.7%, $\chi^2(1)=3.91$, $p< 0.05$; Asian: 32.0%, $\chi^2(1)=16.29$, $p<0.001$). We found consistent results of racial discrimination for helpfulness and rapport. In terms of helpfulness,

compared to customers with white names (M=3.35, SD=3.72), customers with black names and Asian names received significantly fewer restaurant recommendations (M_{Black}=2.97, SD=3.65, p=0.05; M_{Asian}=3.00, SD=4.16, p=0.10). Customers with black and Asian names were also more likely to be referred to another source (Black: 14.0%, $\chi^2(1)$=3.84, p=0.05; Asian: 15.9%, $\chi^2(1)$=8.64, p<0.01) than customers with white names (10.7%). Furthermore, customers with black and Asian names were less likely to receive preference inquiries (Black: 3.8%, $\chi^2(1)$=10.25, p<0.01; Asian: 3.3%, $\chi^2(1)$=13.34, p<0.01) than those with white names (7.9%). In terms of rapport, compared to customers with white names (28%), customers with black and Asian names were less likely to receive extraneous information from the hotel in advance of their visit (Black: 16.0%, $\chi^2(1)$=29.1, p<0.001; Asian: 4.0%, $\chi^2(1)$=158.9, p< 0.001). They were also less likely to be encouraged to stay at the focal hotel (Black: 4.7%, $\chi^2(1)$=4.06, p<0.05; Asian: 4.7%, $\chi^2(1)$=3.52, p<0.10) than white customers (7.2%), suggesting that hotels were being selective about which individuals to invite as hotel guests. These results were robust to the inclusion of hotel and hotel-county characteristics as controls. There were neither main nor interaction effects of gender or education.

Through an audit study of 6,000 hotels, we found that hotel representatives provided service in greater quantities and with greater enthusiasm to white customers than nonwhite customers, regardless of their gender or education level. The study advances understandings of inequality and knowledge-sharing in the marketplace, highlighting the need to focus not only on the quality of customer service but consistency—as well as the need to identify organizational interventions.

Paying for Parity: Consumer Response to Gender Pay Gaps

EXTENDED ABSTRACT

The gender pay gap—when women earn less money relative to men for the same work—is a pervasive pattern worldwide (Blau and Kahn 2017). One recent estimate suggests that globally comparing differences in average annual pay, women earn 57% of what men make (Harris 2017). We explore the effects of gender pay gaps from a unique perspective—that of consumers. We build on an emerging area of research exploring the influence of inequality on consumer behavior (e.g., Ordabayeva and Chandon, 2011; Yoon and Kim, 2018). Our investigation of the impact of gender pay inequality is particularly timely as countries move towards compelling firms to publicly disclosure pay gap information, such as the UK (Alderman 2018).

Building on past research, we first propose that disclosing gender pay gaps can adversely affect consumer purchase decisions by undermining consumers' perceptions of wage fairness (Benedetti and Chan 2018; Mohan, Schlager, Deshpandé and Norton 2018). Moreover, we propose that participant gender moderates the impact of pay gap disclosure on product desirability, given that gender plays a role in how an individual takes fairness in account when assessing the compensation of others (Leventhal and Lane 1970; Witt and Nye 1992).

In our pilot study, we used Twitter data on consumer sentiment before and after mandated pay gap disclosure in the United Kingdom to provide an initial examination of whether pay gap disclosure influences consumer responses. A research assistant monitored companies that published their gender pay gap leading up to the mandated April 4, 2018 deadline. We obtained all tweets between March 28 and April 8 (i.e., five days prior to and after April 3). which resulted

in a total of 93,627 tweets referencing the 158 firms in our dataset. Next, we used the LIWC database to code all the tweets for positive versus negative emotional valence about the organization (Pfarrer et al. 2010).

We conducted a linear mixed model regression, using the gender pay gap as the independent variable, publication date (before vs. after publication) as the moderator, and consumer sentiment as dependent variable ($B_{pay\,gap}$ = .001, $t(1)$ = -.19, p = .31, $B_{publicationdate\_after}$ = .14, $t(1)$ = 8.65, p = .003, $B_{pay\,gap\times publicationdate\_after}$ = -.01, $t(1)$ = -8.20, p < .001; $SD_{randomintercept\_company}$ = .41). The negative interaction between pay gap and publication date shows that after disclosure, a larger gender pay gap led to more negative emotional tweets referencing the company on Twitter (see Figure 1). A follow-up pilot study revealed that women responded significantly less positively to gender wage gap disclosure online than men, as indicated by a lower sentiment measure (M_{female} = .43, M_{male} = .80, $t(339)$ = 2.65, p = .01, Cohen's d = .29).

We next designed an incentive compatible experimental paradigm to examine whether the disclosure of gender pay gaps causally affects consumers' preferences for a firm's goods. Participants (N = 501, M_{age} = 36.6, 51% male) were randomized to one of two conditions: the control condition versus gender pay gap disclosure. Regardless of condition, participants saw descriptions of two competing ride share platforms, Uber and Lyft. In the gender pay gap present condition, participants were given the following additional information about Uber, based on actual self-reported data on the United Kingdom's publicly available Gender Pay Gap Service portal: "According to a recent report, women working for Uber have an average hourly rate that is 33% lower than men's. In other words, comparing average hourly rates, women earn 67 cents for every \$1 that men make." Participants indicated whether, if they won, they would like a \$50 gift card for Lyft versus for Uber. In this study, we also examined whether consumers responded differently to such disclosure based on their self-identified gender. Participants of both genders were significantly less likely to choose the Uber gift card when they saw the company's disclosed gender pay gap relative to when they did not ($M_{Disclosure}$ = 48.2%, $M_{Control}$ = 71.8%; χ^2 = 27.95, p < 0.01). However, we observed a significant interaction between gender and pay gap (B = 0.78, p = 0.04); women were less likely than men to choose the Uber gift card when they were shown that the company has a gender pay gap.

Next, we examined perceived wage fairness as a mediator of the effect of disclosing a gender pay gap on product desirability, again using stimuli directly informed by actual self-reported data. Participants (N = 304, M_{Age} = 34.8, 57.7% male) were all given a description of the clothing retailer Adidas. In the gender pay gap present condition, participants were told: "Adidas recently reported women working for the company have an average hourly rate that is 18% lower than men's." Willingness to buy when Adidas' pay gap was revealed was significantly lower than when the pay gap was not revealed for both genders ($M_{disclosure}$ = 3.82, SD = 1.72 vs. $M_{no\_disclosure}$ = 5.42, SD = 1.42; $t(298)$ = 8.76, p < .01). However, women were significantly less willing to buy then men when a pay gap was revealed ($t(155)$ = 3.27, p < .01).We conducted a moderated mediation analysis, with gender pay gap disclosure as the independent variable, wage fairness as the mediator, gender as the moderator, and willingness to buy as the dependent variable.. The indirect effect of pay gap disclosure on willingness to guy via wage fairness was significant for men (B = -.73, CI 95% [-1.05, -.45]), and women (B = -1.56, CI 95% [-1.97, -1.21]; Preacher and Hayes 2008). Given that the confidence intervals between both genders did not overlap, the effect is significantly more negative for women.

Two pilot studies and two experimental studies show that gender pay gap disclosure can affect consumer purchase intentions. This area of inquiry is particularly timely and important given that firms are under increasing pressure to disclose gender pay gap information that was previously kept confidential. Thus, consumer-facing firms with gender pay gaps could directly lose equity as a result of greater customer awareness, and particularly when their customers are women.

Uncommon Beauty: Physically Disabled Models Positively Affect Consumers' Attitudes and Choices

EXTENDED ABSTRACT

Recent research examined how advertisements that promote body positivity and multiethnic inclusiveness impact consumers' responses. This paper studies the impact of promoting diversity using a different minority (people with a disability) on a more general audience.

The present research analyzes how the inclusion of physically-disabled models in ads influences consumers' attitudes, emotional responses, and choices. Negative attitudes toward people with disabilities originate from the perpetuation of negative stereotypes. The most common, the paternalistic stereotype, portrays people with a disability as high in warmth and low in competence (Fiske et al. 2002). Following this line of reasoning, we would expect physically-disabled models to have a negative impact on consumers' attitudes and choices, because the stigma associated with the disability should be transferred from the model to the brand. However, according to social categorization theory (Kunda, Miller, and Claire 1999) a disabled model belongs to two social categories: first, a person with a disability and hence part of a stigmatized minority, and second, as a model, an admirable subgroup. When looking at a disabled person that is also a model, people infer that s/he must have been through many difficulties. What previously was a negative attribute becomes a signal of the model's strength and determination. Therefore, ads with disabled models shift the negative stereotypical view of people with a disability and increase consumers' attitudes. We tested whether disabled models have a positive impact on consumers' attitudes (study 1), and emotional responses (study 2). We further investigated whether the findings are due to social desirability (study 3). Finally, in a field experiment, we tested whether energy drinks advertised with disabled models are preferred in private as well as public choices (study 4).

Study 1, a between-participants study ($N = 159$; M-Turk), tested whether ads with disabled models enhance attitudes. Participants were assigned to one of two conditions (disability vs control). We created two versions of two ads, one with a model (control) and another identical ad except the same model was missing a limb (disability). Compared to the control condition, ads with disabled models were rated more favorably ($M_{disabled} = 4.30$, $SD = 1.09$, $M_{control} = 3.87$, $SD = .85$; $F(1, 153) = 7.32$, $p < .01$, Cohen's $d = .43$).

Study 2, a between-participants study ($N = 200$; lab), replicated the previous result and, in addition, tested the effect of disabled models on consumers' emotional responses, perception of novelty and willingness to buy. Participants were randomly assigned to one of the two conditions (disability vs control) and saw four advertisements. Disabled models evoked more pity ($M_{disabled} = 3.90$, $SD = 1.39$, $M_{control} = 3.25$, $SD = 1.30$; $F(1, 199) = 11.55$, $p < .001$, Cohen's $d = .48$), and to a lesser extent also more negative emotions ($M_{disabled} = 2.43$, $SD = 1.01$, $M_{control} = 2.17$, $SD = 1.10$; $F(1, 200) = 3.10$, $p = .08$, Cohen's $d = .25$). They evoked also more positive emotions ($M_{disabled} = 3.94$, $SD = 1.03$, $M_{control} = 2.99$, $SD = .93$; $F(1, 199) = 46.72$, $p < .001$, Cohen's $d = .97$), greater admiration for the model ($M_{disabled} = 4.66$, $SD = 1.10$, $M_{control} = 3.15$, $SD = 1.07$; $F(1, 199) = 95.40$, $p < .001$, Cohen's $d = 1.38$), and were judged as more novel ($M_{disabled} = 4.74$, $SD = .90$, $M_{control} = 3.38$, $SD = .94$; $F(1, 199) = 107.82$, $p < .001$, Cohen's $d = 1.18$). Disabled models enhanced participants' attitudes ($F(1, 199) = 13.79$, $p < .001$, Cohen's $d = .53$) and increased their willingness to buy ($M_{disabled} = 3.19$, $SD = .97$, $M_{control} = 2.66$, $SD = .96$; $F(1, 199) = 14.99$, $p < .001$, Cohen's $d = .55$).

Study 3 ($N = 298$; lab; preregistered) tested if previous results were driven by social desirability bias, using a response deadline procedure. If social desirability is acting, participants should have an immediate negative reaction to the ad and then subsequently adjust their answer more positively. If this is the case, we would expect to see a positive effect only if it has enough time to emerge, such as going from one to two seconds. Participants were exposed to both ads with disabled models and controls and were asked to evaluate them (on a 3-point scale) within either 1 or 2 seconds (between-participants). Again, ads with disabled models were evaluated more positively in the one second condition ($M_{disabled} = 1.80$, $SD = .49$, $M_{control} = 1.63$, $SD = .34$; $F(1, 149) = 14.10$, $p < .001$, $\eta^2 = .08$), and in the two seconds condition ($M_{disabled} = 1.86$, $SD = .50$, $M_{control} = 1.60$, $SD = .37$; $F(1, 149) = 37.17$, $p < .001$, $\eta^2 = .20$). The effect did not interact with the response deadline ($p = .139$), suggesting the absence of social desirability bias.

Study 4, a field experiment ($N = 300$, preregistered), tested if previous results were driven by participants' impression management by manipulating anonymity of choice. Participants were recruited in the gym of a European university. A research assistant approached gym members while they were entering the gym and offered an energy drink for free. Both drinks were advertised, the ad for one drink pictured a disabled model, while the other pictured the control. Participants were brought into a room where they could choose the drink. In the private condition, participants were left alone while choosing. In the public condition, they communicated their choice to the research assistant. Participants preferred the drink advertised by the disabled model whether they made their choice in private (60.1%) or in public (68.4%; both percentages are greater than 50%, z's > 2.38, p's < .001) and choice did not differ across conditions ($\chi^2 (1) = 2.24$, p = .134).

The present study contributed to the literature in advertising by considering a specific minority that has not been studied before. Our studies suggest that disabled models enhance attitudes, evoke positive emotional responses and increase choice both in private and in public.

Belief-based Discrimination: Beauty Premium and Beauty Penalty

Arrow, Kenneth. (1973), "*The theory of discrimination. Ashenfelter O, Rees*" A ed. Discrimination in labor markets, Princeton University Press, Princeton, 3-33.

Becker, Gary. (1957)," *The Economics of Discrimination,*" University of Chicago Press, Chicago.

Bohren, J. Aislinn, Alex Imas, and Michael Rosenberg. (2019)," The dynamics of discrimination: Theory and evidence," *American Economic Review*, 109 (October), 3395-3436.

Dion, Karen, Ellen Berscheid, and Elaine Walster. (1972), "What is beautiful is good," *Journal of Personality and Social Psychology*, 24 (March), 285-290.

Feingold, Alan. (1992), "Good-looking people are not what we think," *Psychological Bulletin*, 111 (February), 304-341.

Langlois, Judith H., Lisa Kalakanis, Adam J. Rubenstein, Andrea Larson, Monica Hallam, and Monica Smoot. (2000), "Maxims or myths of beauty? A meta-analytic and theoretical review," *Psychological Bulletin*, 126 (March), 390-423.

Mobius, Markus M., and Tanya S. Rosenblat. (2006), "Why beauty matters," *American Economic Review,* 96 (January), 222-235.

Phelps, Edmund S. "The statistical theory of racism and sexism," (1972), *American Economic Review, 62* (April), 659-661.

Racial Discrimination in Customer Service: A Field Experiment

AHLA. 2015. Lodging Industry Trends 2015. Retrieved from: https://www.ahla.com/sites/default/files/Lodging_Industry_Trends_2015.pdf

Bertrand, Marianne, and Sendhil Mullainathan. (2004), "Are Emily and Greg more employable than Lakisha and Jamal? A field experiment on labor market discrimination," *American Economic Review*, 94 (April), 991-1013.

Milkman, Katherine L., Modupe Akinola, and Dolly Chugh. (2012),"Temporal distance and discrimination: An audit study in academia," *Psychological Science*, 23 (June), 710-717.

Milkman, Katherine L., Modupe Akinola, and Dolly Chugh. (2015), "What happens before? A field experiment exploring how pay and representation differentially shape bias on the pathway into organizations," *Journal of Applied Psychology*, 100 (June), 1678-1712.

Tilcsik, András. (2011), "Pride and prejudice: Employment discrimination against openly gay men in the United States,*"* *American Journal of Sociology,* 117 (February), 586-626.

Paying for Parity: Consumer Response to Gender Pay Gaps

Alderman, L. (2018). Britain aims to close gender pay gap with transparency and Shame. *The New York Times*, [available at https://www.nytimes.com/2018/04/04/business/britain-gender-pay-gap.html].

Benedetti, Arianna H., and Serena Chen. (2018), "High CEO-to-worker pay ratios negatively impact consumer and employee perceptions of companies," *Journal of Experimental Social Psychology*, 79 (November), 378-393.

Blau, Francine D., and Lawrence M. Kahn. (2017)," The gender wage gap: Extent, trends, and explanations," *Journal of Economic Literature*, 55 (March), 789-865.

Leventhal, Gerald S., and Douglas W. Lane. (1970), "Sex, age, and equity behavior "*Journal of Personality and Social Psychology*, 15 (April), 312-316.

Mohan, Bhavya, Tobias Schlager, Rohit Deshpandé, and Michael I. Norton. (2018), "Consumers Avoid Buying From Firms With Higher CEO-to-Worker Pay Ratios," *Journal of Consumer Psychology*, 28 (February), 344-352.

Ordabayeva, Nailya and Pierre Chandon. (2011), "Getting ahead of the Joneses: When equality increases conspicuous consumption among bottom-tier consumers," *Journal of Consumer Research*, 38 (June), 27-41.

Pfarrer, Michael D., Timothy G. Pollock, and Violina P. Rindova. (2010), "A tale of two assets: The effects of firm reputation and celebrity on earnings surprises and investors' reactions," *Academy of Management Journal*, 53 (May), 1131-1152.

Preacher, Kristopher J., and Andrew F. Hayes. (2008), "Asymptotic and resampling strategies for assessing and comparing indirect effects in multiple mediator models," *Behavior Research Methods*, 40 (March), 879–91.

Witt, L. Alan, and Lendell G. Nye. (1992), "Gender and the relationship between perceived fairness of pay or promotion and job satisfaction," *Journal of Applied Psychology*, 77 (June), 910-917.

Yoon, Sunyee, and Hyeongmin Christian Kim. (2018), "Feeling economically stuck: The effect of perceived economic mobility and socioeconomic status on variety seeking," *Journal of Consumer Research*, 44 (May), 1141–1156.

Uncommon Beauty: Physically Disabled Models Positively Affect Consumers' Attitudes and Choices

Deshpandé, Rohit, and Douglas M. Stayman. (1994), "A tale of two cities: Distinctiveness theory and advertising effectiveness," *Journal of Marketing Research*, 31 (January), 57-64.

Fiske, Susan T., Amy JC Cuddy, Peter Glick, and Jun Xu. (2002),"A model of (often mixed) stereotype content: Competence and warmth respectively follow from perceived status and competition," *Social Cognition*, 82 (January), 878-902.

Kunda, Ziva, Dale T. Miller, and Theresa Claire. (1990), "Combining social concepts: The role of causal reasoning," *Cognitive Science*, 14 (April), 551–577.

Difficult by Design: Choice Difficulty and Effort in Decision Making

Chairs: Elina Yewon Hur, Cornell University, USA
Kaitlin Woolley, Cornell University, USA

Paper #1: The Objectivity Illusion of Ranking Procedures: How and Why Ranking Alleviates Decision Difficulty

Yonat Zwebner, Interdisciplinary Center (IDC), Israel
Rom Y. Schrift, Indiana University, USA

Paper #2: Roads or Rome? How Product Categorization Shapes the Attributions and Consequences of Choice Difficulty

Xiang Wang, University of Florida, USA
Aner Sela, University of Florida, USA

Paper #3: Nuanced Effects of Decision Effort on Decision Confidence in Matters of Quality versus Matters of Taste

Nahid Ibrahim, University of Alberta, Canada
Gerald Häubl, University of Alberta, Canada

Paper #4: Hidden Benefits of Hiding the Best Option: Consumers Value Their Selection More When Discovering it Later

Elina Yewon Hur, Cornell University, USA
Kaitlin Woolley, Cornell University, USA
Yanping Tu, University of Florida, USA

SESSION OVERVIEW

How difficult was your last decision? How did this difficulty during the decision process affect your choice? Consumers often face difficult decisions (Tversky and Shafir 1992). Choice difficulty shapes, and is shaped by, effort invested in the decision process (Dhar 1997; Iyengar and Lepper 2000). The proposed session joins together four papers offering a new perspective on these questions, examining how features of the choice context and decision process affect perceived choice difficulty, with implications for consumers' information search. They further examine perceived and objective effort invested in choosing, with outcomes for choice confidence and valuation of their chosen product.

The first two papers examine novel factors that influence consumers' perception of how difficult a choice is. **Zwebner and Schrift** (N=955) identify how preference-elicitation modes (choice vs. rank-ordering) affect perceived choice difficulty. Although rank-ordering requires more effort than simply choosing a preferred option, these authors found that rank-ordering *reduces* perceived choice difficulty. This effect occurs because rank-ordering makes judgments feel more objective. **Wang and Sela** (N=1,224) investigate how product categorization influences attributions of choice difficulty, and implications for consumers' information search behavior. When products are framed in *different* categories, consumers perceive that the options represent distinct goals and therefore attribute choice difficulty to preference uncertainty (i.e., to the self - "I am not sure what I want"). In contrast, when products are framed under the *same* category, consumers see the options as representing means to an overarching goal and attribute choice difficulty to preference matching (i.e., to the option - "These options are not what I want"). This differential attribution of choice difficulty to the self (vs. options) drives search behavior; people seek information to discover their own preferences, but seek alternative choices when they feel the option is to blame.

The remaining papers examine how consumers' effort evaluation shapes preferences and choice. **Ibrahim and Häubl** (N=2,335) examine when and why exerting greater effort increases decision confidence. Specifically, when consumers put more effort (e.g., time) into the decision process, they feel less confident about decisions that are "matters of quality" but more confident about decisions that are

"matters of taste." Lastly, **Hur, Woolley, and Tu** (N=1,425) examine how choice architecture can affect consumers' subjective evaluations of the effort they put into a decision. When holding actual effort invested constant, consumers perceive their effort had a bigger payoff, that is, was better spent and more worthwhile, when they discover the best option at the end (vs. beginning) in a choice set. As a result, even though consumers all chose the same best option, those who found this option at the end (vs. beginning) valued it more and were more committed to their choice.

Together, this session advances our understanding of how choice difficulty and objective and subjective effort investment affect consumers' decision processes and search behavior. This session offers broad appeal on how choice structure can enhance or mitigate perceived effort and the consequences of choice difficulty on consumers' decisions.

The Objectivity Illusion of Ranking Procedures: How and Why Ranking Alleviates Decision Difficulty

EXTENDTED ABSTRACT

The degree to which consumers experience decision difficulty is an important and fundamental aspect of the decision-making process. For example, previous research demonstrated that experienced difficulty may elicit negative emotional states (e.g., Luce, Payne and Bettman 1999), cause consumers to end up choosing nothing (e.g., Iyengar and Lepper 2000), delay their choice (Dhar 1997, Tversky and Shafir 1992), increase the need to justify the decision (Shafir, Simonson, and Tversky 1993), and increase the likelihood to compromise (e.g., Novemsky et al. 2007). Additionally, the subjective experience of decision difficulty has been shown to also impact consumers' tendency to engage in simplifying and complicating behaviors (e.g., Schrift, Netzer and Kivetz 2011, Schrift, Kivetz, Netzer 2016) and could even play an important role when observing others making decisions (e.g., Schrift and Amar 2015).

Indeed, as the subjective experience of difficulty impacts variety of different behaviors, understanding what factors increase or decrease it, is important from both theoretical and applied perspectives. The current work focuses on how the preference elicitation mode impacts consumers' experience of difficulty. In particular, we focus on two prominent modes, namely, choice and rank-ordering.

When comparing a choice task to a ranking task, it is quite intuitive to expect that a ranking task will elicit greater experience of difficulty (supported by a pilot study (N=100) where 76% of people believed that choosing would be easier for them than rank-ordering). That is, while choosing includes the selection of one option that offers the greatest utility, rank-ordering includes the same selection (i.e. ranked first), as well as the ordering of all the other options in the set. Thus, the operations required to make a choice are embedded in those required to complete the ranking procedure. However, in the current research we repeatedly find that consumers' experienced difficulty is actually lower when asked to rank as opposed to choose among the options. That is, even though the outcome of the ranking procedure is identical to that of the choice (i.e., consumers are fully aware that the option they rank first is the one they will eventually receive), framing the process as ranking as opposed to choosing decreases the difficulty that consumers experience.

Following recent research on consumer's perceived objectivity vs. subjectivity in judgement (Berman et al., 2018; Goodwin and Darley 2008; Spiller and Belogolova 2017) we find that ranking compared to choosing increases perceptions of objectivity in judgment and, therefore, reduces the associated decision difficulty. That is, while choosing highlights subjective evaluation criteria (i.e., a matter of taste), ranking procedures increases the perceived objectivity of the decision and eases the selection process.

Study 1 (N=217, lab), utilized an incentive-compatible paradigm in which participants viewed five products and either chose their most preferred product, or rank-ordered the products according to their preferences. Across both conditions we informed participants that their most preferred product (chosen or top-ranked) is the one they will receive should they win a lottery that was conducted. After choosing or rank-ordering, participants rated the difficulty they experienced using five items (Cronbach α=.88). Results confirmed that compared to the difficulty experienced in choice (*M*=3.42, *SD*=1.3) ranking reduced the experienced difficulty (*M*=2.54, *SD*=1.02; *t*(215)=5.49, *p*<.001). Interestingly, this difference was despite the fact that participants spent more time ranking the options (*p*<.001).

In Study 2 (N=199, MTurk) participants received only two options and were asked to either choose or rank-order the two options (between-subjects). Because the set consisted of only 2 options, the actual task in both conditions, is virtually identical. Results confirmed that even when only two options were available, participants still felt lower degree of difficulty in the rank (*M*=3.24, *SD*=1.49) compared to the choice condition (*M*=3.74, *SD*=1.5; *t*(197)=2.35; *p*=.02). Thus, these finding suggest that the effect is driven by how people construe the task and not by the actual cognitive operations required to performing it.

In Study 3 (N=160, lab) we aimed to further examine why consumers construe the same decision differently when choosing compared to ranking. After either choosing or ranking, participants were asked to indicate (on a 1-7 scale) the extent to which they found the (i) selection of a TV and (ii) differences among TVs, to be a matter of taste or a matter of quality. As hypothesized, participants in the ranking condition indicated greater objectivity for their selected TV (*M*=5.29, *SD*=1.34) as well as for the differences among TVs (*M*=5.13, *SD*=1.33) compared to those in the choice condition (*M*=4.53, *SD*=1.74; *t*(158)=3.12, *p*=.002, and *M*=4.53, *SD*=1.53; *t*(158)=2.66, *p*=.009, respectively). Further, 68.8% in the ranking condition indicated that their chosen option is objectively better compared to only 51.2% in the choice condition (χ²(1)=5.1, *p*=.024).

Study 4 (N=279, lab) replicated the effect observed in Studies 1-2 (*p*<.001) and the perceived objectivity effect demonstrated in Study 3 (*p*=.026) and extended these findings by testing the mediating role of perceived objectivity on experienced difficulty. Employing a similar design to Study 3, a mediation analysis (using the macro PROCESS, model 4, Hayes, 2013) confirmed that the perceived objectivity mediated the effect of elicitation mode (choice vs. rank) on participants' experience of difficulty (B=-.09; 95% CI=[-.19, -.02]).

To summarize, we find that ranking, although takes longer and requires greater cognitive operations, reduces experienced decision difficulty as it fosters greater perceived objectivity of the selection process. We discuss the applied contribution of these findings given the prevalence of decision aids that could foster ranking procedures as opposed to direct choice.

Roads or Rome? How Product Categorization Shapes the Attributions and Consequences of Choice Difficulty

EXTENDED ABSTRACT

Consumers often experience choice difficulty while making decisions (Broniarczyk and Griffin 2014; Sela and Berger 2012), and they often cope with such experiences by deferring choice and prolonging their information search (Corbin 1980; Dhar 1997; Dhar and Simonson 2003). But how do people select the specific strategy for coping with choice difficulty? For example, when do they seek more information on existing alternatives as opposed to new alternatives, or try to figure out their own preferences?

Choice difficulty may be attributed internally, to preference uncertainty (e.g., "I am not sure what I want"), or externally, to qualities of the available options (e.g., "the available options are not good enough"). Each of these possible attributions has distinct implications for information search, namely, seeking information about how the options differ in an attempt to form a preference, versus seeking other, presumably better options, respectively.

We argue that framing the choice options as representing different categories (e.g., "2-in-1", "ultraportable", "gaming") leads consumers to construe the decision as choosing among different goals, whereas framing them as representing one overarching category (e.g., "laptops") leads them to perceive the decision as choosing among different means to a goal. We argue this based on the notion that category labels often indicate the consumption goals associated with products under the category (Lamberton and Diehl 2013). Goals are self-diagnostic, because they are seen as desired end-states of the self (Carver and Scheier 1990, 1998; Chartrand et al. 2008; Sela and Shiv 2009), whereas means are more instrumental and situationally determined (Kruglanski et al. 2002; van Osselaer and Janiszewski 2012). Consequently, we propose that, to the extent that consumers experience choice difficulty, distinct product categories lead consumers to attribute choice difficulty to the self (as opposed to the available options) and, therefore, seek information that may help them discover their own preferences. Conversely, a single product category frame leads them to attribute difficulty to the options available (as opposed to the self) and, therefore, seek other choice alternatives.

Experiment 1 examines the effect of categorization on information search, using consequential choice. Participants saw three tea bag options from which to choose, each described on several attributes, framed as representing either the same category or different categories. Product attributes were the same across conditions and category labels provided no additional information not already contained in the attributes. Presumably to help them with the decision, we offered participants the option to view either additional information about the existing options that can help them figure out what type of tea bag they want or, instead, to view other options altogether, corresponding to preference uncertainty and option quality attributions, respectively. They also rated their subjective feelings of choice difficulty. Participants were more likely to seek detailed information about the existing options in the different-categories condition (*M*=70%) than in the same-category condition (*M*=47%; χ²(1)=7.08, *p*=.008). Supporting our suggestion that this effect reflects attributions of choice difficulty, it was pronounced when difficulty was moderate-to-high (greater than 3.13 on a 7-point scale) but attenuated when participants experienced no difficulty (moderation β=.57, Wald=4.43, *p*=.035). Categorization had no effect on difficulty itself.

Experiment 2 examines how product categorization influences attributions of choice difficulty. Participants saw three laptop mod-

els, framed as representing either one category ("laptops") or different categories ("ultraportable", "performance", "premium display"). Participants rated choice difficulty and indicated whether the difficulty was due to preference uncertainty (e.g., "I am not sure what exactly I want") or the options (e.g., "the options do not perfectly fit my wants"). As expected, participants were more likely to attribute choice difficulty to preference uncertainty in the different-categories condition (M=4.22 on a 7-point scale: 1=attribute to preference uncertainty, 7=attribute to option availability) than in the same-category condition (M=4.99; $F(1,98)$=9.40, p=.003). There was no effect on choice difficulty itself or perceived option similarity, variability, and comparability.

Experiment 3 tests the mediating role of participants' perception that they chose among goals versus means. Participants saw four mutual fund options, framed as representing either one or different categories. Compared with the same-category condition, participants in the different-categories condition attributed difficulty to preference uncertainty more ($F(1, 195)$=9.07, p=.003) and indicated that they thought more during the decision about which financial goal they would like to achieve rather than which option would best serve their financial goals ($F(1, 195)$=3.90, p=.050). This measure of thought process mediated the effect of categorization on attribution ($\beta_{indirect}$=.10, 95% CI=[.01,.26])

Experiment 4 uses the same scenario to provide further insight into the process. If using multiple (vs. single) product categories affects attributions by leading people to perceive that they are choosing among goals (vs. means), then drawing participants' attention, in both conditions, to their personal goals before the decision should attenuate this effect, because it should increase goal-based choice regardless of product categorization. Consistent with our logic, the effect of product categorization on choice difficulty attributions replicated in the baseline condition ($F(1,690)$=8.64, p=.003), but was attenuated when participants answered several questions regarding their financial goals before seeing the four mutual fund options ($F(1, 690) < 1$, NS; interaction $F(1,690)$=5.00, p=.026). Choice difficulty did not differ across the four conditions.

Experiment 5 further examines the downstream effect of attributions on information search. Participants saw three wine options, framed as representing either one category (i.e., dinner party wine) or different categories (i.e., pre-dinner wine, table wine, dessert wine). Compared with the same-category condition, participants in the different-categories condition attributed choice difficulty to preference uncertainty more ($F(1,98)$=5.35, p=.023). This, in turn, led them to indicate that they would prefer to view additional information that could help them discover what they wanted rather than see other options (72% vs. 52%; $\chi^2(1)$=4.24, p=.039; mediation $\beta_{indirect}$=.21, 95% CI=[.01,.69]).

Taken together, our findings provide novel insights on how product categorization influences consumer interpretations of choice difficulty and information search. In addition to their practical significance, the findings also make theoretical implications for goal systems and self-perception theories by showing the link between categorization, goal construal, and attribution to internal versus external sources of choice experiences.

Nuanced Effects of Decision Effort on Decision Confidence in Matters of Quality versus Matters of Taste

EXTENDED ABSTRACT

Effort, be it physical or mental, is quintessential to everyday consumer decision-making, and it has a profound impact on consumers' preference and choice appraisals. Although evidence suggests that exerting more mental effort increases metacognitive difficulty, resulting in low decision confidence (e.g., Dhar 1997; Iyengar and Lepper 2000; Tversky and Shafir 1992; see Anderson 2003 for a review), we theorize that, under some circumstances, exerting greater effort actually increases decision confidence.

We argue that whether exerting more effort in the decision process increases or decreases decision confidence (Parker et al. 2016; Thomas and Menon 2007; Zakay 1985) is a function of consumers' effort sensitivity (the strength of the relationship between effort exertion and consumers' judgment of metacognitive difficulty) in a particular domain and its impact on the inferences consumers draw from their effort exertion.

We theorize that consumers tend to be more effort sensitive when they consider effort exertion to be detrimental in achieving the desired decision outcome and less effort sensitive when they consider effort exertion to be beneficial in achieving the desired decision outcome. We demonstrate that consumers are systematically more effort sensitive in domains that are considered "matters of quality" (where alternatives *can* be rank-ordered based on product features reflecting objective quality) than in domains considered "matters of taste" (where alternatives *cannot* be rank-ordered in terms of objective quality). This divergence in effort sensitivity in turn differentially impacts two distinct aspects of decision confidence – preference clarity (i.e., to what extent consumers' choices reflect their true inclination) and preference correctness (i.e., to what extent choices can be validated or justified by normative preferences) (Olson et al. 1983; Petrocelli et al. 2007).

In quality domains, consumers tend to attribute the locus of their evaluations to product features and consider normative preferences for these features (i.e., rank-ordering) to be diagnostic of the optimality of their own choices. In this case, exerting more (vs. less) effort in the decision process *undermines* inferences about preference correctness, in turn *diminishing* decision confidence. By contrast, in taste domains, consumers tend to attribute the locus of their evaluations to personal preferences and consider normative preferences for product features to be less diagnostic of the optimality of their own choices. In this case, exerting more (vs. less) effort in the decision process *promotes* inferences about preference clarity, in turn *increasing* decision confidence. We present evidence from five studies that were designed to test this conceptual model (see figure 1).

In study 1 (N=245), we tested consumers' predisposition toward exerting effort across 16 different product domains (adapted from Spiller and Belogolova 2017). We found that, on average, consumers are willing to exert more effort (i.e., actively spend time; log-transformed) in the decision process when they consider a domain to be more of a matter of quality versus more of a matter of taste (b=.086, SE=.004, p<.001; see figure 2). This finding is consistent with our theorizing but not fully conclusive, particularly since the 16 domains differed considerably in economic significance (e.g., Chaiken and Maheswaran 1994; Petty and Wegener 1998). We controlled for this in subsequent studies by using quality and taste domains with similar price ranges. Using product-choice paradigms, we manipulated the amount of decision effort exerted by varying aspects of the choice architecture, such as the number of alternatives to be inspected, as well as the format and timing of information presentation.

Both studies 2 (N=488) and 3 (N=503) showed that, as hypothesized, greater effort exertion reduced decision confidence in quality domains (e.g., electric toothbrushes) but increased decision confidence in taste domains (e.g., coffee tables) (ps<.05). We estimated a bias-corrected moderated mediation model (Hayes 2013; 5,000 bootstrap samples) in each study. Our analyses revealed that in quality domains, inferences about preference clarity and prefer-

ence correctness were interdependent and corresponded to decision effort similarly. In this case, greater effort exertion diminished both preference clarity and preference correctness, in turn reducing decision confidence ($ps<.05$). By contrast, in taste domains, inferences about preference clarity and preference correctness were independent and corresponded to decision effort distinctively. In this case, greater effort exertion reduced preference correctness but enhanced preference clarity, in turn increasing decision confidence ($ps<.001$). These effects were robust to chronic individual differences in effort valuation (i.e., need for cognition, $\alpha=.96$; Cacioppo and Petty 1982; Cacioppo et al. 1984).

In study 4 (N=499), we tightly controlled for the hedonic versus utilitarian nature of the decision domain by asking participants to choose within a common product domain (i.e., electric toothbrushes). We manipulated the set of alternatives so as to make the choice among them either a matter of quality (products varied in objective quality and price, but not in their ergonomic and aesthetic properties) or a matter of taste (products varied in their ergonomic and aesthetic properties, but not in objective quality or price). The results showed again that greater effort exertion reduced confidence in quality domains but increased confidence in taste domains ($p=.032$; figures 3a–3d).

In study 5 (N=603), we distinguished between instrumental decision effort (the effort exerted in considering and reasoning about products: 20 vs. 5 alternatives) and incidental decision effort (the effort exerted in merely obtaining product information: 40 vs. 10 seconds). Using a 3 (decision effort: low instrumental–high incidental vs. low instrumental–low incidental vs. high instrumental–low incidental) x 2 (domain: quality vs. taste) between-subjects product-choice paradigm, we again found that exerting more effort diminished confidence in quality domains (i.e., power banks) but increased confidence in taste domains (i.e., ceramic mugs) ($p=.071$; figures 4a–4d). Collapsing the levels of exerted decision effort to high versus low instrumental effort yielded the predicted interaction effect ($p=.020$), but collapsing the levels of exerted decision effort to high versus low incidental effort did not ($p=.378$), suggesting that instrumental decision effort is the key driver of the predicted effects.

This research advances our understanding of the psychological forces that govern how decision effort informs decision confidence. Importantly, it pinpoints conditions under which choice architectures can benefit both firms and consumers by either promoting or restraining the exertion of decision effort.

Hidden Benefits of Hiding the Best Option: Consumers Value Their Selection More When Discovering it Later

EXTENDED ABSTRACT

Consumers often suffer from choice overload. They at times face endless options in stores and online that they need to sort through to find a product that fits their need. To address this, companies have begun offering curated products that limit the search process and help consumers narrow in on the best option for them (Cha et al. 2018). For example, online dating apps limit the number of potential relationship partners users can view and connect with per day, and Book of the Month, a book subscription service, recommends five books every month with reviews, and consumers read each review from curators before ordering a book to read.

When searching through a limited choice set, consumers often learn about options in a specific order. When arranging such a choice set, should marketers present the best option - the one that consumers are likely to prefer the most in the set - at the beginning of the sequence or save it for last?

The current research explores a hidden benefit of saving the best option late: Presenting the best option at the end (vs. beginning) increases consumers' valuation of the selected option. This is because, when searching within a limited choice set, discovering the best option at the end (vs. beginning) leads consumers to perceive that the effort they put into finding the best option paid off more – that is, was well spent and worthwhile (Delleart and H*a*übl 2012). We propose that such benefits arise because consumers perceive that they have made more progress in their search (Harkin et al. 2016). As such, finding the best option at the end (vs. beginning) has key consequences for consumers' enhanced valuation of their chosen option, as the positive experience of the search process transfers to the outcome of search (Fishbach et al. 2004).

Five studies (N=1,325) test our theory. Study 1 examined effort payoff using an incentive-compatible design. Participants opened five gift boxes containing different financial payouts with the goal of discovering the highest prize to claim as a bonus. Participants in the best-option-beginning condition viewed the highest prize first ($0.22) before viewing four lower prize amounts; participants in the best-option-end condition viewed the four lower prize amounts first and found the highest prize ($0.22) at the end. After selecting their prize, we measured how much participants felt their effort paid off. As predicted, those who found the best option at the end (vs. beginning) felt their effort paid off more ($M_{end}=5.03$; $M_{beginning}=4.05$; $t(136)=3.75$, $p<.001$, $d=.64$).

Study 2 extended these results when searching for a rental on Airbnb. Participants searched through five different rentals before making their selection. We manipulated the order of the highest rated option so that it appeared either at the beginning or end of the choice set. Participants who found the best option at the end (vs. beginning) felt their effort paid off more ($M_{end}=5.92$; $M_{beginning}=5.00$; $F(1,161)=13.99$, $p<.001$, $\eta_p^2=.08$).

Study 3 examined our proposed process, that people feel a greater sense of effort payoff when finding the best option at the end because they experience a sense of progress during their search. To test this, we manipulated the presentation order of the highest rated restaurant as in study 2, and manipulated the sense of progress (present vs. absent) by presenting options sequentially versus simultaneously. In the progress-present-condition, participants viewed all options one at a time, as in studies 1-2; in the progress-absent-condition, participants viewed all options at once, such that they were unable to feel a sense of progress during search. We found a significant interaction ($F(1, 340)=3.85$, $p=.051$, $\eta_p^2=.011$; figure 5); finding the best option at the end (vs. beginning) increased perceived effort payoff only for those who could experience search progress ($M_{end}=6.23$; $M_{beginning}=5.60$; $F(1, 340)=11.00$, $p=.001$, $\eta_p^2=.03$), which attenuated when there was no search progress experience ($p=.58$).

Study 4 provided additional process evidence by measuring consumers' perceptions of progress during their search and we examined a consequence of this effect - that people value their selected option *more* when they feel greater effort payoff. Participants searched through a set of environmental non-profits with the goal of choosing one charity to donate to. Participants who found the highest rated non-profit at the end (vs. beginning) of their search felt greater effort payoff ($M_{end}=5.39$; $M_{beginning}=4.91$; $t(308)=2.81$, $p=.007$, $d=.31$). Finding the best option at the end also increased valuation of the chosen option; these participants were more willing to recommend their selected non-profit to others ($M_{end}=5.97$; $M_{beginning}=4.79$; $t(308)=7.24$, $p<.001$, $d=.82$). A serial mediation analysis supported our predictions; finding the best non-profit at the end (vs. beginning) increased perceived progress in search, which increased effort payoff, leading participants to be more likely to recommend their selected non-profit

to others ($\beta_{indirect}$=.10, 95% CI=[.01,.21]; PROCESS model 6; Hayes and Preacher 2014) (figure 6).

Our final study demonstrated another consequence of presentation order. Participants viewed five apartment options and chose one to rent. When the participants found the best apartment at the end (vs. beginning), they were more willing to submit an application to rent the apartment sooner without viewing additional options (M_{end}=6.49; $M_{beginning}$=6.06; $t(197)$=2.92, p=.004, d=.51). This effect was mediated by greater perceived effort payoff when the best option was at the end (vs. beginning) ($\beta_{indirect}$=.43, 95% CI=[.23, .68]).

Overall, we find that showing the best option at the end (vs. beginning) can increase perceived payoff from search and increase valuation of the chosen option. This research contributes to literature on search (Delleart and Häubl 2012) and effort perception (Kim and Labroo 2011). Additionally, we connect literature on goal (Harkin et al. 2016) to demonstrate that perceived progress in search drives this effect. Lastly, these results offer managerial implications, as finding the best option at the end increased willingness to recommend the selected option and increased choice commitment.

REFERENCES

Anderson, Christopher J. (2003), "The Psychology of Doing Nothing: Forms of Decision Avoidance Result from Reason and Emotion," *Psychological Bulletin,* 129 (1), 139–66.

Berger, Jonah (2016), "Does Presentation Order Impact Choice After Delay?" *Topics in Cognitive Science,* 8 (3), 670-84.

Berman, Jonathan Z., Alixandra Barasch, Emma E. Levine, and Deborah A. Small (2018), "Impediments to Effective Altruism: The Role of Subjective Preferences in Charitable Giving," *Psychological Science,* 29 (5), 834-44.

Broniarczyk, Susan M., and Jill G. Griffin (2014), "Decision Difficulty in the Age of Consumer Empowerment," *Journal of Consumer Psychology*, 24 (4), 608-25.

Cacioppo, John T. and Richard E. Petty (1982), "The Need for Cognition," *Journal of Personality and Social Psychology, 42*(1), 116–31.

Cacioppo, John T., Richard E. Petty, and Chuan F. Kao (1984), "The Efficient Assessment of Need for Cognition," *Journal of Personality Assessment*, 48(3), 306–07.

Carver, Charles S. and Michael F. Scheier (1990), "Origins and Functions of Positive and Negative Affect: A Control-Process View," *Psychological Review*, 97 (1), 19–35.

——— (1998), *On the Self-Regulation of Behavior*, New York: Cambridge University Press.

Cha, Hoon S., Soeun You, KwangWook Gang, and Minseok Park (2018), "The Value and Risk of Curated Shopping: Online Consumer's Choice," *International Journal of Business and Information*, 13 (3), 321-49.

Chaiken, Shelly and Durairaj Maheswaran (1994), "Heuristic Processing can Bias Systematic Processing: Effects of Source Credibility, Argument Ambiguity, and Task Importance on Attitude Judgment," *Journal of Personality and Social Psychology*, 66 (3), 460–73.

Chartrand, Tanya L., Joel Huber, Baba Shiv, and Robin Tanner (2008), "Nonconscious Goals and Consumer Choice," *Journal of Consumer Research*, 35 (2), 189–201.

Corbin, Ruth M. (1980), "Decisions That Might Not Get Made," in *Cognitive Processes in Choice and Decision Behavior*, ed. T. S. Wallsten, Hillsdale, NJ: Erlbaum.

Dellaert, Benedict GC, and Gerald Häubl (2012), "Searching in Choice Mode: Consumer Decision Processes in Product Search with Recommendations," *Journal of Marketing Research,* 49 (1), 277-88.

Diehl, Kristin, and Gal Zauberman (2005), "Searching Ordered Sets: Evaluations from Sequences Under Search," *Journal of Consumer Research,* 31 (4), 824-32.

Dhar, Ravi (1997), "Consumer Preference for a No-Choice Option," *Journal of Consumer Research,* 24 (2), 215–31.

Dhar, Ravi, and Itamar Simonson (2003), "The Effect of Forced Choice on Choice," *Journal of Marketing Research*, 40 (2), 146-60.

Drolet, Aimee, Mary Frances Luce, and Itamar Simonson (2009), "When Does Choice Reveal Preference? Moderators of Heuristic Versus Goal-Based Choice," *Journal of Consumer Research*, 36 (1), 137-47.

Goodwin, Geoffrey P., and John M. Darley (2008), "The Psychology of Meta-Ethics: Exploring Objectivism," *Cognition,* 106 (3), 1339-66.

Harkin, Benjamin, Thomas L. Webb, Betty PI Chang, Andrew Prestwich, Mark Conner, Ian Kellar, Yael Benn, and Paschal Sheeran (2016), "Does Monitoring Goal Progress Promote Goal Attainment? A Meta-Analysis of the Experimental Evidence," *Psychological Bulletin,* 142 (2), 198-229.

Hayes, Andrew. F. (2013), *An Introduction to Mediation, Moderation, and Conditional Process Analysis: A Regression-Based Approach,* New York, NY: Guilford Press.

Hayes, Andrew F., and Kristopher J. Preacher (2014), "Statistical Mediation Analysis with a Multicategorical Independent Variable," *British Journal of Mathematical and Statistical Psychology,* 67 (3), 451-70.

Iyengar, Sheena S., and Mark R. Lepper (2000), "When Choice is Demotivating: Can One Desire Too Much of a Good Thing?," *Journal of Personality and Social Psychology,* 79 (6), 995-1006.

Kim, Sara and Aparna A. Labroo (2011), "From Inherent Value to Incentive Value: When and Why Pointless Effort Enhances Consumer Preference," *Journal of Consumer Research,* 38 (4), 712-42.

Kruglanski, Arie W., James Y. Shah, Ayelet Fishbach, Ron Friedman, Woo Young Chun, and David Sleeth-Keppler (2002), "A Theory of Goal Systems," in *Advances in Experimental Social Psychology*, Vol. 34, ed. Mark P. Zanna, San Diego: Academic Press, 331–78.

Lamberton, Cait Poynor, and Kristin Diehl (2013), "Retail Choice Architecture: The Effects of Benefit-and Attribute-Based Assortment Organization on Consumer Perceptions and Choice," *Journal of Consumer Research*, 40 (3), 393-411.

Luce, Mary Frances, John W. Payne, and James R. Bettman (1999), "Emotional Trade-Off Difficulty and Choice," *Journal of Marketing Research,* 36 (2), 143-59.

Miller, Joanne M. and Jon A. Krosnick (1998), "The Impact of Candidate Name Order on Election Outcomes," *Public Opinion Quarterly,* 62, 291-330.

Norton, Michael I., Daniel Mochon, and Dan Ariely (2012), "The IKEA Effect: When Labor Leads to Love," *Journal of Consumer Psychology,* 22 (3), 453-60.

Novemsky, Nathan, Ravi Dhar, Norbert Schwarz, and Itamar Simonson (2007), "Preference Fluency in Choice," *Journal of Marketing Research,* 44 (3), 347-56.

Olson, James M., Robert J. Ellis, and Mark P. Zanna (1983), "Validating Objective Versus Subjective Judgments Interest in Social Comparison and Consistency Information," *Personality and Social Psychology Bulletin*, 9(3), 427–36.

Parker, Jeffrey R., Donald. R. Lehmann, and Yi Xie (2016), "Decision Comfort," *Journal of Consumer Research*, 43 (1), 113–33.

Petrocelli, John V., Zakary L. Tormala, and Derek D. Rucker (2007), "Unpacking Attitude Certainty: Attitude Clarity and Attitude Correctness," *Journal of Personality and Social Psychology*, 92 (1), 30–41.

Petty, Richard. E. and Duane T. Wegener (1998), "Attitude Change: Multiple Roles for Persuasion Variables," in *The Handbook of Social Psychology,* Vol.4, ed. Daniel Gilbert, Susan Fiske, and Garner Lindzey, New York: McGraw-Hill, 323-90.

Schrift, Rom Y., Oded Netzer, and Ran Kivetz (2011), "Complicating Choice," *Journal of Marketing Research,* 48 (2), 308-26.

Schrift, Rom Y., and Moty Amar (2015), "Pain and Preferences: Observed Decisional Conflict and the Convergence of Preferences," *Journal of Consumer Research,* 42 (4), 515-34.

Schrift, Rom Y., Ran Kivetz, and Oded Netzer (2016), "Complicating Decisions: The Work Ethic Heuristic and the Construction of Effortful Decisions," *Journal of Experimental Psychology: General*, 145 (7), 807-29.

Sela, Aner, and Baba Shiv (2009), "Unraveling Priming: When Does the Same Prime Activate a Goal Versus a Trait," *Journal of Consumer Research*, 36 (3), 418-33.

Sela, Aner, and Jonah Berger (2012), "Decision Quicksand: How Trivial Choices Suck Us In," *Journal of Consumer Research*, 39 (2), 360-70.

Shaddy, Franklin, and Ayelet Fishbach (2018), "Eyes on the Prize: The Preference to Invest Resources in Goals Over Means," *Journal of personality and social psychology*, 115 (4), 624-37.

Shafir, Eldar, Itamar Simonson, and Amos Tversky (1993), "Reason-Based Choice," *Cognition*, 49 (1-2), 11-36.

Spiller, Stephen A., and Lena Belogolova (2017), "On Consumer Beliefs About Quality and Taste," *Journal of Consumer Research*, 43 (6), 970-91.

Thomas, Manoj and Geeta Menon (2007), "When Internal Reference Prices and Price Expectations Diverge: The Role of Confidence," *Journal of Marketing Research*, 44 (3), 401–09.

Touré-Tillery, Maferima, and Ayelet Fishbach (2012), "The End Justifies the Means, but Only in the Middle," *Journal of Experimental Psychology: General*, 141 (3), 570-83.

——— (2015), "It was (n't) me: Exercising Restraint When Choices Appear Self-Diagnostic," *Journal of Personality and Social Psychology*, 109 (6), 1117-31.

Tversky, Amos, and Eldar Shafir (1992), "Choice Under Conflict: The Dynamics of Deferred Decision," *Psychological Science*, 3 (6), 358-61.

Van Osselaer, Stijn MJ, and Chris Janiszewski (2012), "A Goal-Based Model of Product Evaluation and Choice," *Journal of Consumer Research*, 39 (2), 260-92.

Zakay, Dan (1985), "Post-Decisional Confidence and Conflict Experienced in a Choice Process," *Acta Psychologica*, 58, 75–80.

Working Papers

30% Human is Better Than 10% Human: Consumers' Sensitivity to Human Versus Machine Involvement in Production

Almira Abilova, Erasmus University Rotterdam, The Netherlands
Gizem Yalcin, Erasmus University Rotterdam, The Netherlands
Stefano Puntoni, Erasmus University Rotterdam, The Netherlands

Prior research shows that people prefer human-made to machine-made products but has not investigated preferences for products made with more vs. less human involvement. Using a newly developed paradigm we find that consumer preferences for products decrease as less human labor is involved and that this decrease is linear.

It Tastes Better For Me Just Because You Don't Like It: The Effect of Cognitive Dissonance on Product Enjoyment

Aya Aboelenien, HEC Montreal, Canada
Caroline Roux, Concordia University, Canada

Prior research on cognitive dissonance has mostly focused on understanding consumers' attitude and behavior after having to process counter attitudinal information. However little is known about the effect of cognitive dissonance on subjective consumption experiences. Across two experiments we investigate the effect of cognitive dissonance on subjective product enjoyment.

Markets as Contested Assemblages: Comparative Case Study

Aya Aboelenien, HEC Montreal, Canada
Jack Sadek, Concordia University, Canada

Through studying meat vape and cryptocurrency markets we investigate actors contesting the legitimacy of these markets and their strategies. Involved actors include industry associations specialized media consumers religious institutions federal agencies financial and scientific communities. Actors participate in strategies of problematization demarcation validation and affirmation.

When Indulgent Choice Can Promote the Next Indulgent Choice

Naoki Akamatsu, Meiji Gakuin University, Japan
Reo Fukuda, Asia University, Japan

This study discussed the impact of the result of the prior indulgent choice (buy or restraint) on subsequent indulgent choices. Whereas the conventional idea is that "restraint" of a prior choice promotes subsequent indulgent choices we clarified the conditions where "exercising" a prior choice facilitates subsequent indulgent choices.

The Vulnerable Refugee Mother: Consumption Responses to Identity Threats

Roua Alhanouti, University of Lille, France

This paper attempts to summarize a research investigating the experience of refugees' families in "transition phases" associated to forced migration. It considers strategies developed by mothers in consumer behavior to deal with identity threats. Research was conducted based on ethnographic approach. The study focuses on family identity and transitional challenges.

"Brands in Creative Processes"

Catia Carvalheiro Alves, Nova School of Business and Economics, Portugal
Irene Consiglio, Nova School of Business and Economics, Portugal
Luis Martinez, Nova School of Business and Economics, Portugal

I propose that brand preferences affect creative performance as well as accuracy of self-reported creativity. Professional creatives and consumers produce more creative work when they work for brands they like (vs. dislike). Also I observe a brand preference bias on successful forecasting of their own creative work.

Using Consumer Neuroscience to Explain Product Choice From Experience

Oriana Rachel Aragón, Clemson University, USA

Academics and practitioners increasingly are expending valuable resources studying consumer behavior through neuromarketing. Electroencephalogram (EEG) investigations have thus far gauged consumers' preferences for presented products. This is the first EEG investigation (N=135) to successfully capture consumers' nonproduct-related internal states to predict consumers' product choices made moments after EEG data collection.

Perceived Age of a Name: Adopting Age-based Names in Over-the-Top Media Content

Sunny Arora, S P Jain Institute of Management and Research, Mumbai, India
M. G. Parameswaran, S P Jain Institute of Management and Research, India
Unnati Dogra, Sardar Patel Institute of Technology,Mumbai, India
Sarah Hawa, Sardar Patel Institute of Technology,Mumbai, India

With media content exploding there is a need for character names befitting to their age. Names from the Indian voters' list and over-the-top media were analyzed using sound symbolism. When vowel and consonant sounds are of consistent frequency names with high-frequency sounds are perceived younger than names with low-frequency sounds.

Curious Abstraction: How Message Abstraction and Financial Scarcity Affect Processing of Mortgage Ads

Esra Asif, University of Leeds, UK
J. Josko Brakus, University of Leeds, UK
Alessandro Biraglia, University of Leeds, UK

Buying a house is one of the most important decisions consumers make in their lifetime weighing reality (e.g. their financial resources) against imagination (e.g. owning a mansion). We show that abundant - opposed to scarce - mindsets trigger consumer's curiosity when exposed to an abstract (vs. concrete) mortgage advertising frame.

Soul Inside the Machine: Product Morphology Influences Consumer Valuation

Sumitra Auschaitrakul, University of the Thai Chamber of Commerce, Thailand
Dan King, University of Texas Rio Grande Valley, USA

Many products such as luxury wristwatches have a "creviced morphology" with a crevice bored into the product structure. We demonstrate the "crevice effect" in which products with a crevice (versus without) elicit a higher valuation underpinned by increased perceptions of a high level of materialized expression.

Experiences as Ends (versus Means) Bring More Happiness and Meaning

Hankyul Bae, University of Minnesota, USA
Kathleen Vohs, University of Minnesota, USA

We tested whether pursuing an experience for intrinsic reasons (ends approach) versus extrinsic reasons (means approach) would differently affect consumer well-being. Two experiments revealed that people report more happiness and meaning when they think about their experiences as ends versus means to another end.

Better With Diverse Contexts? The Effects of Contextual Diversity of Background on Consumption Imagery

Eunsoo Baek, Hong Kong Polytechic University, China
Zhihong Huang, Hong Kong Polytechic University, China

The study explored the effect of contextual diversity of background images on consumption imagery with a moderating effect of processing style. Results showed that a multiple (v.s. a single and none) contextual background generated consumption imagery of a product for holistic (v.s. analytic) processors leading to positive product evaluation.

A Good Cry or A Gratifying Revenge? Desired Mixed Emotional Experience in Movie Consumption Across Cultures

Aaron J. Barnes, University of Louisville, USA
Jie(Doreen) Shen, University of Illinois at Urbana-Champaign, USA
Jennifer L Stoner, University of North Dakota, USA
Carlos Torelli, University of Illinois at Urbana-Champaign, USA

Prior research suggests that content with mixed emotions appeals to collectivists but not individualists. In contrast the current research suggests that both individualists and collectivists desire movies with mixed emotional themes as long as the mixed emotions align with their cultural values.

Can't See You! The Effect of Packaging on Calorie Perceptions

Sara Baskentli, Western Washington University, USA
Tracy Rank-Christman, University of Wisconsin - Milwaukee, USA

This research investigates how packaging material impacts consumers' perceptions of calories. Results from two studies show that packaging material has an impact on consumers' caloric perceptions. The authors suggest that the material of package impacts calorie perceptions which in turn could have implications on product consumption.

Augmented Reality Effects on Attitude and Memory

Juliana M. Batista, EAESP-FGV, Brazil
Annaysa Salvador Muniz Kamiya, Centro Universitário FEI, Brazil
Delane Botelho, EAESP-FGV, Brazil

Little is known about the underlying mechanisms on the effect of augmented reality (AR) on consumer´s attitude and memory. In two experiments we demonstrate that positive attitude toward the brand increases and memory recall decreases when consumers are exposed to AR. Perception of media´s innovation and entertainment mediate such effect.

Understanding Recovery From Compulsive Consumption With Practice Theory

Larissa Carine Braz Becker, University of Turku, Finland
Melissa Archpru Akaka, University of Denver, USA
Hope Schau, University of Arizona, USA
Elina Jaakkola, University of Turku, Finland

This paper analyzes how consumers reconfigure a system of practices during recovery from compulsive consumption. A study with recovering alcoholics reveals how consumers disengage from non-supportive practices and how new practices relate to each other. These findings contribute to the literature by using a sociological perspective to study behavioral change.

Making Home Away From the Established Models of Ownership:
Preliminary Findings From a Housing Cooperative

Ons Belaid, IAE Lyon, France
Mariam Beruchashvili, California State University Northridge, USA
Sonia Cappelli, University of Lyon, France
William Sabadie, University Jean Moulin Lyon 3, France

Based on an ethnographic study conducted in the context of a large cooperative house located near the metropolitan area in France where residents practice consciously elected collective cohabitation we examine how consumers make home (Douglas 1991) in a physical space of a house deliberately devoid of conventional forms of ownership.

Digital Platforms and Market Intermediation

Kristin Bentsen, University of South-Eastern of Norway
Eileen Fischer, York University, Canada
Per Egil Pedersen, University of South-Eastern of Norway

This paper explores how market intermediation may be affected when market actors rely on digital platforms. It draws on participant observation conducted in "REKO" markets in which transactions and interactions are primarily conducted via groups organized on Facebook. The paper identifies four actor/platform intersections that may profoundly shape intermediation.

Another Advertising Stereotype: Effects of Non-Stereotyped
Portrayals of Older Women in Advertising

Hanna Berg, Stockholm School of Economics, Sweden
Karina T. Liljedal, Stockholm School of Economics, Sweden

This paper examines the effects of featuring non-stereotyped portrayals of older women in advertisements. In two empirical studies we demonstrate positive ad effects of using non-stereotyped portrayals of older models for female consumers. Furthermore these effects are explained with signaling theory and the social effects of advertising.

Commitment Contracts: The Effect of Commitment-Based
Pricing on Customer Acquisition and Retention

Katja Berger, University of Hamburg, Germany
Klaus Wertenbroch, INSEAD, Singapore
Christina Schamp, University of Mannheim, Germany

Nowadays an increasing number of firms incorporate commitment into their pricing schemes and business models. Our research shows how to design and present commitment-based pricing optimally to acquire and establish long-term relationships with customers.

Feeling Pressured to Disclose Personal Information? Understanding The
Role of Social Pressure on Consumers' Information Disclosure Intention

Alena Bermes, Heinrich Heine University Düsseldorf, Germany
Maximilian Alexander Hartmann, Heinrich Heine University Düsseldorf, Germany
Peter Kenning, Heinrich Heine University Düsseldorf, Germany

This research examines if consumers feel social pressure to disclose personal information for mobile application usage. Grounded in the theory of self-determination the results prove that social pressure (being of multifaceted structure including fear of missing out subjective norms and image) is positively related to information disclosure intention.

Stop It! Consumer Resilience as a Buffer Against Psychological Conflicts in the Digital Age

Alena Bermes, Heinrich Heine University Düsseldorf, Germany
Nikita Maleev, Heinrich Heine University Düsseldorf, Germany
Peter Kenning, Heinrich Heine University Düsseldorf, Germany

Drawing on psychological resilience theory this research is the first to define conceptualize and test the phenomenon of consumer resilience against the background of today's digital environment which confronts consumers with rising psychological conflicts (e.g. fear of missing out). The preliminary results proof consumer resilience's buffering effect against such stressors.

Dimensions of Believability of Brand News: An Exploratory Study

Kshitij Bhoumik, Texas Tech University, USA

This research explores the factors that shape consumer believability toward brand news on digital platforms. What are the cues consumers look to evaluate the authenticity of any brand communication? What kind of brand message is considered as highly believable? We identified eight dimensions that shape consumers' perception of brand news.

Sequential Sensory Cues in Retailing and Food Packaging: Managerial and Ethical Implications

Dipayan Biswas, University of South Florida, USA
Lauren I Labrecque, University of Rhode Island, USA
Donald Lehmann, Columbia University, USA

Sensory cues are often encountered sequentially (than simultaneously) in many retailing food packaging and consumption contexts. A series of experiments demonstrate how the sequence in which sensory cues are encountered might influence food taste perceptions food choices and consumption volume.

It's Written All Over Your Face—Applying Deep Neural Networks to Explain Human Mating Based on Facial Characteristics

Daniel Boller, University of St. Gallen, Switzerland

This research investigates human mating in online dating markets based on facial characteristics by utilizing high-dimensional profile section transaction and facial image data of 640000 users of an online dating platform. The results of this research assist software developers and marketing practitioners in designing algorithms for human matching.

Counterfeit Consumption Eliciting Group-Based Emotions

Delane Botelho, EAESP-FGV, Brazil
Fernando A. Fleury, EAESP-FGV, Brazil
Ramona de Luca, EAESP-FGV, Brazil

This paper investigates positive and negative emotions as consequences of the consumption of counterfeits in the context of soccer supporters. Specifically the perceived personal in-group responsibility for consuming counterfeits leads to negative affect (e.g. guilt and anger) while the responsibility for consuming original products leads to positive affects (e.g. pride).

A Contingency Theory of Artificial Intelligence: Consumer Beliefs, Value Creation, And Resistance to Creative AI

Anna Bouwer, University of St. Gallen, Switzerland
Christian Hildebrand, University of St. Gallen, Switzerland

This paper examines the unexplored role of 'creative AI' by studying the perception of machine-generated 'creative output'. It provides conceptual foundations on the notion of creative AI and demonstrate the consumer associations with AI along with the downstream consequences of creative AI for consumers' perception of aesthetic quality and valuation.

"'Sweet, Tasty Evil' Or 'Healthy Bliss'? Lay Theories On Food Products For Children"

Raphaela Elisabeth Bruckdorfer, University of Duisburg-Essen, Germany
Oliver B. Büttner, University of Duisburg-Essen, Germany
Gunnar Mau, Deutsche Hochschule für Gesundheit und Sport (DHGS), Germany

Based on qualitative and quantitative data we developed an instrument to assess consumers' lay theories on child food products. In line with experts lays expected such products to contain high amounts of fat sugar and calories but at the same time perceived them as being moderately healthy and rather useful.

Unveiling the Color Matching Effect in Product Displays

Daniel Erik Brylla, Friedrich Schiller University Jena, Germany
Gianfranco Walsh, Friedrich Schiller University Jena, Germany

Consumer researchers have long been interested in explaining the effects of individual and combined colors on consumer perceptions and behaviors. Across four studies the authors show that product colors that match a moderate amount of colors in the shopping environment increase consumers' aesthetic perception and purchase intentions.

Uninformed But Unaware: How the Number of Likes Triggers a Knowledge Illusion on Social Media

Andrea Bublitz, University of Zurich, Switzerland
Anne Scherer, University of Zurich, Switzerland
René Algesheimer, University of Zurich, Switzerland

Drawing from theory on the group mind this research uncovers how likes on social media trigger a knowledge illusion: If individuals are not motivated or able to read but content received many likes they rely on external knowledge in the group mind and feel better informed than they objectively are.

How Can We Make Fat Women Feel Miserable?

Ana Julia Büttner, ESPM, Brazil
Suzane Strehlau, ESPM, Brazil

The objective is to comprehend how plus-size women find well-being through fashion inside the symbolic violence. The qualitative method used semi-structured interviews using photo-elicitation reveals that fatshionistas play with fashion rules and present well-being. Although at the same time they reveal a subordination to the cult of thinness.

The Visual Impaired Tourist: Facilitators and Inhibitors in Choosing Tourist Destinations

Aline Delmanto Capone, ESPM, Brazil
Vivian Iara Strehlau, ESPM, Brazil

This paper aims to understand what factors influence leisure travel destination choice for the visually impaired. A qualitative approach using in-depth interviews with three different groups preliminarily found that acquired blinds have more constraints than congenital or low vision. The origin of blindness affects their well-being and how they travel.

The Exquisite Exotic: Revalorization of Culinary Ingredients and Traditional Food Practices in the Global Marketplace

Flavia Cardoso, Universidad Adolfo Ibáñez, Santiago, Chile
Angela Gracia B. Cruz, Monash University, Australia
Pilar Ximena Rojas Gaviria, University of Birmingham, UK

This theoretical piece offers an integrative framework to theorize how marketing actors invest and participate in the international re-signification of culinary ingredients and food practices. It goes beyond localized case studies synthesizing the current theorizations on the internationalization of food and charts an agenda for future research.

Chatbots an Exploratory Analysis on the Impact of NLP and Customer Sentiment Analysis

Lilian Carvalho, FGV/EAESP, Brazil
Eusebio Scornavacca, University of Baltimore, USA

We partnered with a startup that uses NLP (natural language processing) to assist different firms to set up their virtual assistants. We analysed 4320 interactions and found that chatbot-human interaction had a better score than human-to-human interactions.

Let Me Split the Donation, I Will Donate More: How Installment Payment Reduces Perceived Cost and Increases Willingness to Donate.

Marta Caserotti, University of Padova, Italy
Enrico Rubaltelli, University of Padova, Italy
Paul Slovic, University of Oregon, USA

Do people prefer a donation split into several instalments or a lump sum? Do they prefer to pay now or later? Four experiments (and a pretest) investigated how payments options and intertemporal choice affect donations. We found that the opportunity of giving through instalments increased donations decreasing the perceived cost.

A Reimagining: Prefiguring Systems of Alternative Consumption

Katherine Casey, University of Kent, UK
Maria Lichrou, University of Limerick, Ireland
Lisa O'Malley, University of Limerick, Ireland

This ethnographic research reveals how an ecovillage prefigures consumption via a repertoire of alternative consumption and production systems designed to challenge neoliberal notions of choice value and ownership; explores how community members participate in broader changemaking and how the community engages the broader institutional framework to further environmental education.

Understanding Overconsumption – Symbolic and Spatial Transgressions in Public Places

Cecilia Cassinger, Lund University, Sweden
Jörgen Eksell, Lund University, Sweden

Overconsumption refers to harmful or excessive consumption. This study demonstrates how experiences of overconsumption are constructed in transgressions of boundaries within places. Results are supported by a study of citizens' experiences of tourism-consumption in touristified cities. They underscore the importance of considering experiences of overconsumption practices for sustainable consumption.

Causa Sui (Cause of Itself): How Self-benefit Appeal Framing Interacts With Situational and Dispositional as Donation Cause-types

Chia-Chi Chang, National Chiao Tung University, Taiwan
Joseph Iesue, National Chiao Tung University, Taiwan
Chia Hua Lin, National Chiao Tung University, Taiwan

Research provides insight on charitable giving by testing the interaction between donation cause-types (situational vs. dispositional) and self-benefit appeals ('karma' - intentional but dependent 'feel-good' - intentional and independent 'humanity' - unintentional). Results show 'karma' appeal elicits higher donations for situational causes with 'feel-good' and 'humanity' appeals benefiting dispositional causes.

Social Influence and Personalization in Behavioral Retargeting Advertising

Yaping Chang, Huazhong University of Science and Technology, China
Shaowei Chai, Huazhong University of Science and Technology, China
Jun Yan, Huazhong University of Science and Technology, China

Through a serial of field experiments on Facebook this research examined the impacts of social and personalized messages in retargeting advertising on customer responses. Results indicate geographic proximity is more effective than number of likers on social media. Personalized message works negatively. Product knowledge works as a moderates.

How Social Functioning Ability and Crowdedness Impact Consumer Behavior

Shiyun Chen, University of Iowa, USA
Gary Gaeth, University of Iowa, USA
Irwin Levin, University of Iowa, USA

In the current research we investigate the impact of social functioning on consumers under varying levels of social crowdedness. Our finding suggests that people with lower social functioning abilities feel less comfortable more anxious and dislike the more crowded environment compared to people with higher social functioning abilities.

Securing Non-Touristy Shops-- Claiming Local Collective Identities in Political Consumption Against Inbound Tourists' Shopping Spree

Wei-Fen Chen, University of Leicester, UK
Tin-yuet Ting, The Hong Kong Polytechnic University, China

Departing from behavioral perspectives that examine how consumers' political consumption relates to personal characteristics this study investigates how collective identities of local consumers are shaped in response to overwhelming inbound shopping tourism informing the contemporary practices of citizen consumers and manifesting a novel approach to understand political consumption.

Utilizing Matte Packaging to Communicate Social Warmth

Yu-Shan Athena Chen, Eindhoven University of Technology, The Netherlands
Wei-Ken Hung, National United University, Taiwan

Two studies demonstrate that matte packaging conveys haptic information in the same manner as interpersonal touch (Study 1); and matte packaging is preferred over glossy packaging when people have a goal to reduce coldness (Study 2). Together these results suggest that matte packaging is instrumental in communicating warmth.

Waiting For A Download: The Effects of Congruency Between Anthropomorphic Cues and Shopping Motivation on Consumer Patience

Siyun Chen, Jinan University, China
Xinliang Wei, Temple University, USA

People tend to be impatient while waiting for a webpage to download which might be negatively correlated with their satisfaction with the online providers. In particular we propose a new framework of how the congruence of anthropomorphic messengers and shopping motivation enhances patience (i.e. perceived quickness of a download).

What to Buy When the American Dream Fails? Understanding the Taste of Downwardly Mobile Consumers

Wei-Fen Chen, University of Leicester, UK
Xue Wang, Chinese University of Hong Kong, China
Ying-yi Hong, Chinese University of Hong Kong, China

This study examines how consumer behaviors are influenced by upward and downward economic mobility. Findings indicate that facing downward mobility consumers lessen the economic components in their self-identities and thus are less interested in purchasing products framed in advertisements that appeal to economic capital compared to their upwardly mobile counterparts.

The Effect of Identical or Distinct Service Failure Recovery on Customer Satisfaction

Yin-Hui Cheng, National Taichung University of Education, Taiwan
Shih-Chieh Chuang, National Chung Cheng University, Taiwan
Ya-Ju Shen, National Chung Cheng University, Taiwan

This paper study showed that providing the same type of service is worse than providing a different service in terms of customer satisfaction. Two boundary conditions were examined in which the severity of the failure and consumer participation mitigate the effect of identical/distinct service recovery on customer satisfaction.

I Can Be Perfect! Growth Mindset Moderates the Effect of Perfectionism on Maladaptive Eating Behaviour

Jennifer Chernishenko, University of Lethbridge, Canada
Rhiannon MacDonnell Mesler, University of Lethbridge, Canada
Debra Z Basil, University of Lethbridge, Canada

To clarify the link between perfectionism and eating behaviors we proposed that implicit mindset would moderate the relationship between perfectionism and maladaptive eating behaviour. Whereas a growth mindset increased use of dieting strategies and consequently maladaptive eating behavior fixed mindset reduced this effect. Implications for research and practice are discussed.

When Technology Environment is More Indulging: Impact of Accessibility to Technology-Equipped Environment on Self-Control Behaviors

Yunjia Chi, Huazhong Agricultural University, China
Fue Zeng, Wuhan University, China
Li Huang, Hofstra University, USA

The mere perception of accessibility to technology-equipped environment without actually using technologies triggers consumers' effort conservation intention which results in lapses of self-control.

The Effects of Majority/Minority Source Status and Argument Quality of Online Reviews on Product Perceptions: The Moderating Role of Product Type

Yi-Wen Chien, National Taiwan University, Taiwan
Shian-Ko Liu, National Taiwan University, Taiwan

This study posits that for different products (search vs. experience goods) source status and review quality may have different impacts. Experience goods rely more on source status whereas search goods rely more on review quality. Marketers are suggested to develop effective promotion strategies based on product type.

Strong As An Ox: Usage Of Storytelling By Vegan Athletes To Reduce Consumers' Meat-Health Associations

Ziad Choueiki, Ghent University, Belgium
Maggie Geuens, Ghent University, Belgium
Iris Vermeir, Ghent University, Belgium
Adriaan Spruyt, Ghent University, Belgium

This paper explores the implicit/explicit association between meat consumption and health. We propose that storytelling by vegan athletes (whose personal experiences challenge the prejudice of veganism being an inadequate diet) can help reducing both consumers' implicit meat-health association and the explicit belief that meat is necessary normal natural and nice

Friendship Alleviates Sense of Regret

JungHan Chung, Sogang University, South Korea
Young-Won Ha, Sogang University, South Korea

The authors investigated whether psychological relatedness affects consumers' sense of regret in consumption failure settings. Through three experiments the authors demonstrated that close relationship can alleviate sense of regret and this friendship effect was mediated by locus of causality and was moderated by individuals' level of subjective well-being.

The Making of Healthy, Wealthy, and Happy Consumers: Practices and Politics of Nudging in For-Profit Firms

Leonardo Conte, Università della Svizzera italiana, Switzerland
Lena Pellandini-Simanyi, Università della Svizzera italiana, Switzerland

This paper extends research in Consumer Culture Theory on the making of the consumer subject by examining (1) the performative role of nudging practices in businesses (2) their underlying normative visions and (3) the concrete processes through which they shape consumers within the Foucauldian framework of neoliberal governmentality.

Life Transition to Terminality: Dynamic Regimes of Representation, Permanent Liminality, and Coping Consumption

Michele Corengia, Università della Svizzera italiana, Switzerland
Luca M. Visconti, Università della Svizzera italiana, Switzerland

Through the lenses of representation theory this (n)ethnographic research contributes to literature on consumer permanent liminality and coping consumption. Unpacking life and market transition of patients to terminality accounts for how they use representational agency and consumption to counterbalance etic representational regimes and the tensions arising from their liminal experience.

Salience Over Centrality? How Environmental Identity Drives Pro-Environmental Consumption

Sandor Czellar, HEC Lausanne, Switzerland
Leila Rahmani, HEC Lausanne, Switzerland
Simona Haasova, University of Lausanne, Switzerland
Valentina Clergue, HEC Lausanne, Switzerland
Christian Martin, National University of Ireland Maynooth, Ireland

We investigate the relationships between environmental identity centrality its salience and pro-environmental behavior. Five studies reveal a distinct influence of environmental identity salience and centrality but no interaction between the two on several types of self-reports and actual behaviors. Our findings bear implications for research aiming to promote pro-environmental consumption.

A Permanently Loose End: Constructing the Intersectional Identity of British South Asians

Ofer Dekel Dach, De Montfort University, UK
Amandeep Takhar, De Montfort University, Leicester, UK

Moving away from dominant acculturation models this research study draws on intersectional theory to better understand how individuals from the British South Asian community in the U.K. respond to social complexity and engage in identity construction. Our findings present a picture of the way participants mix and juxtapose identity categories.

Leaving the Field: Problematizing Temporality in and of Ethnographic Consumer Research

Christian Dam, University of Gothenburg, Sweden
Mathias Sosnowski Krabbe, University of Southern Denmark, Denmark

This paper argues that the temporality of ethnographic consumer research is inadequately illuminated which prevents the conceptualization of exiting the field. Thus a stronger focus on the various methodological and ethical aspects of exiting the field is needed particularly due to the changing notions of what constitutes the field.

Group Buying of Experiential (vs. Material) Purchases

Gopal Das, Indian Institute of Management Bangalore, India
James Agarwal, University of Calgary, Canada
Mark T Spence, Bond University, Australia

This research examines how experiential vs. material purchases influence consumer preference for group buying (vs. individual buying). Specifically consumers while purchasing experiential (vs. material) goods anticipate more enjoyment which in turn results in higher intent to participate in group buying behavior. These effects hold for interdependent (vs. independent) self-construal.

Marketing's Role in Promoting Common Good: A Systematic Examination and an Agenda For Future Inquiry

Benét DeBerry-Spence, University of Illinois at Chicago, USA
Lez Ecima Trujillo Torres, University of Illinois at Chicago, USA
Rumela Sengupta, University of Illinois at Chicago, USA
Jia Chen, University of Illinois at Chicago, USA
Kohei Matsumoto, University of Illinois at Chicago, USA

We examine the role marketing has played in promoting the 'common-good' by conducting a systematic multi-method multi-journal inquiry. Marketing consistently contributes to a dialogue of common-good by publishing impactful articles in areas like health and CSR. Opportunity exists for greater contributions to important areas such as gender-empowerment and education.

Does Alphago's Victory Over Human Champions Reduce The Interest Of People In Go? The Negative Effect Of Artificial Intelligence On Competition Events

Zhongzhun Deng, Huazhong University of Science & Technology, China
Donghong Zhu, Huazhong University of Science & Technology, China

Four studies (N=1214) confirm that how and why losing to robots (vs human) negatively affected consumer attitude toward these events. We contribute to the literature on Robot AI and goal theory from another perspective. In addition research help companies and governments to avoid negative effects when advertising robots.

Sacrificing Pleasure For Status. Which Customers Are Attracted by Healthy Luxury Goods?

Perrine Desmichel, Northwestern University, USA
Goedele Krekels, IÉSEG School of Management, France

Luxury brands have recently entered the market of healthy products although healthy benefits can reduce the hedonic benefits of luxury consumption. Across two preliminary studies we propose and show that consumers who did not earn (vs. earned) their wealth present stronger desire for healthy (vs. non-healthy) luxury goods.

Atemporal Nostalgia as Artefact in Post-Colonial Non-Western Context

Amina Djedidi, Université Paris-Est Créteil, IRG, France
Nacima Ourahmoune, Kedge Business School, France

Often pictured as a passive longing for the past this paper conceives nostalgia as atemporal: it creates states and spaces where time is reconfigured to reach selective accounts of bridges between the past present and future. Nostalgia atemporality sutures complex and heterogeneous sociocultural references in Post-Colonial Non-Western context Algeria

Keeping Track of What's Deserved When Personal Finances Grow

David Dolifka, University of California Los Angeles, USA
Stephen A Spiller, University of California Los Angeles, USA

All financial growth first requires principal to invest. In this project we explore the relationship between the perceived deservingness of both principal and downstream growth. Initial studies suggest consumers downplay whether or not their principal was deserved when judging the deservingness of subsequent financial growth.

Does a Flaw Outweigh a Flaw? The Bright Side of Negative Comments in Online Product Reviews

Shen Duan, Renmin University of China, China

The research find that two-sided information reviews are more persuasive to consumers than one-sided information reviews and the importance proportion and position of negative information play a moderating role in this relationship. This study enriches the relevant research on the impact of online reviews on consumer product purchases.

Recovering Cultural Authority: Marketplace Abandonment and Return

Toni Eagar, Australian National University, Australia
Andrew Lindridge, Newcastle University, UK
Diane Martin, RMIT University, Australia

This project investigates how a brand can recover its former position in a marketplace after losing legitimacy. We apply a process data approach to qualitatively analyse 614 media reports and 31 interviews. We extend the brand longevity concept and reveal brand recovery as a process involving return dormancy and resurrection.

Goal Conflict Undermines Self-Continuity and Leads to Greater Preference For Renting Vs. Buying

Mahdi Ebrahimi, California State University Fullerton, USA
Anoosha Izadi, University of Massachusetts, USA

The present research identifies a novel antecedent for consumer renting behavior. We propose that consumers who experience goal conflict are more likely to rent vs. buy a product or service. We also show that the effect is mediated by lower perceptions of future self-continuity.

The "Common Good" Phenomenon in Country of Origin Effects

Martin Egger, University of Vienna, Austria
Arnd Florack, University of Vienna, Austria
Adamantios Diamantopoulos, University of Vienna, Austria
Georgios Halkias, University of Vienna, Austria

The "common good" phenomenon describes that products share positive attributes but are distinguished according to negative attributes. In three studies we demonstrate that this phenomenon applies to products from different product categories and countries and show that it decreases the differentiating power of favorable country of origin labels.

Coopetition and Creativity in Idea Crowdsourcing: Investigating the Mediating Role of Emotional and Motivational Ambivalences

Mehdi Elmoukhliss, TSM Research, France

We investigate why coopetition-based idea crowdsourcing has a positive effect on consumers' creativity. We study two potential mediators: emotional ambivalence and motivational ambivalence. We found a significant indirect effect of motivational ambivalence. We contribute to the consumer research literature by introducing coopetition as a new model for engaging creative consumers.

The Effects of Mindfulness on Healthy Food Choice in Childhood Socioeconomic Groups

Amy Errmann, University of Auckland, New Zealand
Yuri Seo, University of Auckland, New Zealand
Felix Septianto, University of Auckland, New Zealand

The effects of mindfulness on healthy food selection is receiving attention in academia and practice. The current research examines which childhood socioeconomic groups benefit the most from mindfulness as it pertains to food choice. We propose that mindfulness provokes low childhood socioeconomic groups to make healthier food choices.

Risk on the Edge: The Effect of Socio-spatial Location on Consumer Preferences

Sina Esteky, Miami University, Ohio, USA
Amar Cheema, University of Virginia, USA

This paper explores how the relative spatial location of consumers in a group affects consumer preferences. We find that being located close to the center versus edge of a group primes the concepts of safety versus risk respectively. As a result being farther away from the center heightens risk-seeking.

How the Different Wordings of Message in Pop-Up Window Affect Consumers' Behavior?

Yafeng Fan, Tsinghua University, China
Jing Jiang, Renmin University of China, China

This research classifies the message wording approaches in pop-up windows into "guilt appeal" "delaying appeal" and the "no appeal" and examine how the different wording affect consumers' behavior. Compared with not using any appeal "guilt appeal" and "delaying appeal" in pop-up windows can promote consumers' retention rate and customer satisfaction.

When Social Media Word-of-mouth Catches Envious Eyes: How Feelings of Being Envied Influence Self-brand Connection

Wenting Feng, Hainan University, China
Irina Y. Yu, Chinese University of Hong Kong, China
Morgan X. Yang, The Hang Seng University of Hong Kong, China

We examined the ambivalent impacts of being envied experiences triggered by sharing luxury consumption on social media. Results from three experiments show that feeling being maliciously (benignly) envied decreases (increases) self-brand connection mediated by anxiety (pride). The effects are more salient when consumers interact with peers with lower social-distance.

Give Me the Fish Vs. Teach Me How to Fish: The Effect of Socioeconomic Status on Recipients' Willingness to Accept Help

Maura Ferreira, Catholic University of Rio Grande do Sul, Brazil
Erick M. Mas, Vanderbilt University, USA
Kelly Goldsmith, Vanderbilt University, USA

This research investigates an overlooked side of prosocial behavior the recipient's willingness to accept help. We show that recipients' socioeconomic status can decrease and increase willingness to accept low-order (money/food) and high-order (scholarships) help as these types of help can represent both self-threat and self-support depending on recipients' socioeconomic status.

Mitigating Uncertainty in Consumer Adoption of Medical Artificial Intelligence

Darius-Aurel Frank, Aarhus University, France
Polymeros Chrysochou, Aarhus University, Denmark
Panagiotis Mitkidis, Aarhus University, Denmark
Dan Ariely, Duke University, USA

This pre-registered study investigates the potential of explicit uncertainty quantification information in mitigating consumers' reluctance to trust and depend on recommendations by medical artificial intelligence agents' in decision scenarios characterized by uncertainty.

Brand Familiarity Shows in Consumers' Eyes

Léon Franzen, Concordia University, Canada
Amanda Cabugao, Concordia University, Canada
Aaron P. Johnson, Concordia University, Canada
H. Onur Bodur, Concordia University, Canada
Bianca Grohmann, Concordia University, Canada

Although brand familiarity has been linked to product recognition speed and prior experience the objective measurement of consumers' brand familiarity remains challenging. We integrated an extensive product image validation study with novel pupillary response measurements to demonstrate reliable dissociation of familiar and unfamiliar brands without an overt response.

What Makes Services Luxurious? Insights From a Qualitative Study

Martin P Fritze, University of Cologne, Germany
Jochen Wirtz, National University of Singapore, Singapore
Jonas Holmqvist, Kedge Business School, France

We address the research question 'What constitutes a luxury service experience'? and report results from exploratory interviews conducted with luxury service consumers to understand how they perceive differences between luxury and non-luxury services. Our results reveal key luxury perception dimensions in the search decision consumption and post-consumption states.

Re-imagining Subcultures: A Comparative Study of Generational Preconceptions of Music Consumption, Identity, and Belonging

Olivia Fulvio-Mason, University of Gloucestershire, UK
Richard Warr, University of Gloucestershire, UK

As the existence of subcultures within today's youth culture have begun to be questioned this study focuses on changes surrounding music consumption that have occurred between Millennials and their parent generations. Aims include the exploration of youth subcultures musical identity and the transformation of generational preconceptions towards popular music consumption.

Seeing Through Your Eyes: The Influence of Interface on Advertisement Processing

Lin Ge, Chinese University of Hong Kong, China
Hao Shen, Chinese University of Hong Kong, China

Consumers are more likely to take a first-person perspective while viewing advertisements on a smartphone than on a personal computer. Consequently they might react more favorably to an ad with content generated from the first-person perspective if they view it on a smartphone (vs. a PC).

Mixed Emotions Inspire Missions (Im)possible – The Role of Emotions in Setting and Achieving High Aspirations

Jana-Verena Gerhart, Johannes Gutenberg University Mainz, Germany
Oliver Emrich, Johannes Gutenberg-University of Mainz, Germany
Michael Norton, Harvard Business School, USA
Jordi Quoidbach, ESADE Business School, Spain
Ann-Kathrin Haderdauer, Johannes Gutenberg University (graduate), Germany

A longitudinal study of New Year's Resolutions examines the effect of emotional states on goal setting and goal attainment. Participants (N=1004) assigned to experience mixed emotions when setting goals increased their aspiration levels more than those assigned to experience positive emotions. Higher aspirations in turn predicted resulting change.

How Incongruent Products Drive Brand Engagement: The Role of Curiosity

Maximilian H. E. E. Gerrath, University of Leeds, UK
Alessandro Biraglia, University of Leeds, UK

Brands seek new ways to engage consumers on social media. For example McDonald's recently generated buzz by announcing an incongruent product—Big Mac scented candles. Across three experiments we examine the link between (low vs. high) congruence and brand engagement. Moreover we identify curiosity as a driver of this effect.

You Don't Need To Be Me To Win My Heart: The Impact of Cognitive Appeals on Empathy In Pro-Social Behaviors

Mahsa Ghaffari, university of Portsmouth,UK
Giovanni Pino, University of Chieti-Pescara, Italy
Daniel Nunan, University of Portsmouth, UK

Despite the widespread conviction that empathy and congruency between self and the target increase pro-social behaviours this research underscore the importance of marketing communication techniques in boosting altruistic behaviour when the self and target are incongruent.

The Effect of Warmth and Competence Perceptions on Algorithm Preferences

Zohar Gilad, Technion University, Israel
Liat Levontin, Technion University, Israel
Ofra Amir, Technion University, Israel

Perceptions of warmth (intent) and competence (ability) strongly affect people's judgment of individuals groups and organizations. We find that surprisingly not only competence perceptions affect people's preferences for artificial intelligence algorithms. Moreover similarly to the judgments of other people warmth perceptions tend to have a stronger effect on preferences.

Which Autonomous Vehicle (AV) Will be More Pro-Social? The One You Own or Rent.

Tripat Gill, Wilfrid Laurier University, Canada

Recent research reveals that consumers expect AVs to be less pro-social than regular car drivers. Current work examined how ownership would impact the latter moral shift. It was found that owned AVs are expected to be more pro-social than the ones that are rented due to self-extension into the AV.

With God on My Side, I Have No Fear of Ultra-processed Foods and Lack of Exercise

Ali Gohary, Monash University, Australia
Hean Tat Keh, Monash University, Australia
Eugene Chan, Monash University, Australia

This research investigates the impact of God salience on consumers' food choice and physical inactivity. Three studies (secondary data chronic and primed God salience) show that God reminders lead consumers to exhibit greater willingness to choose ultra-processed (vs. unprocessed) food products and being more physically inactive.

When Recycling Seems Risky: Are Consumers Afraid to Recycle Sensitive Information?

Gabriel E. Gonzales, SUNY New Paltz, USA
Matthew D. Meng, Utah State University, USA
Christopher Berry, Colorado State University, USA
R. Bret Leary, University of Nevada, Reno, USA

The current research proposes that consumers are uncomfortable recycling items containing private information (e.g. "junk" mail bank statements etc.) despite seeing such items as recyclable. Two initial studies provide evidence for this effect suggesting a potentially untapped source of highly-recyclable material while generating insights for both scholars and practitioners.

Behavioral Option Value and Product Set Choice

Paniz Gorji, Erasmus University Rotterdam, The Netherlands
Benedict Dellaert, Erasmus University Rotterdam, The Netherlands
Bas Donkers, Erasmus University Rotterdam, The Netherlands

We propose a behavioral theory of consumers' option value for sets from which they consume a product in the future. For example consumers may choose between health insurance networks from which they select a provider for treatment later. Results from two experiments support our hypotheses and illustrate the proposed approach.

The Injustice of Envy

R Justin Goss, Colorado State University-Pueblo, USA

This research investigates the impact that status hierarchies within brand communities have on the occurrence of Envy. I examine the antecedents and consequences of Malicious and Benign Envy. Specific attention is paid to Deservingness. Findings show that Deservingness affects feelings of both Malicious and Benign Envy. Implications are discussed.

Consumer Deceleration Through Cultural Borrowing and Critical Reflection

Sarah Grace, University of Arkansas, USA

This research extends previous findings on consumer deceleration by exploring how cultural borrowing facilitated through marketing activities in a globally connected consumer culture can provoke critical reflection. The findings of this study empirically ground a theoretical process that marketers can use to constructively engage in the phenomenon of social acceleration.

Is That Brand Relevant to Me? Concept, Measurement and Antecedents of Brand Relevance

Amélie Guèvremont, École des Sciences de la Gestion, UQAM, Canada
Fabien Durif, École des Sciences de la Gestion, Université du Québec à Montréal, Canada
Cindy Grappe, Écoles des Sciences de la Gestion, Université du Québec à Montréal, Canada

This research explores the meaning of brand relevance according to consumers and its creation from a branding perspective. Across four studies it defines brand relevance and its dimensions (utilitarian/symbolic/social/environmental) develops a measurement scale identifies brand relevance's antecedents and validates them through an in-depth analysis of relevant brands' social media content.

Investigating the Effects of Uncertainty Avoidance on Customer Loyalty Intention

Bingxuan Guo, University of Texas at San Antonio, USA
Karen Page Winterich, Pennsylvania State University, USA
Yinlong Zhang, University of Texas at San Antonio, USA

This research explores how cultural orientation of uncertainty avoidance affects customer loyalty intention. Secondary country level data and primary individual level experiment provide convergent evidence showing a negative effect of uncertainty avoidance on customer loyalty intention and this effect is mitigated by desire to change and need for structure.

Social Class and Risk Taking: The Effects of Perceived Benefits and Decision Domain

Yafei Guo, University of Illinois at Urbana-Champaign, USA
Xue Wang, University of Hong Kong, China

The present paper is the first to systematically examine the class-related differences in consumer risk-taking behavior. It proposes a moderation of risk domain to reconcile the differential risk patterns among different socioeconomic consumers. The class-related risk patterns provide insights for managers who target consumers with social class differentiation.

Upskilling Communication and Self-Production: How to Communicate the Value of Cocreated Innovation?

Ajmal Hafeez, University of South-Eastern Norway, Norway
Marit Engeset, University of Southeast Norway, Norway

Although much research have focused on how consumers derive value from engaging in self-production less focus has been given to how such offerings can be communicated to consumers. We posit that messages focuses on upskilling or ways in which engaging in self-production can improve consumers' skills increases adoption of such products.

How Estimating One's Minimum or Maximum Spend Affects Total Expected Expenditure on a Shopping Trip

Eunha Han, Monash University, Australia
Harmen Oppewal, Monash University, Australia
Eugene Chan, Monash University, Australia
Luke Greenacre, Monash University, Australia

We investigate the effect of considering one's possible minimum and/or maximum spend on the expected total spend during a grocery shopping trip. We propose that considering one's maximum will increase the effect of unpacking on magnitude estimation while consideration of the minimum spend will decrease the effect.

Social Exclusion Causes People to Share Blatantly False Stories in the Service of Affiliation

Hyerin Han, University of Minnesota, USA
Hyun Euh, University of Minnesota, USA

The present study demonstrated that participants who felt excluded (vs. accepted) were more likely to share fake news which was high in emotional intensity even though they knew that these news stories were highly likely to be false but only when doing so boosted their chances to communicate with others.

Do Happiness and Meaning in Life Uniquely Predict Consumer Well-Being?

Xianyu Hao, University of Minnesota, USA
Kathleen Vohs, University of Minnesota, USA

We tested the influence of happiness and separately meaning on consumer well-being once their overlapping variance was removed. Two studies testing life views psychological needs and interpersonal outcomes indicated that happiness was a stronger predictor than meaning — thereby suggesting doubts about the influence of meaning on well-being.

Consumer Reactions to Social Media Brand Blunders

Ceren Hayran, Ozyegin University, Turkey
Melis Ceylan, Bilkent University, Turkey

This research explores how brand blunders - humorous and accidental business mistakes - that take place on social media influence consumers' attitudes and relationship with the brand. Two studies show that loyal (vs. non-loyal) consumers are more negatively influenced by blunders as they think blunders are not funny but offensive.

The Impact of Gratitude on Consumer Maximization Tendency in Decision-Making

Dongjin He, Hong Kong Polytechic University, China
Brent McFerran, Simon Fraser University, Canada
Yuwei Jiang, Hong Kong Polytechic University, China

This research shows that gratitude can increase consumers' maximization tendency evidenced by searching for more options spending more time on decision-making and choosing stores with larger assortment sizes. This effect appears because gratitude activates a self-improvement motivation. Furthermore we show the situations in which the proposed effect is weakened.

Feeling Justified to be a Jerk: Consumers Are More Likely to Complain For Someone Else Than For Themselves

Patrick Matthew Healey, Washington University, USA
Cynthia Cryder, Washington University, USA
Sydney Scott, Washington University, USA

Consumers' participation in behaviors that lead to negative social perceptions increases when they are engaging in the behavior on behalf of another person. The present research is focused in the realm of customer complaints and nagging.

Communities of Stigmatized Knowledge: Social Exclusion, Political Sovereignty, and Globalized Capitalism

Tim Hill, University of Bath, UK
Stephen Murphy, University of Essex, UK
Robin Canniford, University of Melbourne, Australia

Prior studies show that consumers can be sceptical of the truth claims produced by the State universities and scientific communities. The proposed study investigates consumers who develop alternative claims to truth that are ignored or rejected by such dominant knowledge-making institutions.

Fractal Agency: Fetishization of Algorithms and the Quest For Transcendence

Soonkwan Hong, Michigan Technological University, USA

This research discusses critical topics related to algorithms and transhumanism to explicate and theorize the entanglement between big data marketable transcendence and fractal agency. Such discussion helps identify future research topics that highlight more specific characteristics of algorithms such as opacity messiness inscrutability hyper-legitimacy hyper-functionality and equal distribution of accountability.

The Impact of Social Crowding on Consumers' Sensitivity to Price Magnitude

Yuansi Hou, Queen Mary University of London, UK
Ke Zhang, Shanghai University, China

Crowding is a widely observed phenomenon. Through a correlational study and two experiments the research provides evidence suggesting consumers are less sensitive to the magnitude of service prices and reveals the underlying mechanism of reliance on feelings (vs. cognitions) when making judgments in the more (vs. less) crowded conditions.

Adding Human Cues in a Green Advertisement Makes it More Engaging

Junhui Huang, Tsinghua University, China
Maggie Wenjing Liu, Tsinghua University, China

Making a green advertisement more engaging has always been a great concern for marketers and environmentalists. With two studies we show that subtle human cues in advertisements can increase the audience's engagement with the advertisement.

"Brain Damaged" Celebrity Followers: An Exploration Of The Effect Of Celebrity's Brand Endorsement On Followers' Social Media Engagement

Mei Huang, Xihua University, China
Xiaodan zhang, Peking University, China
Fang Wan, University of Manitoba, Canada
Yifan Chen, University of Manitoba, Canada

The current research explores the impact of celebrity's brand-related posts on followers' social media engagement. We find that brand endorsement types in celebrity's social media post impacts their fans' engagement behaviors (i.e. likes comments and shares) differently.

The Closeness Buffering Effect: How Closeness Weakens Negative WOM Impacts

Li Huang, Hofstra University, USA
Hang Nguyen, Michigan State University, USA

Word of Mouth (WOM) has great impacts on consumer decisions. Contrary to the common belief of greater impacts from close friends over strangers we found that negative WOM from close (distant) others were viewed more subjective (objective) and thus become less (more) influential on consumers' decisions.

Wine Attributes For Purchase Satisfaction: an Exploration of Gender Difference

Hyowon Hyun, Hanyang University, South Korea
Dongyoup Kim, Hanyang University, South Korea
Jungkun Park, Hanyang University, South Korea

This research explores how numerous wine decision attributes affect satisfaction. The wine attributes were categorized into three wine factors (i.e. basic intrinsic extrinsic) and positively associated with satisfaction. The results of hierarchical regression and experiment showed the gender difference in the relationship between wine factors and satisfaction.

Semantic Congruity of Price and Name: The Effect of Precise or Round Numbers and Sound Symbolism

Hiroaki Ishii, Aoyama Gakuin University, Japan
Jaewoo Park, Musashi University, Japan
Taku Togawa, Sophia University, Japan

Previous studies show that consumers associate precise or round numbers with specific concepts. In this study we explore the semantic association of precise or round prices with the concept of smallness or largeness and the effect of semantic congruity between the price and sound of brand name on product evaluation.

Money Can Corrupt Others But Not Me: Asymmetrical Perception of Future Self-Continuity

Anoosha Izadi, University of Massachusetts, USA
Mahdi Ebrahimi, California State University Fullerton, USA

The present research examines how people perceive change in their (vs. others) fundamental characteristics after facing with hypothetical situational changes in their (vs. others) future. We predict that the relationship in not symmetrical meaning that people perceive more change when the situational change is related to others (vs. themselves).

The Effect of Implicit Bias on Marketing Practitioners' Decisions For Minority Consumers

Jorge Rodrigues Jacob, Columbia University, USA
Martin Davidson, University of Virginia, USA
Valerie Purdie-Greenaway, Columbia University, USA
Tatianna Dugue, Columbia University, USA

The mismatch between the identity background of those that define products' marketing strategies and those who purchase them may increase the likelihood of biased marketing strategies that target stigmatized consumers.

"We" Don't Always Like Copycats: How Self-construal Influences Evaluation of Product Imitation

Seongun Jeon, Vrije Universiteit Amsterdam, The Netherlands
Femke van Horen, Vrije Universiteit Amsterdam, The Netherlands
Peeter Verlegh, Vrije Universiteit Amsterdam, The Netherlands
Keith Wilcox, Columbia University, USA

Three experiments provide converging evidence that self-construal (interdependent versus independents) affects the evaluation of copycats (products imitating the trade-dress of leading brands). Interdependents evaluate high similarity imitations more negatively than independents. Such copycat evaluation is moderated by norms regarding copycatting for interdependents but not for independents.

Setbacks as Self-Control Replenishment in Consumer Goal Pursuit

Lan Jiang, Menlo College, USA
Stephanie Dellande, Menlo College, USA
Miranda Canniff, Menlo College, USA

This research investigates the effect of setbacks in goal pursuit. Extending the literature on self-control as a resource we propose that occasional setbacks can be seen as a chance for replenishment resulting in longer term goal-consistent behaviors. The frequency and duration of the setback will be studied as potential moderators.

"Scarce- Insincere" Heuristic: Signaling Effect of Limited Quantity in Scarcity Appeal

Yufang Jin, Dalian University of Technology, China
Guang-Xin Xie, University of Massachusetts Boston, USA

This research reveals a novel "scarce - insincere" heuristic when consumers make inferences of limited quantities in scarcity appeals. Product scarcity can reduce perceived sincerity of suppliers and deter consumers from purchase. Real-world transaction data demonstrate the counterproductive effect of product scarcity and experimental data suggest the underlying process.

Do Majority and Minority Always Act Differently? How Relative Group Size Affects Utilitarian Consumption

Yu Jinjun, City University of Hong Kong, China
Yijie Wang, Hong Kong Polytechic University, China
Nakaya Kakuda, City University of Hong Kong, China

This research investigates how relative group size affects consumers' utilitarian consumption. We propose that consumers prefer utilitarian products more when they are situated in a relatively smaller group which is mediated by the need for self-improvement. Two experiments are conducted to test our hypothesis.

Fostering Progressive Literacy Through New Media Consumption: How Memes, Podcasts, And Political Comedy Spur The Political Imaginary

Hunter Jones, Aalto University, Finland

This netnography of the increasingly popular digitally active and politically charged 'Dirt Bag Left' presents an original model depicting how consumption of political comedy in new media is used to foster progressive literacy and reignite stagnant socio-political imaginaries. In doing so it makes substantial contributes to Transformative Consumer Research.

I Hope Therefore I Save: The Positive Effect of Hope on Financial Decision Making

Stephen Juma, Virginia Tech, USA
Mario Pandelaere, Virginia Tech, USA

Understanding what motivates people to save is critical in a time when most people do not have enough savings. We tested the prediction that hope motivates saving through an increased focus on the future. Results from three studies show that hope leads to savings and a boundary condition is identified.

"Others Seem to Move Further Than I Do": How Perceived Change in Distance May Differ Depending on Who Creates the Distance

Wonsuk Jung, University of Wisconsin - Madison, USA
Joann Peck, University of Wisconsin - Madison, USA

Our judgement on distance may be influenced by whether the distance in question is created by the self or the other. We propose that when the distance is created by the other the impact of that distance may seem greater compared to when the distance is created by the self.

Bibliometric Analysis of Immersive and NeurophysiologicalTools in Retailing

Shobhit Kakaria, University of Valencia, Spain
Aline Simonetti, University of Valencia, Spain
Enrique Bigne, University of Valencia, Spain

Given the evolving nature of marketing research and the prominence of neurophysiological and virtual tools this bibliometric analysis showcases the representative research trends in the past two decades and prospective directions in the domain of retailing.

Can Taste Predict Product Evaluation?: The Role of Variety-Seeking on Innovative Products.

Nakaya Kakuda, City University of Hong Kong, China
Xiaolei Su, City University of Hong Kong, China
Cheng Gao, Nanjing University, China

This research investigates the impact of taste sensation on innovative product evaluations. Specifically this research found spicy taste recall having a positive influence on product evaluation and bitter taste recall having the opposite effect. This effect is mediated by variety-seeking intention moderated by innovation types: radical innovation vs. incremental innovation.

The Effect of Gratitude Expression on Word-of-Mouth Intentions

Christine Kang, California State University Long Beach, USA

This research finds consumers' tendency to reciprocate firm's favor is modulated when they were given a chance to express gratitude. Participants who were guided to express their gratitude reported significantly lower intention to generate WOM offline or online compared to those who expressed happiness or those in control condition.

The Effect of Nostalgia on the Ideal Self and Moral Identity

Hedieh Karachi, Deakin Business School, Australia
Jeffrey Rotman, Deakin Business School, Australia
Andrea Vocino, Deakin Business School, Australia

While past research has demonstrated that nostalgia leads to self-continuity (Sedikides et al. 2015; Sedikides et al. 2016) the current research suggests that self-continuity is linked to just thinking about the distant past. However only nostalgia reduces the discrepancy between one's ideal-self and heightens moral identity.

The Effect of Assortment Categorization and Construal Level on Consumer Satisfaction

Bianca Kato, University of Guelph, Canada
Juan Wang, University of Guelph, Canada

Our work explores the interplay between construal levels and assortment categorization on consumers' satisfaction. We found that consumers are more satisfied with an assortment with fewer (vs. more) categories when under a concrete construal and that this effect is mediated by fluency perceptions attenuated by consumers' familiarity with the product.

What Makes a Product Cute: Infantile Attributes Influence Perceived Cuteness of Products

Carolyn Wells Keller, Northwestern University, USA
Neal Roese, Northwestern University, USA

In four studies we investigate the influence of infantile attributes on perceived cuteness in anthropomorphized products. We find that roundness of a product's base or 'body' has a particularly consistent impact on perceived cuteness. Infantile attributes also had a stronger effect on perceived cuteness in utilitarian (vs. hedonic) products.

What Makes an Advertisement Offensive? The Interplay of Prescriptive and Descriptive Norms

Saeid Kermani, York University, Canada
Peter Darke, York University, Canada

This research explores the joint impact of prescriptive and descriptive norms on consumers' intention to complain about an offensive advertisement. Two experiments provide support to the proposition that descriptive norms influence intention to complain via perceptions of harm when a prescriptive norm has been violated.

A Time-Oriented Explanation Of Desire For Scarce Item In Online Retailing

Dongyoup Kim, Hanyang University, South Korea
Jungkun Park, Hanyang University, South Korea

Throughout series of four studies this research examines the effect of scarcity on consumers' purchase intention mediated by perceived control over time. The effect was moderated by two different online retail strategies (i.e. pressurizing by blinking the limited quantity and price discount promotion) and consumers' initial time availability for shopping.

Consumers' Responses to Sustainable Smart Home Services: The Role of Regulatory Focus

Moon-Yong Kim, Hankuk University of Foreign Studies, South Korea

This research examines the role of consumers' regulatory focus in their responses to sustainable smart home services. The results indicate that consumers who are not familiar with smart home services have more favorable attitudes toward hedonic smart home services when they are promotion-focused (vs. prevention-focused).

Consuming Beauty in Place of Power: Gender and Culture Moderation

Sahoon Kim, University of Illinois at Urbana-Champaign, USA
Carlos Torelli, University of Illinois at Urbana-Champaign, USA

How would consumers' psychological sense of power – which can be influenced by numerous factors such as seller-buyer interaction – affect their apparels and beauty consumption? We theorize and demonstrate that men (women) consume more when feeling powerful (powerless). This tendency is stronger for individuals with certain cultural orientations.

From Powerlessness To Variety-Seeking When Choosing For Others: Making Gift Choices For A Romantic Partner

Sahoon Kim, University of Illinois at Urbana-Champaign, USA
Sharon Shavitt, University of Illinois at Urbana-Champaign, USA
Carlos Torelli, University of Illinois at Urbana-Champaign, USA

Many goods are purchased for others (e.g. gifts). When choosing a gift for a romantic partner would one's sense of power affect the choice? We demonstrate that feeling powerless increases variety seeking in choices made for the partner mediated by the reduced certainty in one's partner's preferences associated with powerlessness.

"I'm Cold But Feeling Warm": Effect of Cold Temperature on Evaluations of Ad Message

Myung Joo Kim, Ewha Womans University, South Korea
Jisoo Shim, Ewha Womans University, South Korea
Eunice Kim, Ewha Woman's University, South Korea

The present study investigates whether the temperature individuals physically experience influences their perception of social affiliation and evaluations of ad messages. This study shows that coldness generates more positive attitudes toward psychologically close (vs. distant) ad messages. The implications of our findings are discussed.

The Interactive Effects of Identity Salience and Accountability on Product Judgment

Claire Heeryung Kim, McGill University, Canada

A salient identity motivates consumers to think and behave consistently with that identity. Expecting to be required to explain a judgment to others later might increase motivation to engage in comprehensive information processing. Thus this research proposes that the act of providing reasons will diminish the identity salience effect.

When Is a Good Thing a New Thing? How Upcycling Product Display Affects Consumer Novelty Perception and Advertising Evaluation

Junghyun Kim, NEOMA Business School, France
Youngju Kim, NEOMA Business School, France
Junbum Kwon, University of New South Wales, UK

How does the position of source materials influence attitudes toward a repurposed product? We investigate the impact of product communication strategy on consumer attitude toward an upcycled product. Two studies demonstrate that how a company presents the past identity of an upcycled product influences consumers' novelty perception and advertising evaluation.

Generation Z Consumers' Luxury Goods Ownership Types and Purchase Intention Of Luxury Goods Using Collaborative Redistribution Platforms

Jihyun Kim-Vick, Kent State University, USA

The findings of this study extend our understanding of the young adult consumers' channel choice intentions toward purchasing brand new or previously owned personal luxury goods via traditional retail vs. collaborative redistributional platforms. Pragmatic implications for the luxury brand marketers as well as the online resale industry were provided.

Syllabic Fluency

Dan King, University of Texas Rio Grande Valley, USA
Sumitra Auschaitrakul, University of the Thai Chamber of Commerce, Thailand

We show that the syllabic structure of brand slogans and medical claims can influence consumers' judgments of truth. When the number of syllables of the brand name matches the number of syllables in the outcome consumers feel a metacognitive sense of processing fluency which increases judgments of truth.

It is Better to be Unknown Than Known: Mixed Use of Less Known and Well-Known Luxury Brands Can Elicit Higher Status Inference

Min Jeong Ko, Seoul National University, South Korea
Kyoungmi Lee, Seoul National University, South Korea

Across four studies we find that mixed use of less known and well-known brands compared to use of all well-known or all less known brands increases perceived status when well-known brands are in luxury(vs. non-luxury) domain. This is because observers infer user's desire to dissociate from lower class luxury users.

The Three-component Multidimensional Model of Self-image Congruence

Magdalena Kolanska, University of Zielona Gora, Poland
Oleg Gorbaniuk, University of Zielona Gora, Poland
Wilczewski Michał, University of Warsaw, Poland

The Three-Component Multidimensional Model makes it possible to assess and distinguish between the values of the brand incorporated into the consumer's self-image which correspond to self-enhancement self-protection and self -verification motives (Sedikides Gregg 2008). In order to build the Model a series of 3 tests was carried out.

Losing Possessions and Subsequent Spending

Shruti Koley, Portland State University, USA
Christina Kan, University of Connecticut, USA
Chiraag Mittal, Texas A&M University, USA

This research examines how losing one's possessions affects consumers' subsequent spending on unrelated purchases. We show that the effect depends on consumers' perceived wealth and their manner of losing. After losing their possessions wealthy (less wealthy) consumers spend more (less) subsequently but only when they blame themselves for the loss.

Smart Homes From a Consumers' Perspective

Monika Koller, Vienna University of Economics and Business, Austria
Fanny Springer, Vienna University of Economics and Business, Austria

Smart homes play a major role in the world of digital change. The aim of this paper is to shed light on smart homes from a consumers' perspective beyond focusing on technological solutions. We explore major associations with smart homes and dig deeper into a comprehensive understanding of their acceptance.

Small-Talking Brands: Exploring Phatic Brand Communication on Social Media

K.B. Koo, University of Alberta, Canada
Sarah G Moore, University of Alberta, Canada
Jennifer Argo, University of Alberta, Canada

We introduce and develop a new construct: phatic brand communication. The main function of such communication is to express sociability rather than information to consumers (e.g. "Happy Tuesday!"). Using Twitter data and experiments we propose and test a conceptual framework of phatic brand communication including its components and potential outcomes.

Striving For Social Media Reduces the Ability to Filter Out Visual Distractors

Christina Kößmeier, University of Duisburg-Essen, Germany
Oliver B. Büttner, University of Duisburg-Essen, Germany

This research examined how visual distraction is influenced by consumers' striving for social media. In three laboratory experiments we showed striving for social media – measured as craving for social media situational social exclusion and situational fear of missing out – decreased the ability to filter out visual distractions.

The Role of Visual Perspective in Influencing Donation Giving

Sining Kou, Renmin University of China, China

Based on construal level theory this research demonstrates that when the consumer's mindset (i.e. concrete vs. abstract) activated by visual perspective (i.e. first vs. third person perspective) is aligned (vs. misaligned) with the construal level of the message donation intentions and behaviors increase (vs. decrease).

Immunizing Against Diversity: Feeling Disgusted Reduces Positive Diversity Beliefs

Afra Koulaei, Innland Norway University of Applied Sciences, Norway
Luk Warlop, Norwegian School of Management, Norway
Bjørn Ove Grønseth, University of South-Eastern Norway

This study concerns with the impact of disgust on the evaluation of social groups and more specifically on the reduction of positive beliefs about increasing diversity in social groups. Three studies provided the test of our prediction that disgust (both chronically and state) reduces positive diversity beliefs.

The Moral Deviant: Norm Violators Are Expected to Communicate Concretely

Afra Koulaei, Innland Norway University of Applied Sciences, Norway

Violation of social norms may signal that the target lacks morality. Two studies suggest that morality have a leading role over other basic dimensions of human social cognition (i.e. sociability and competence) in the impression formation process of norm violators. To signal their morality norm violators are expected to communicate concretely.

Friend or Foe? A Long-term Multi-Country Perspective on Consumer Animosity

Tinka Krüger, Kiel University, Germany
Robert Mai, Grenoble Ecole de Management, France
Wassili Lasarov, Kiel University, Germany
Stefan Hoffmann, Kiel University, Germany

The Brexit or the US-Chinese trade conflict mark the resurgence of deglobalization and consumer animosity. Based on existing data from six countries from 2010 this study lays the foundation to examine whether animosity context changes result in altered individual consumption behaviors and hence evaluate the scope of animosity for practitioners.

Emotionality and Language Norms in Consumer Reviews: The Curious Case of Emoji

Polina Landgraf, IE Business School, IE University, Spain
Nicholas Lurie, University of Connecticut, USA
Antonios Stamatogiannakis, IE Business School, IE University, Spain
Susan Danissa Calderon Urbina, University College Dublin, Ireland

How do emoji impact the persuasiveness of consumer reviews? We argue that effects of emoji in reviews are stronger for utilitarian than hedonic products. Two experiments show that effects of emoji on persuasion are consistent with an account based on emoji as a language rather than as markers of emotionality.

Healthy or Not Healthy ? That's Not the Main Question

Sarah Lasri, University Paris-Dauphine, PSL, France

Even if researchers tried to understand healthy consumption it was often through a normative lens. They try to figure out triggers and consequences without questioning how healthiness is constructed. We attempt to show that it is a social myth where consumers play a huge part to define constantly new moralisms.

Consumer Perceptions of Floating Signifiers in Spurious Health-related Product Claims

Olga Lavrusheva, Aalto University, Finland
Alexei Gloukhovtsev, Aalto University, Finland
Tomas Falk, Aalto University, Finland

Our study looks at the use of ambiguous product health claims in food marketing. In particular we focus on consumer interpretations of "floating signifiers": claims that are ambiguous enough to escape precise definition and regulation while at the same time sufficiently "loaded" with health-related meanings from the consumers' perspective.

The Truth is in the Tweet: Exploring the Impact of the Linguistic Authenticity of Politician's Tweets on Their Personal Brands

Andrew Lee, University of Manitoba, Canada
Mehmet Yanit, University of Manitoba, Canada
Fang Wan, University of Manitoba, Canada

Politicians take to Twitter as a vehicle for connecting with voters and making their opinions known. Donald Trump became infamous for his outrageous tweeting style during the 2016 election. By using LIWC and experiments this research aims to unearth the mechanisms of authenticity with politicians on Twitter through their language style.

Truth Or Dare: Do People Behave Differently In Social Risk Vs. Financial Risk? The Inherent Difference Between Financial And Social Risk

Sunme Lee, University of Iowa, USA
Catherine Cole, University of Iowa, USA
Dhananjay Nayakankuppam, University of Iowa, USA

This paper examines systematic differences in risk preferences between financial and social contexts. People tend to be loss averse in the financial domain but gain averse in the social domain i.e. more (less) risk-seeking in the gain frame than in the loss (gain) frame in the social (financial) domain.

5th Best Hotel in America Vs. 2nd Best Hotel in New York: When Using Narrower Sets in Rank Claims Improves Consumer Judgments

Wei Li, Huazhong University of Science and Technology, China
Yaping Chang, Huazhong University of Science and Technology, China
Jun Yan, Huazhong University of Science and Technology, China

This research shows consumers evaluate a product or brand more favorably when it appears front in a narrow ranking list than later in a broad list. This effect arises only when consumers are maximizers. Perceived risk cognitive load and significance of the decision also moderate the effect.

Imperfect Boundaries: The Effects of Boundaries on Perceived Healthiness of Healthy Food

Ruiqin Li, Renmin University of China, China

How do boundaries influence perceived healthiness of healthy food? The present research shows that expressing product information with boundaries fixes attention of consumers on the information which induces motivated reasoning and finally reduces perceived healthiness. In addition the effect of boundaries only exists in healthy (vs. unhealthy) food domain.

Over-Inference in Predicting Others' Preferences

Xilin Li, University of Chicago, USA
Christopher Hsee, University of Chicago, USA

Through five studies we document an "over-inference bias" whereby predictors over-rely on predictees' preferences in one domain to infer their preferences in another domain. We also explore the underlying mechanism of this bias and articulate boundary conditions under which this bias can be attenuated or reversed.

Recall the Past: How Actors' and Observers' Perspective Affect Word of Mouth

Ran Li, Chinese University of Hong Kong, China

This research examines how the visual perspectives that people use to recall their past consumption experience (actor vs. observer) affect their subsequent sharing. Two experiments showed that taking an observer perspective reduces consumers' sharing of negative word of mouth through the mediating role of attention-seeking motivation.

The Awed Holistic Thinker: The Effect of Awe Experience on Individuals' Thinking Styles

Ran Li, Chinese University of Hong Kong, China
Tao Tao, Hong Kong Baptist University, China

This research examines the effect of awe on people's thinking styles. Seven studies showed that awe could promote holistic thinking (studies 1 2A-2D) through the mediating role of self-diminishment tendency (study 3). Moreover we demonstrated how the proposed effect influences consumers' reactions to service failures (study 4).

Beauty Camera Makes You More Emotional!: The Effect of Beauty-filtered Selfies on Consumer Decision Making

Shuyu Liang, Lingnan University, China
Tingting Wang, Sun Yat-Sen University, China

This research reveals a positive effect of beauty-filtered (vs. not) selfies on consumers' reliance on affective considerations in decision making. Drawing on extant research on self-presentation motivation and confidence we propose and demonstrate in two studies that taking beauty-filtered (vs. regular) selfies makes consumers prefer affectively (vs. cognitively) superior options.

Can Gratitude Increase Individuals' Sustainable Consumption Behavior? — the Mediating Effect of Time Discounting

Jianping Liang, Business School, Sun Yat-sen University, China
Leilei Guo, Sun Yat-sen University, China

This research examines the influence of gratitude on individuals' sustainable consumption behaviors. Results from a longitudinal study and three between-subjects experiments showed positive influences of trait gratitude and priming gratitude on consumers' willingness to use green products through reduced time discounting. Connectedness to future-self moderated these effects.

Social Media Amplifies Gift-givers' Conspicuous Consumption Motivation

Shuyu Liang, Lingnan University, China
Tingting Wang, Sun Yat-Sen University, China

This research reveals an interesting misalignment between gift giver's and receiver's considerations. Specifically we found that facing receivers who are social-media active (vs. inactive) givers prefer conspicuous (vs. not) gifts out of anticipation of receivers' sharing the gifts on social media; however gift conspicuousness does not affect receivers' sharing intention.

Consumer Knowledge and the Psychology of Opposition to Scientific Consensus

Nicholas Light, University of Colorado, USA
Philip M. Fernbach, University of Colorado, USA

Communicating scientific evidence is a major challenge. We report three studies on the relationships between knowledge type and anti-scientific attitudes across seven scientific issues. We find that as extremity of attitudes increases objective knowledge decreases but subjective knowledge increases. However several issues show inconsistencies worthy of further examination.

The Influence of Fake News on Consumer Spending in Response to COVID-19

Nicholas Light, University of Colorado, USA
Justin Pomerance, University of Colorado, USA
Lawrence E Williams, University of Colorado, USA

Fake news has entered the global consciousness. While previous work examines interventions and direct consequences we examine how it changes consumer spending intentions during the COVID-19 pandemic. Two studies indicate that fake news induces uncertainty which increases both the desire to save money and the intention to spend it compensatorily.

How Legacy Motivation Influences Financial Risk-Taking

Wang Lin, Sun Yat-Sen University, China
Chen Zengxiang, Sun Yat-Sen University, China
Yun He, Sun Yat-sen University, China

The creation of legacy is one of the most fundamental motivations human beings possess. The current research investigates the impact of legacy motivation on consumers' financial decision-making. Results of three experiments revealed that legacy motivation reduced consumers' financial risk-taking tendency and explored why and when this effect occurred.

#Favoritethings: How Posting Your Favorite Possessions on Social Media Increases Happiness

Jingshi Liu, Business School City, University of London, UK
Amy Dalton, Hong Kong University of Science and Technology, China
Anirban Mukhopadhyay, Hong Kong University of Science and Technology, China

Posting favorite possessions on social media increases people's happiness. This is because favorite possessions are unique and of personal meanings and thus resistant to the upward social comparisons prominent on social media. The happiness associated with posts of favorite possessions in turn increases liking of the social media platform.

How Consumers React to Culturally Mixed Products: The Effects of Cultural Domain and Mixing Direction

Yingyue Liu, Sun Yat-Sen University, China
Zhimin Zou, Sun Yat-Sen University, China
Yimin Zhu, Sun Yat-sen University, China

This paper conducts two studies to examine the joint effect of cultural domain and mixing direction on consumers' attitudes to culturally mixed products as well as the mediating effect of perceived cultural threat and the moderating effect of polycultural mindset which give implications to better understand the cultural mixing phenomenon.

Lonely Heart? Warm it up With Love: The Effect of Loneliness on Singles' and Non-singles' Conspicuous Consumption

Wei Liu, Xiamen University, China
Zhaoyang Guo, Xiamen University, China
Rui Chen, Xiamen University, China

Three studies show that loneliness increases singles' conspicuous consumption but yields divergent effect for non-singles depending on their sociosexual orientation (SOI). In particularly loneliness has decrease conspicuous consumption among non-single people with low SOI but increase conspicuous consumption among those with high SOI. Mating motive mediates the above effects.

Will Highlighting Low Stock Level Speed Up or Impede Consumers' Purchase Intention? An Exploratory Study

Mengmeng Liu, Chinese University of Hong Kong, China
Jessica Y. Y. Kwong, Chinese University of Hong Kong, China

How would consumers respond when they see an item that they are considering has "only a few left"? Would this highlight of low-stock level speed up or impede their purchase decisions? Our findings suggest that the effect depends on the consumption type (utilitarian vs. hedonic).

The Effect of Cuteness on New Product Adoption: Moderating Role of Thinking Style

Hongyan Liu, Jinan University, China
Choong W. Park, University of Southern California, USA

This research examines how exposure to cute product design influences new product adoption. We propose that exposure to cuteness increases perception of hedonic benefit (fun) and new product adoption. While this effect is moderated by thinking style. Three experiments were conducted to test the propositions. The results support our predictions.

Hiding in Plain Sight- Low Self-Concept Clarity and Ironic Consumption

Karan Pratap Singh Lohan, Hong Kong University of Science and Technology, China

Ironic consumption allows consumers to signal different meanings- one to people who detect the irony and one to those who don't. Low self-concept clarity consumers are attracted to this dual (ambiguous) signal since it insulates them from the risk of self-instability as well as disapproval from others.

Does It Matter Whose Fault It Is? The Moderating Effects of Similarity and Product Substitution on Consumer Boycotts of Parent and Subsidiary Corporations

Yung-Chien Lou, National Chengchi Uniersity, Taiwan
Wei-Chih Tseng, National Chengchi Uniersity, Taiwan

This study demonstrates that consumer boycott behavior (and consumer perceptions) as a response to a conglomerate's wrongdoing is affected by the similarity between and degrees of product substitution of the parent and subsidiary corporations.

Cultural Difference In Self-Consciousness On Empathy Toward Socially Responsible Consumption

Chi-Cheng Luan, National Chiao Tung University, Taiwan

According to Triandis's theory people with individualistic cultures tend to use private self-consciousness whereas people with collectivistic cultures use public one. A shopping scenario was provided to examine participants' responses. The result shows that cultural difference is found in the distinct effects of self-consciousness on empathy for socially responsible consumption.

Discussing The Moderating Effect of Construal Level On The Relationship Between Emotional Appeals And Sustainable Consumption

Chi-Cheng Luan, National Chiao Tung University, Taiwan
Yun-Hui Wang, National Chiao Tung University, Taiwan

Moral emotions such as pride and empathy are found to relate to sustainable consumption. This research aims for the interaction between these two emotions and construal level based on the construal level theory. The findings can provide another direction of promotional strategies by simulteneously considering emotional appeals and construal level.

Priming Pleasure Through Smells: the Effect of Positive Odors on Categorization of Affectively Congruent Objects

Ramona de Luca, EAESP-FGV, Brazil
Delane Botelho, EAESP-FGV, Brazil

Studies demonstrated that pleasant scents induce pleasurable experiences and choices. However the unconscious mechanism through which individuals make mental associations between odors and unrelated objects is unclear. This research explores the effect of odors on mental processes (categorization) when the odor and stimuli in other modalities match on their valence.

The Effect of Ambient Odors on Categorization and Semantically-Congruent Product Choices

Ramona de Luca, EAESP-FGV, Brazil
Delane Botelho, EAESP-FGV, Brazil

Research in sensory and scent marketing has prioritized cognitive approaches in which consumer choices result from deliberate decisions. However consumers' choices are largely regulated by pleasurable experiences that arise automatically. This research explores the unconscious process underlying the effect of ambient scent on consumers' categorization and semantically congruent choices.

How Hope of Breaking Even Makes People Cling on Losing Stocks

Siria Xiyueyao Luo, Vrije Universiteit Amsterdam, The Netherlands
Femke van Horen, Vrije Universiteit Amsterdam, The Netherlands
Kobe Millet, Vrije Universiteit Amsterdam, The Netherlands
Marcel Zeelenberg, Vrije Universiteit Amsterdam, The Netherlands

Four studies found that hope explains the disposition effect: people's hope predicts the tendency to keep the losing stock; people who hold losing (vs. not-losing) stocks had a stronger hope of breaking even and thus were more likely to keep the losing stock; reducing the hope attenuates the disposition effect.

Closeness and Purchase Strategy Independently Influence Gift Choice

Dong Lyu, University of Nottingham, UK
Jia Jin, Ningbo University, China

This research aims to examine whether gift givers process social distance and purchase strategy independently. We plan to adopt drift diffusion model to simulate the decisional dynamics of givers then to check whether the drift rates of the processing of social distance and purchase strategy choice are correlated.

The Experiential Brain of Smartphone Users:
How Smartphone Use Reshape Thinking Style

Jingjing Ma, Peking University, China
Ying Zhu, University of British Columbia, Canada
Jiajia Liu, Peking University, China
Jingjing Wang, Peking University, China

Through two large-scale nationwide surveys with 24180 participants and an Implicit Association Test this study identifies an undocumented positive correlation between smartphone use/apps and experiential thinking. We revealed that this effect is driven by pleasure and social activities (e.g. watching movies and using social media) people perform on their smartphones.

Exploring the Concept of Sustainable Food Consumption

Natalia Maehle, Western Norway University of Applied Sciences, Norway

The purpose of this study is to explore how the concept of sustainable food consumption emphasizes the four aspects of sustainability. We conclude that it is a multidimensional concept focusing on the nature the human being the society and the optimal use of economic resources in the food chain.

Collaborative Consumption in a Subsistence Marketplace

Bhupesh Manoharan, Masters Union School of Business, India
Krishanu Rakshit, Indian Institute of Management Calcutta, India

The absence of lateral exchange markets (LEM) has impeded researchers from understanding collaborative consumption in subsistence marketplace contexts. This work aims to understand how an interactive LEM shapes interdependent peer-to-peer engagement in a subsistence marketplace.

Contesting Stigma in the Online Space: An Institutional Perspective

Bhupesh Manoharan, Masters Union School of Business, India
Krishanu Rakshit, Indian Institute of Management Calcutta, India

We explore how marginalised consumers tackle stigma in the online space by conceptualising the socio-political online consumption space as an institutional field and studying the dynamics between the upper and lower caste members and their efforts to distort the current institutional logic to establish their desired logics respectively.

The Effect of Transparent Packaging on Psychological Ownership and Preference

Eva Marckhgott, Wirtschafts University, Austria
Bernadette Kamleitner, Vienna University of Economics and Business, Austria
Zachary Estes, Bocconi University, Italy

Transparent packaging removes the visual barrier between the consumers and the product thereby allowing consumers to develop a more intimate relationship with the product. This in turn leads to a preference for products in a transparent packaging over products in an opaque packaging.

(No) Offense Taken: Value Creation vs Value Destruction by Brand-Offended Consumers

Ereni Markos, Suffolk University, USA
Lauren I Labrecque, University of Rhode Island, USA
Mujde Yuksel, Suffolk University, USA

Consumers often post negative comments on brand social media with intentions to harm (value-destruction). We examine if this action backfires instead strengthening observing consumers' relationships with the brand. We illustrate that consumers attack brands on social media for different reasons and also investigate why consumers defend brands against others' attacks.

Patterns of Use, Essence Transfer, and Value:
How Patterned Usage Impacts Object Valuation.

Nathanael S. Martin, University of Cincinnati, USA
Noah VanBergen, University of Cincinnati, USA

Does how an object is used impact consumers' valuation of the object itself? The present research seeks to investigate whether objects whose usage is illustrated by a specific pattern are deemed more valuable to consumers due to possessing more of the original user's essence. Three studies offer initial support.

Are Ingroup Recommendations Always Better? The Role of
Outgroup Credibility on Parental Purchases and Attitudes

Fábio Miguel Ferrony Varela Martins, Universidade Europeia, Portugal
Márcia Maurer Herter, Universidade Europeia, Portugal
Raquel Reis Soares, Universidade Europeia, Portugal
Diego Costa Pinto, Nova IMS - Information Management School, Portugal

This paper uncovers how outgroup credibility can reduce ingroup bias. In particular this paper examines how credibility acts as a boundary condition to social influence of parents (ingroups) and pediatricians (outgroups) turning outgroups more influential than ingroups on parental purchase intentions and brand attitudes.

Customer Citizenship Behavior in Customer Networks:
An Analysis in the Lens of Network and Consumer Value Theories

Renata Martins, Fundação Getúlio Vargas, Brazil
Sofia Batista Ferraz, EAESP-FGV, Brazil
Felipe Zambaldi, FGV/EAESP, Brazil

Most studies that investigate customer citizenship behavior (CCB) in customer networks neglect the impact of networks' structures on it. Our work is the first to fulfill this gap proposing a framework showing the extent to which CCB depends on the network's structure and on the purposes customers expect to achieve.

Eating More to Save the Planet: Political Ideology, Food Waste, and Overconsumption

Erick M. Mas, Vanderbilt University, USA
Kelly Haws, Vanderbilt University, USA
Kelly Goldsmith, Vanderbilt University, USA

When facing the tradeoff to waste or overconsume liberals may engage in maladaptive eating behavior by overconsuming to offset food waste because they are motivated to reduce environmental impacts. Conservatives who are less concerned with these issues do not make consumption choices predicated on reducing environmental harm.

The Impact of Indulgent Consumption Images on In-Store Decision Making

Maxine Materne, University of Hamburg, Germany
Mark Heitmann, University of Hamburg, Germany
Christina Schamp, University of Mannheim, Germany

Marketers assume that displaying indulgent consumption facilitates mental simulation and increases purchase intentions. One field experiment and two simulated shopping experiments suggest that showcasing indulgent consumption is context-dependent such that the positive effect found in laboratory experiments for advertisement related settings does not generalize to images displayed in-store.

When and Why an Entertaining Story Triggers Brand Buzz

Koji Matsushita, Chuo University, Japan

This research proposes that an entertaining story with no brand appearance can boost brand word-of-mouth (WOM). When highly transported consumers are aware that a brand might utilize a story to strengthen the brand image (salient persuasion knowledge) they become motivated to engage in brand WOM activity.

Feeling Hopeful in Response to High/Low Prototypical Identity-linked Appeals: The Distinctive Roles of Affective and Cognitive Social Identity

Miriam McGowan, University of Birmingham, UK
Louise May Hassan, Bangor University, UK
Edward Shiu, Bangor University, UK

Research shows identity-linked messages need utilize established social group characterizations to be effective. We find priming consumers' identity using less/more established (low/high prototypical) characterizations has differential effects on purchase intention. The emotion hope mediates this process. Three experimental studies with US MTurk samples using gender/nationality identities supported our hypothesized effects.

The Role of Fluency in Identity-Linked Marketing

Miriam McGowan, University of Birmingham, UK
Edward Shiu, Bangor University, UK
Louise May Hassan, Bangor University, UK

Across three studies we examine low identifiers in the context of identity-targeted messages. Drawing on fluency literature we explore how low identifiers process identity relevant information differently to high identifiers. Low identifiers process identity-linked messages less fluently than primes depressing their product evaluation. The opposite occurs for high identifiers.

The Effect of Perspectives in Food Pictures on Unhealthy Food Choices

Eva Meersseman, Ghent University, Belgium
Iris Vermeir, Ghent University, Belgium
Maggie Geuens, Ghent University, Belgium

Consumers choose less unhealthy food when seeing pictures of food shot in a top perspective vs. a diner's eye perspective. We show that lower familiarity with seeing food in top view decreases product vividness and subsequently lowers the need for instant gratification. Hence less unhealthy food is chosen.

The Impact of Dynamic Advertising With Zoom Lens on Consumers' Comparative Decision-Making Preferences

Lu Meng, Renmin University, China

This research proposes the impact of merchants 'zooming and pulling lenses on consumers' comparative decision-making methods in dynamic advertising on online shopping platforms and the perception distance's mediator role in this process.

"Show Me Your Basket, I Show You What Drives Your Food Waste"
Identifying Drivers of Shoppers' Food Waste and Ways to Reduce It

Sybilla Merian, University of Zurich, Switzerland
Petra Tipaldi, University of Zurich, Switzerland
Klaus Fuchs, ETH Zurich, Switzerland
Martin Natter, University of Zurich, Switzerland

The increasing debate on food waste puts pressure on consumers and sellers. We propose a scalable approach to identify food waste predictors based on consumers' automatically logged loyalty card data. Identifying characteristics triggering food waste we propose a non-invasive intervention informing consumers and help them to reduce the problem.

Consumer Experience Of Working From Third Places

Laetitia Mimoun, City University of London, UK
Adèle Gruen, Goldsmiths, University of London, UK

This research contributes to the literature on consumer experience in third places. We document the emerging value that a growing body of working consumers derive from third places as work accelerators. We also show how this evolution may generate conflicts and confusion despite sustaining the social ideology of third places.

Any Takers For Male Alex Vs. Female Alexa? The Impact
of the Gender of Voice Technology on Consumer Choices

Nirajana Mishra, Boston University, USA
Geeta Menon, New York University, USA

In the future consumers' interactions with voice technology will only increase. Most of these voices are currently female. Through an initial set of studies we find that gender of voice technology brings stereotypes to bear on consumers' judgments that translates to products.

Masculine Servicescapes? Examining the Intersections Between
Men's Identity Construction and Built Commercial Environments

Risto Moisio, California State University Long Beach, USA
Mariam Beruchashvili, California State University Northridge, USA

We examine how servicescapes built commercial environments partake in the process of masculine identity construction. Using men's recreational training at the Mixed Martial Arts dojos/gyms we demonstrate how a physical space of a dojo/gym contains and constructs a specific identity project the fighter ideal that would be difficult to realize elsewhere.

The "Why" of Spending Matters: The Role of Extrinsic and
Intrinsic Goals on Consumer Spending Choices and Hedonic Value Estimations

Olaya Moldes, Cardiff University, UK

Past research suggests that what we buy (experiential vs. material; prosocial vs. proself) impact one's well-being. We propose that why—the motivation behind—not only determines the spending choices made but also the well-being experienced. Three studies test the influence of dispositional and situational intrinsic and extrinsic goals in consumption.

The Effects of Virtual Compared to Real Eating Companions on Unhealthy Food Intake.

Saar Mollen, University of Amsterdam, The Netherlands
Sindy Resita Sumter, University of Amsterdam, The Netherlands
Nadine van der Waal, Tilburg University, The Netherlands
Pascale Kwakman, University of Amsterdam, The Netherlands
Nynke van der Laan, Tilburg University, The Netherlands

In the current experiment we investigated whether social models in VR have a similar influence on eating behavior as real-life models and whether similar processes underlie their influence. Participants' intake was influenced by that of the social model irrespective of whether this person was present in real-life or VR.

Misperception of Multiple Risks: The Role of Categorical Reasoning

Mehdi Mourali, University of Calgary, Canada
Zhiyong Yang, University of North Carolina at Greensboro, USA

How do consumers combine multiple risk items when forming overall risk impressions? Our study shows an intriguing pattern where an option with multiple risks is judged to be less risky than the same option with only one of these risks. We attribute the findings to categorical reasoning about risk.

Is There Room For Social Stimuli in Green Ads?: An Investigation of the Use of Human Face in Green Advertisements

Brishna Nader, Fontys University of Applied Science, The Netherlands
Meng-Hsien (Jenny) Lin, California State University Monterey Bay, USA
Iris van Hest, Fontys University of Applied Science, The Netherlands

This paper explores the effectiveness of human face (a social cue) used along with green message (an informational cue) in green advertisements. We find that while green ads are generally preferred over non-green ads it is less preferred when a face (vs. no face) is present.

"When First is Best": Why Brand-First is Superior to Attribute-First During Sequential Presentation of Product Information

Priya Narayanan, Indian Institute of Management Kozhikode, India
Arvind Sahay, Indian Institute of Management Ahmedabad, India

Four studies including a mall intercept show that consumers' willingness to pay (WTP) for a product is higher when brand information is presented before attribute information an effect mediated by brand-elicited affect. This research contributes to feelings-as-information ordered presentation of product features and derives implications for marketing communication and packaging.

"Practices As Institutional Fractals: Zooming in on Fika, Zooming Out to Lagom"

Angeline Nariswari, California State University Monterey Bay, USA
Kaisa Koskela-Huotari, Karlstad University, Sweden
Teea Palo, University of Edinburgh, UK

This paper studies Swedish coffee drinking ritual fika to understand institutional maintenance by looking beyond micro-level practices to examine the role of broader level institutional arrangements. The study identifies how fika is supported by other practices that display self-similarity regardless of scale—fractals—that altogether refract a common societal-level value.

Mouse Tracking in E-Commerce: Assessing Choice Difficulty Via Consumer's Hand Movement

Patrick Wolfgang Neef, University of Innsbruck, Austria

Pre-decisional information processing is strongly linked to consumer choice. Since consumers increasingly purchase through online channels the question arises whether other computer-based technology can be applied to better understand consumer decision-making. One purpose of the present inquiry is to understand how difficulty of the decision-making process affect hand movements.

I Enjoy Being Mii: How Knowing Yourself Impacts Avatar Enjoyment

Emma Neybert, University of Cincinnati, USA
Rashmi Adaval, University of Cincinnati, USA

Often consumers assemble avatars to resemble themselves. However avatars often fail to fully capture all aspects of their creator resulting in "poor copy syndrome" lowering enjoyment. In one provocative study we find that contingent on one's self-concept clarity perceived personality similarity between the creator and their avatar impacts avatar enjoyment.

The Effects of Harmonics on the Tactile Perceptions of Products

Mayuko Nishii, Waseda University, Japan

Congruence between product elements and sensory cues elicits positive responses from consumers. However we show that when listening to soft-toned music that seems appropriate for products such as soft blankets consumers tend to be less sensitive to their haptic perceptions. Therefore we propose the role of comfort.

Cultures of Product Reviewing

Mikkel Ørholm Nøjgaard, University of Southern Denmark, Denmark
Niklas Woermann, University of Southern Denmark, Denmark

How do expert reviews and online user reviews construct product quality information? This paper explores the social processes of product reviewing. It conceptualizes expert reviewing and user reviewing as two distinct 'epistemic cultures' and shows that these cultures vary across three epistemic processes: generating evidence evaluating evidence and presenting evidence.

Examining the Structural Relationship Between Socioemotional Comparisons and General Risk Preference

Dallas Novakowski, University of Calgary, Canada
Mehdi Mourali, University of Calgary, Canada

Past research suggests that feelings of relative disadvantage (i.e. envy relative deprivation) have a causal role in eliciting domain-general risk-taking behaviours. This study used structural equation modelling in a crowdsourced sample (n=804) and found that feelings of relative disadvantage account for significant variance with a general factor of "risk preference."

Entitled to Be Served: Does Self-Checkout Make Customers Feel Less Rewarded?

Farhana Nusrat, Drexel University, USA
Yanliu Huang, Drexel University, USA

We examine how self-checkout service impacts customer loyalty compared to regular checkout service. In two studies we show that self-checkout service compared to regular check out make customers feel less rewarded less satisfied with their purchases and less likely to return to the store.

The Effects of Similarities- vs Differences-focus on Fake News Processing

Gergely Nyilasy, University of Melbourne, Australia
Bernice Plant, Monash University, Australia

The fight against fake news currently lacks working interventions. This study explores individual cognitive differences to pave the way towards such interventions. Relying on comparison theory hypotheses test the effects of similarities- and differences proneness. Findings suggest that these factors indeed influence cognitive processing – if not summative truth and confidence judgments.

Just Teasin': Why Poking Fun at Consumers Makes Brands Feel More Human

Demi Oba, Duke University, USA
Holly S Howe, Duke University, USA

Can consumers handle being teased by a brand? Across three experiments (on three different advertising platforms) brands who tease consumers are consistently shown to be more anthropomorphic than purely funny or serious brands. We demonstrate that this anthropomorphism has positive downstream consequences for brand liking and self-brand connection.

Indulge Every Now and Then: Anticipating Indulgence Increases Indulgent Food Preferences Among Restrained Eaters

Ga-Eun (Grace) Oh, Open University of Hong Kong, China

This research examines the interactive effects of anticipating indulgent consumption and dietary restraint on indulgent food preferences for immediate consumption. Three experiments reveal that anticipating indulgent food consumption increased restrained eaters' indulgent food preference for immediate consumption whereas it often reduced unrestrained eaters' indulgent food preference.

The Status Implications of Age Perception and Conspicuous Consumption

Ga-Eun (Grace) Oh, Open University of Hong Kong, China

This research examines how age perception has different implications regarding status among men and women. As a result of the different status implications of age towards men versus women subjective age perceptions have different effects on the conspicuous consumption of men and women.

Impact of Inverted Packaging on Brand Memory

Nur Yazgan Onuklu, Temple University, USA
Maureen Morrin, Rutgers University, USA

In this paper we explore the influence of upside down packaging on brand recall and recognition. With two studies we show that unaided recall and recognition memory are improved when there is an upside down bottle presented among regular bottles compared to an all regular bottle presentation.

Paying For Free Products Stops Consumers From Committing to Other Brands: Role of Perceived Control

Maria Ortiz, Concordia University, Canada
Arani Roy, McGill University, Canada

Consumers are susceptible to encounter non-zero costs for products which they think should be available for free (e.g. online gaming apps) leading them to a reduced feeling of control. We examine the effect of reduced perceived control on consumers' commitment to brands they subsequently encounter using predictive control theory.

"Run, Forrest, Run: How Intense Athletic Pursuits Induce Therapeutic Feelings"

Tatsiana Padhaiskaya, Aalto University, Finland

This research aims to uncover how consumers' understanding of their own bodies informs the production of therapeutic feelings. My ethnographic inquiry in the context of ultra-running illustrates a multi-stage process of in-depth engagement with the body that results in the therapeutic consequences of various magnitudes.

Objectification and the Acceptance of Inequality

Helena Palumbo, Pompeu Fabra University, Spain
Gert Cornelissen, Pompeu Fabra University, Spain

Media and marketing communications often represent people in an objectified manner. The systematic exposure to such objectifying messages might affect various types of judgments that people make. In this paper we test whether it increases people's tolerance towards economic inequality. We hypothesize that the effect is mediated by reduced empathy.

Recipe Ingredients Predict Digital Engagement With Food Media

Ethan Pancer, Saint Mary's University, Canada
Matthew Philp, Ryerson University, Canada
Maxwell Poole, Saint Mary's University, Canada

Two field studies (Buzzfeed's Tasty & Yummly) demonstrate that food media based on recipes rich in saturated fats receive more reactions comments shares and recipe bookmarks even when controlling for meal complexity and meal occasion (e.g. dessert). Experimental evidence suggests this effect is driven by positive affect.

When the Light Bulb Goes Off, Goal Progress Increases

Mivena Panteqi, Vilanova University, USA

We propose that lighting ambience influences goal completion via perceptions of goal distance. That is the progress towards achieving a goal is perceived through the reduction in distance towards the targeted goal.

Does Anticipated Future Self-Regulation Increase Present Self-Regulation? Counteractive Construal of Intertemporal Choice

Jihye Park, Seoul National University, South Korea
Youjae Yi, Seoul National University, South Korea

This research examines how anticipated future behavior can encourage current self-regulation. Findings show that consumers are more likely to engage in self-regulatory behaviors when they anticipate resisting (vs. succumbing to) future temptation. Results also show that this effect is accounted for by counteractive construal and stronger for non-impulsive consumers.

Personal Trainers' Physical Appearance and Service Registration Intention: Perceived Competence as an Underlying Mechanism

Sangchul Park, Texas A&M University, USA
Shinhyoung Lee, Sookmyung Women's University, South Korea
Hyun-Woo Lee, Texas A&M University, USA

This study investigates the effect of personal trainers' physical appearance on fitness service registration intention via perceived competence. Specifically we hypothesize that consumers perceive muscular (vs. well-shaped) trainers as more competent which in turn boosts their registration intention for personal training services.

The Impact of Natural Versus Attained Beauty on Service Evaluations

Jooyoung Park, Peking University, China
Nathasya Pricilia B Kristianto, Peking University HSBC Business School, China

This research examines how women customers differently judge a service provider with natural or attained beauty and in turn evaluate their service. Two field experiments showed that obtained beauty is judged less favorably decreasing overall service evaluations.

Double Anchors in an Online Charitable Giving Platform: The Limitation of Small Suggested Amount Solicitation

Sohyeon Park, Korea University, Korea

This research proposes a two-stage anchoring process model that analyzes the anchoring behavior of consumers in charitable giving when a solicitation message contains double anchors such as suggested amount and target amount. Specifically transition of anchoring behavior under manipulation of amount size in suggested amount and target amount is observed.

"Turning the Other Cheek": The Role of Face Orientation on Perceived Model Attractiveness and Product Evaluation

Jaewoo Park, Musashi University, Japan
Charles Spence, University of Oxford, UK
Hiroaki Ishii, Aoyama Gakuin University, Japan
Taku Togawa, Sophia University, Japan

The present research demonstrates that people perceive a model showing their left (vs. right) cheek as more attractive even when the images happen to be otherwise identical. We also show that in an advertising context a model apparently showing their left (vs. right) cheek leads to more favorable product evaluation.

The Inescapable Quest of Happiness: Exploring How the Ideology of Happiness Shapes Contemporary Consumer Society

Gabrielle Patry-Beaudoin, Queens University, Canada
Jay Handelman, Queens University, Canada

This paper draws attention to the ideology of happiness and examines how it influences a marketplace. We contribute to the literature on happiness in marketing by highlighting two cultural discourses of happiness that consumers and producers constantly negotiate: happiness as a virtuous project and happiness as a momentary pleasure experience.

When Technology Fails: Rage Against the Machine or Self-Control? Investigating Customer's Negative Emotions and Coping Strategies in AI-Service Failure Scenarios

Giulia Pavone, Toulouse School of Management TSM Research UMR 5303 CNRS, France
Lars Meyer-Waarden, Toulouse School of Management TSM Research UMR 5303 CNRS, France
Andreas Munzel, University of Montpellier - Montpellier Research in Management (MRM), France

We investigate the impact of service failures on customers' anger frustration and coping strategies when interacting with an artificial intelligence based chatbot compared to a human. Results show that in the same aversive situation emotional responses differ when customers are aware of interacting with a chatbot rather than a human.

Sounds Healthy: Modelling Healthy Food Choices Through Music-Evoked Eye-movements in Consumers From Denmark and China-Tracking Study in Danish and Chinese Consumers

Danni Peng-Li, Aarhus University, Denmark
Derek Byrne, Aarhus University, Denmark
Raymond Chan, Chinese Academy of Sciences, China
Qian (Janice) Wang, Aarhus University, Denmark

The present study explores how custom-composed soundtracks associated with the notions of "healthiness" and "unhealthiness" can modulate Danish and Chinese consumers' eye-movement patterns and choice of specific food items. The findings of this study provide a better understand how specific auditory components collectively can nudge consumers in different market segments.

What is Transmedia Narrative Experience For Consumers of Arts and Heritage?

Christine Petr, Université de Bretagne Sud, France
Elodie Jarrier, Université d'Angers, France
Dominique Bourgeon-Renault, Université de Bourgogne Franche-Comté, Dijon, France
Maud Derbaix, Kedge Business School Bordeaux, France

New technologies allow Transmedia Narrative to become a successful strategy to enlarge consumers' experience with brands. We investigate the impact of transmedia on audience attachment considering arts and heritage. Conclusions offer additional conceptualizations to narrative transportation suggest dimensions for further research on consumers' engagement and on narrative transportation measurement.

Influence of Childhood Socioeconomic Status on Indulgent Consumption: A Life History Theory Approach

T. Andrew Poehlman, Clemson University, USA
Denny Huynh, Duke University, USA
Oriana Rachel Aragón, Clemson University, USA
Gavan Fitzsimons, Duke University, USA

Why do some people indulge now whereas others delay? The evolutionary framework of life-history theory predicts that preferences for indulgences should be influenced by stress and resource scarcity. The effect of stress depended on whether people grew up in a resource-scarce or resource-plentiful environment.

Model Citizens of The Empire: Mythology, Ethnic Identification, And British Indian Women

Anuja Pradhan, University of Southern Denmark, Denmark
Margaret Kathleen Hogg, Lancaster University, UK
Hayley Cocker, Lancaster University, UK

This study explores how macro-level identity myths such as the 'model minority' manifest and influence the lived experiences of 'privileged' ethnic migrant consumers such as professional British Indian women. It challenges our accepted norms of 'dominant' and 'dominated' consumers and shows the transformation of ethnicity across migrant generations.

How Religious Minorities Resolve Cultural, Market, and Religious Ambiguity

Theeranuch Pusaksrikit, Chulalongkorn University, Thailand
Amna Khan, Manchester Metropolitan University, UK
Andrew Lindridge, Newcastle University, UK

This research aims to explore how British Muslims engage with the religious cultural and market-derived consumption narratives surrounding Christmas festival of the religious dominant group. Utilizing qualitative method the findings identify three interconnected themes explaining how these participants engage (or not) with Christmas.

How to Convince Consumers That "You Do Not Always Get What You Pay For"

Vahid Rahmani, Rowan University, USA
Elika Kordrostami, Rowan University, USA

Findings of three studies showed that provoking suspicion could eliminate consumers' reliance on price to judge quality. Furthermore findings showed that activating persuasion knowledge is likely to result in a schematic thinking style a greater primacy effect of the readily available information and higher price-quality perceptions.

Effects of Visual Attention on Intertemporal Choice

Jairo Ramos, University of Colorado, USA
Kellen Mrkva, Columbia University, USA
Leaf Van Boven, University of Colorado, USA

Consumers discount delayed outcomes. We hypothesized that this happens partially because people attend primarily to immediate outcomes; and that shifting attention towards future outcomes reduces discounting. Across three experiments participants cued to visually attend to future rewards discounted future rewards less than participants cued towards immediate rewards and control participants.

Managing Multiple Identities: A Case of Meat Consumption

Louise Randers, Department of Management, Aarhus University, Denmark
John Thøgersen, Aarhus University, Denmark
Alice Grønhøj, Aarhus University, Denmark

The study identifies that consumers can hold multiple hierarchically ordered identities with implications for consumption reduction and avoidance of various protein products. Identities can correspond or conflict. In the latter case strategies of managing identity salience or changing protein consumption are used and these mechanisms can be utilized in practice.

Do as I Say, Not as I Do: Figuring the Child as Digital Native Through Technology Ideology and Caregiver Consumption

Sophie Alexandra Reeves-Morris, Liverpool John Moores University, UK
Shona Bettany, University of Huddersfield, UK

This early stage work seeks to add to the qualitative understanding of how children are becoming differentially socialised consumers through their smartphone engagement. To gain a holistic view the nature and dynamism of a carer's technology ideology is being explored to see how this may create disparities in children's smartphone socialisation.

The Friday Payday Effect: The Impact of Intraweek Payday Timing on Deserving Justifications and Discretionary Spending

Wendy De La Rosa, Stanford University, USA
Broderick Turner, Northwestern University, USA
Jennifer Aaker, Stanford University, USA

More than half of Americans are paid on Fridays. However little is known about how intraweek payday timing (e.g. Monday vs. Friday paydays) impacts consumer spending. Across a series of studies and an analysis of real-world spending we demonstrate that Friday paydays increase consumers' deserving justifications and thus their discretionary spending.

Pain of Philanthropy: When Does Cash Help Charitable Donations?

Spencer Ross, University of Massachusetts Lowell, USA
Sommer Kapitan, Auckland University of Technology, New Zealand

Businesses have found their costs of accepting cash payments increasing as consumers have shifted toward noncash payments. Given this societal decrease in cash we examine the role of payment mechanisms in donation behaviors. We find while noncash payments are beneficial in certain donation transactions cash remains more beneficial in others.

Digital Resource Scarcity Affects Online Purchase Intent:
The Moderating Role of Message Framing

Arani Roy, McGill University, Canada
Ashesh Mukherjee, McGill University, Canada

Consumers often face scarcity of digital resources such as low battery-life or low data availability. Two experiments are conducted to examine the effect of digital resource-scarcity on consumers' online purchase intent. Using regulatory focus theory we propose that the effect of scarcity on purchase intent is moderated by advertisement message-framing.

Algorithmic Decision-Making, Agency and Autonomy
in a Financial Decision Making Context: An Experiment

Laszlo Sajtos, University of Auckland, New Zealand
Benjamin G. Voyer, ESCP Europe, France
Marion Sangle-Ferriere, ESCP Europe, France
Billy Sung, Curtin University, Australia

Algorithmic decision making (ADM) plays an increasing role in consumers' life. ADMs rely on customer information and can contribute to reducing consumers' perceived autonomy which consumers may be reluctant to accept. Using a financial decision-making scenario we explore how human ADM and joint decision-making affects consumers' agency and autonomy.

Towards a Better Understanding of Consumer Online Browsing (COB)

Fabio Shimabukuro Sandes, Sao Paulo School of Business Administration FGV-EAESP, Brazil
Delane Botelho, EAESP-FGV, Brazil
Yuliya Komarova, Fordham University, USA

Through in-depth interviews and four experiments we investigate the Consumer Online Browsing (COB) as a distinct type of search behavior. There are different effects of COB and similar constructs on dependent variables and they are differently moderated by variables that arose from the qualitative phase of the research.

Guilty Pleasures: Consumers Choosing Identity Conflicting Behaviors

Nikkita Sarna, University of Texas at Austin, USA
Susan Broniarczyk, University of Texas at Austin, USA

We examine a real-world phenomenon where consumers knowingly and repeatedly act in an identity conflicting way for their own personal pleasure— guilty pleasures. Four experiments (n=~1000) demonstrate how guilty pleasures are behaviors that individuals choose to engage in even though they report identifying with the behaviors less than other behaviors.

Enjoying the Sale: The Case of Itinerant Retailers in Festivals

Prakash Satyavageeswaran, Indian Institute of Management Udaipur, India
Sridhar Samu, Great Lakes Institute of Management, India
Rajesh Nanarpuzha, Indian Institute of Management Udaipur, India
Jossin Shaji, Indian Institute of Management Udaipur, India

Retailers have been seen primarily as commercial entities; itinerant retailers included. We consider itinerant retailer as consumer in the context of temple festivals where they are motivated by the consumption of the festival. We also consider their role as informants and suppliers of products associated with the festival to consumers.

Digital Service Consumption, Blessing or Curse? Exploring the Effect of Persuasive Design Features on Mindfulness and Consumer Well-Being

Dorothea Schaffner, University of Applied Sciences and Arts of Northwestern,Switzerland
Uta Jüttner, Lucerne University of Applied Sciences and Arts, Switzerland
Anja Bruggmann, University of Applied Sciences and Arts Northwestern, Switzerland
Tobias Véron, University of Applied Sciences and Arts Northwestern, Switzerland
Philipp Wyss, University of Applied Sciences and Arts Northwestern, Switzerland
Martina Bracher, University of Applied Sciences and Arts Northwestern, Switzerland
Linda Lingg, University of Applied Sciences and Arts Northwestern, Switzerland

This study explores effects of mindfulness in digital service consumption. The findings of a diary research study provide mixed evidence: Consumer mindfulness in the digital service experience is negatively related to stress and positively related to satisfaction and well-being. However persuasive design features are not found to impact consumers' mindfulness.

You Get What You Ask For: How the Question Asked Shapes Person Perception and Discussion of Controversial Topics

Ann Schlosser, University of Washington, USA
Evelyn Olivia Smith, University of Washington, USA

Our research contributes to prior research by demonstrating that more important than comparing "how" to "why" is whether the question directs the respondent's focus inward. We find that an internal (e.g. "how improve") versus external (e.g. "how work") question inflated people's understanding of a topic and perceptions of disagreement.

I'm Not Too Generous: The Implications of a Novel Moderator of the Better-Than-Average Effect

Shoshana Segal, New York University, USA
Yonat Zwebner, The InterDisciplinary Center (IDC Herzliya), Israel
Alixandra Barasch, New York University, USA

The finding that people often rate themselves as better than the average (BTA) is widely understood to apply to positive traits such as intelligence and resourcefulness. We show however that the BTA effect is attenuated for the generosity trait: people do not (like to) think of themselves as too generous.

Consumer Experiences of Responsibilization in the Context of Digital Healthcare Services

Henriikka Seittu, Aalto University, Finland
Alexei Gloukhovtsev, Aalto University, Finland
Henri Weijo, Aalto University, Finland
Tomas Falk, Aalto University, Finland

We study consumers' experiences of increasing responsibilization in the context of online therapy services. We find that responsibilization ushers in a new subjectivity of "empowered consumer" that conflicts with the previously internalized subjectivity of consumer-patient. We detail how our informants engage in various practices of reflexivity to reconcile this conflict.

Sensory Attributes in Brand Extensions: The Role of Attribute Centrality in Evaluations of Fit

Samuel B Sekar, University of South Florida, USA

This paper examines the role of sensory attributes in consumer evaluation of brand extensions. Specifically we investigate how a consumer evaluates brand extensions on touch and smell-related attributes across multiple possible extensions.

Differential Correlates of Pathological and Impulsive Buying

Benjamin G. Serfas, University of Duisburg-Essen, Germany
Oliver B. Büttner, University of Duisburg-Essen, Germany
Matthias Brand, University of Duisburg-Essen, Germany
Astrid Müller, Hannover Medical School, Germany
Patrick Trotzke, University of Duisburg-Essen, Germany

The present research differentiates pathological from impulsive buying both on a measurement level and on a conceptual level. Firstly we establish discriminant validity between constructs. Secondly we suggest a model explaining the behavioral manifestation of pathological and impulsive buying. Thirdly we analyze the impact on brand loyalty.

From Satisfaction of Consumers to Satisfaction With Consumers: Reverse Rating in the Sharing Economy

Jie(Doreen) Shen, University of Illinois at Urbana-Champaign, USA
Aric Rindfleisch, University of Illinois at Urbana-Champaign, USA

The current research examines consumers' perceptions of the reverse rating (i.e. consumer are rated by providers). It also investigates the impacts of platform positioning on consumers' evaluation of a sharing platform that employs reverse rating and their future app usage intention as well as consumers' star rating to providers.

The Interplay of Variety and Processing Strategy on Calorie Estimates

Liang Shen, University of Cincinnati, USA
Fengyan Cai, Shanghai Jiao Tong University, China
Robert Wyer Jr., University of Cincinnati, USA

Given the inconsistent findings about the relationship between food variety and calorie estimates we propose the effect of variety on calorie estimation and its downstream consequences depend in part on how those items are processed. Three studies confirm the proposed interactive effect and its underlying mechanism.

How Process Ambiguity in Rewards Influences Subsequent Donations: The Role of Mental Accounting

Haijiao Shi, Tsinghua University, China
Rong Chen, Tsinghua University, China
Xiaobing Xu, Hainan University, China

We find that consumers are more likely to donate rewards earned through an ambiguous process (vs. certain process) because they place these rewards in an independent account whereas rewards obtained from a certain process were booked as deductions from payment accounts. We also test two boundary conditions for the effect.

Arbiters of Controversy: The New Role of Brands in Contemporary Society

Justin Sieow, University of Connecticut, USA
Robin A. Coulter, University of Connecticut, USA

Our research investigates the new role of brands as arbiters of social issues. Grounded in institutional theory we identity the various agents present within the brand moral landscape. We highlight the complexity present in the marketplace and explore the dynamic between brands consumers and third-party marketplace agents.

The Counterintuitive Effect of Scarcity on Food Waste

Bonnie Simpson, Western University, Canada
Rhiannon MacDonnell Mesler, University of Lethbridge, Canada
Katherine White, University of British Columbia, Canada

Across three studies we examine scarcity's effect on food waste behavior. Study 1 (a field study) examines food waste behavior in control versus scarcity-induced conditions. Study 2 explores scarcity's effect on food-related behavior in lab. Study 3 tests temporal distance as a moderator of food waste within consumers experiencing scarcity.

The Interplay Between Reminders of Resource Scarcity and Quantity-Quality Trade-offs

Tanya Singh, Concordia University, Canada
Laura Goodyear, University of Toronto, Canada
Beatriz Pereira, Iowa State University, USA
Caroline Roux, Concordia University, Canada

We examine how experiencing scarcity impacts quality-quantity trade-off decisions. Across four studies we find that people experiencing scarcity prefer higher quantity when trade-offs involves larger product quantities. Conversely people experiencing scarcity prefer higher quality when trade-offs involve smaller product quantities. We propose a theoretical framework to explain this counterintuitive result.

Social Influences on the Process of Remaining a Vegetarian

Lucie Sirieix, Montpellier SupAgro, France
Gilles Séré de lanauze, Montpellier University, France
Margot Dyen, University of West Brittany, France

If the socio-demographic profiles and motivations of vegetarians are well known (Ruby 2012) few studies have looked at the vegetarians' trajectories (Cherry 2015). The present article redresses this deficiency by examining how social influences can play a role in the ability to maintain a vegetarian diet.

Choosing Randomly Displayed Products For Joint Consumption

Jiaqi (Flora) Song, University of Liverpool, UK
Dongjin He, Hong Kong Polytechic University, China
Yuwei Jiang, Hong Kong Polytechic University, China

This research investigates the impact of the consumption context on consumers' product display preference. Two studies demonstrate that consumers have higher purchase intention for products with a randomized display in joint compared to solo consumption contexts an effect driven by the heightened need to belong in joint consumptions.

Environmental Friendliness and Product Design

Jiaqi Flora Song, University of Liverpool, UK
Boyoun Grace Chae, Hong Kong Polytechic University, China
Yuwei Jiang, Hong Kong Polytechic University, China

Two studies demonstrate that consumers judge products with a glossy rather than matte exterior design as less environmentally friendly. This effect is driven by the belief that glossier products are more processed and less natural and can lead to downstream consequences in regard to disposal behavior.

Mindful Brand: Development and Validation of a Mindful Brand Scale (MBS)

Ellen Campos Sousa, Florida International University, USA
Jayati Sinha, Florida International University, USA

This research brings a novelty contribution to the marketing and mindfulness literature proposing a conceptualization and a measurement for a mindful brand from a consumer perspective. A set of characteristics associated with mindful brand was identified and a mindful brand scale (MBS) was developed and validated.

Owning or Sharing? How Feeling Financially Constrained Decreases Participation in Access-Based Services

Emanuela Stagno, BI Norwegian Business School, Norway
Klemens Knoferle, BI Norwegian Business School, Norway
Luk Warlop, BI Norwegian Business School, Norway

Feeling financially constrained influences consumer attention and behaviors. We propose that this feeling also affects the propensity to engage in alternative consumption modes; namely access-based consumption. Two experiments test whether financially constrained consumers are less willing to participate in access-based services. The preliminary findings seem to not support our hypothesis.

The Role of Consumer Self-identities and Individual Tendencies in Food Waste

Violeta Stancu, Aarhus University, Denmark
Liisa Lähteenmäki, Aarhus University, Denmark

There are several well-established negative consequences of food waste for the environment and society. Consumers' environmental or frugal self-identities are associated with lower self-reported food waste. On the other hand people's impulsive buying tendency and disgust sensitivity are important factors that associate positively with consumer food waste.

The Role of Multiple Self-Identities in Behaviours Across the Consumption-cycle in Food and Apparel

Catalin Mihai Stancu, Aarhus University, Denmark
Alice Grønhøj, Aarhus University, Denmark
Liisa Lähteenmäki, Aarhus University, Denmark

Consumers have several self-identities which impact sustainable behaviours. Frugal self-identity was found to have stronger associations with specific categories of behaviours in the consumption-cycle. While sustainable self-identity positively predicted behaviours across the consumption-cycle frugal thrifty or trendy self-identities had both positive and negative relations to behaviours outlining potential clashes.

Embracing and Rejecting "Sparking Joy"—Understanding Japanese Consumer Responses to Marie Kondo's Original Book

Sumire Stanislawski, Tokyo International University, Japan
Shuji Ohira, Chiba University of Commerce, Japan
Kosuke Mizukoshi, Tokyo Metropolitan University, Japan

By examining responses to Marie Kondo's original book consumer reactions to a taste regime counter to mainstream consumerism are explored. Those who embraced and rejected her message were analyzed using text mining. Some internalized new meanings surrounding consumption while others rejected her legitimacy as an influencer of taste.

The Darkside of Online Social Networks: Measuring the Negative Effects of Social Influence in Online Social Networks

Sabrina Stoeckli, University of Bern, Switzerland
Fabian Bartsch, IÉSEG School of Management, Paris, France
Henry Shen, IÉSEG School of Management, Paris, France

This research conceptualizes and develops a scale of Susceptibility to Social Influence in the context of Online Social Networks such as Facebook or Instagram. Three studies find support for the conceptualization and for a valid and reliable scale. Next steps for scale development and its future application are discussed.

Table to Farm: Persuasive Messaging Influences Consumers' Willingness to Compost

Nicolette Sullivan, London School of Economics, UK
Rick Larrick, Duke University, USA
Gavan Fitzsimons, Duke University, USA

Despite consumers' concern for the environment one measure that could have a profound impact diverting waste from landfills household composting has had low adoption rates. This study investigates the effectiveness of persuasive messages on willingness to compost amongst different segments of consumers.

To Err Is Human, to Correct Is Algorithmic

Chengyao Sun, Washington University, USA
Cynthia Cryder, Washington University, USA

Across three studies and nine scenarios we observe that people believe that algorithmic errors can be corrected however they do not believe that human errors can be similarly corrected. More specifically people trust a previously erring algorithm after correction but lose confidence in an erring human even after correction.

The Effect of Tragic Artist Biography on Consumer Evaluation of Artworks

Yeonjin Sung, University of Michigan, USA
Seojin Stacey Lee, Seoul National University, South Korea
Kiwan Park, Seoul National University, South Korea

Our research proposes that providing a tragic biography of an artist enhances the perceived quality of the artwork by allowing people to appreciate the depth of expression in the artwork ("tragic artist effect"). We also show that this effect occurs independently of alternative processes—empathy effort and eudaimonic fulfillment.

Choice Overload, Does it Really Exist?: A Neurophysiological Assessment of Consumers' Responses to "the Paradox of Choice"

Anshu Suri, HEC Montreal, Canada
Sylvain Sénécal, HEC Montreal, Canada
Pierre-Majorique Léger, HEC Montreal, Canada

We contribute to the debate of choice overload by concluding that the psychophysiological measures collected through an eye-tracker and face-reader indicate that consumers not only experience an increased level in cognitive load when selecting from a large set of options but also experience negative emotions in the decision-making process.

What do You Mean by Love? Understanding Brand Love Experiences

Bruno Sutil, Sao Paulo School of Business Administration FGV-EAESP, Brazil
Delane Botelho, EAESP-FGV, Brazil
Diógenes Bido, Machenzie, Brazil

Just as there are types of interpersonal love there might be types or experiences of brand love. We add to the literature by developing a multidimensional differentiation scale based on the reasons people love a brand to typify their experiences. Four factors emerged: values identity emotional attachment and functionality.

Packaged or Unpackaged? How Displaying a Product With Vs. Without Packaging Influences Product Evaluations

Courtney Szocs, Louisiana State University, USA
Sara Williamson, SUNY Old Westbury, USA
Adam Mills, Loyola University New Orleans, USA

Managers display products with and without packaging in stores advertisements and online seemingly arbitrarily. Would displaying a product encapsulated in a package as opposed to unpackaged influence consumers' product evaluations? If so why? Three experimental studies address these research questions and contribute to the literature on packaging and display effects.

You Are Who You Follow: The Impact Of Fitness Influencers On Food Consumption And Identity

Amandeep Takhar, De Montfort University, Leicester, UK
Thomas Magede, De Montfort University, UK
Jennifer Walker, De Montfort University, UK

This paper builds on prior consumer research relating to food and identity construction. By looking at how online fitness influencers impact the food consumption and identity of young millennials in the U.K. it is evident that participants were influenced by online fitness influencers in negotiating their self and collective identity.

To Cleanse or to Enjoy? The Effect of Affectively Tagged Windfall Time on Consumption Choice

Arash Talebi, EDHEC Business School, France
Easa Sahabeh, University of South-Eastern Norway, Norway

We investigate how consumption changes when people gain a windfall block of time with affective tags (positive vs. negative). We find an asymmetrical effect: negative windfall time encourages hedonic (vs. utilitarian) activities supporting a mood regulation account. However positive windfall time does not seem to influence the consumption pattern.

Eco-friendly Versus Polyester Gucci Handbags: The Effect of Matching Green Claims and Temporal Frame on Product Evaluation of Self-enhancement Brands

Nabanita Talukdar, Hult International Business School, USA
Shubin Lance Yu, Peking University, China
Esterina Nervino, Universita' degli Studi di Modena e Reggio Emilia, Italy

We examine how message-orientations of green claims using temporal construal affects consumers' evaluation towards self-enhancement brands' sustainable products. Through a survey experiment we confirm that a high construal level and high temporal distance green message improved the product evaluation through higher processing fluency for high green orientation individuals.

Indulgent Consumption Signals Interpersonal Warmth

Qing Tang, Nanyang Technological University, Singapore
Kuangjie Zhang, Nanyang Technological University, Singapore
Xun (Irene) Huang, Nanyang Technological University, Singapore

Three studies demonstrated that showcasing indulgent consumption can have a positive signaling function on one's perceived warmth. Therefore consumers also choose indulgent food items when they have the motivation to appear warm in front of others. These findings add to the literature of indulgent consumption and consumer signaling behavior.

Consumption Opportunity and The Consideration of Consumption-Opportunity Cost

Tao Tao, Hong Kong Baptist University, China
Ran Li, Chinese University of Hong Kong, China

For the first time the authors propose the concept of consumption opportunity and identify it as a scarce exclusive and valuable resource to a consumer. We further demonstrated that when making purchase decisions the consideration of the cost of consumption opportunity could induce consumers to choose the higher-quality smaller-amount option.

I Revenge For Others I Do Not Know: The Role Of Intercultural Competence In Moderating Customer Revenge To Service Failure Occurred To Adjacent Customer

Mohamed Sobhy Temerak, Kent Business School, UK
Ruby Zhang, University of Reading, UK
Cristiana Lages, University of Reading, UK

We examine the service failure from the observers' perspective and how it influences their patronage and revenge intentions. Results from a 2x2 experiment revealed observer's interpretation of service failure was largely influenced by their intercultural competence. They are more sensitive to discrimination and courageous to retaliate with higher intercultural intelligence.

Recycled Plastic on the Upswing: The Effect of Packaging Material on Perceived Healthiness and Purchase Intention

Joyce De Temmerman, Ghent University, Belgium
Nico Heuvinck, IESEG School of Management, France
Hendrik Slabbinck, Ghent University, Belgium
Iris Vermeir, Ghent University, Belgium

This research explores the impact of recycled plastic on perceived healthiness and purchase intention. We find that consumers tend to perceive products in recycled (vs. regular) plastic packaging as healthier and thereby are more likely to purchase products in recycled plastic packaging.

The Impact of Logo Typeface Obliqueness on Product Efficacy Perception

Lefa Teng, Jiangnan University, China
Jie Wang, The Hong Kong Polytechnic University, China
Yuwei Jiang, Hong Kong Polytechic University, China

This research shows that the obliqueness of logo typefaces influences consumers' efficacy judgment of products offered by the company. Compared with non-oblique typeface logos oblique typeface logos generate the perception of quicker product effect. This effect is attenuated when the typeface is heavy.

Singled Out For Public Praise: How Scarcity Boosts Demand For Public Recognition

Carina Thuerridl, University of Amsterdam, The Netherlands
Bernadette Kamleitner, Vienna University of Economics and Business, Austria

Public recognition is more valuable but less popular than private recognition in crowdfunding and charitable giving. We show that limiting availability of recognition increases preferences for public but not for private recognition. Singling consumers out for public raise may thus be a simple cost-effective strategy to increase monetary contributions.

Measuring the Dissemination of a Subculture Through Consumption. Investigating the Geek Culture Case.

Alexandre Tiercelin, Université de Reims, France
Marion Garnier, Grenoble Ecole de Management - Univ Grenoble Alpes ComUE, France
Arnaud Delannoy, Ecole de Management de Normandie, Laboratoire Métis, France

This research proposes to understand better the dissemination of a subculture within mass culture by measuring belonging and consumption in the geek culture case. Results confirm subcultural traits and practices and progressive dissemination showing the quantifiable reality of a subculture and the possibility of measuring its spreading.

Social Atmospheres: Priming, Aligning and Defining Shared Experiences of Place

Hill Tim, University of Bath, UK
Robin Canniford, University of Melbourne, Australia

Atmospheres are the moods associated with places. Current marketing research explains that firms create atmospheres by controlling material features of servicescapes. Through an ethnographic investigation of English Premier League soccer however we show that atmospheres are also social experiences that define the mood of place through consumers' embodied performances.

When Does Actual Versus Ideal Self-Congruence Matter? Moderating Effects of Construal-Level on Brand Attitudes

Taku Togawa, Sophia University, Japan
Kazuyo Ando, Chiba University of Commerce, Japan

Drawing on construal level theory this study found that consumers with low-level construal tended to focus on actual self-congruence (ASC) with a brand and prefer brands with high ASC levels. Contrarily consumers with high-level construal focused on ideal self-congruence (ISC) and indicated positive attitudes toward brands with high ISC.

If I Think I Can I Can. Can't I? How Social Mobility Beliefs Influence Your Financial Behavior

Patricia Torres, Florida International University, USA
Alexandra Aguirre-Rodriguez, Florida International University, USA

This research explores how social mobility expectations influence one's financial behavior intentions. Across three studies this research reveals that social mobility expectations impacts behavior intentions; financial self-efficacy mediates whereas financial literacy moderates this relationship. Findings are discussed considering their implications for research on expectancy financial goal pursuit and decision making.

Product Consecration and Market Expansion: The Case of Vitamin D

Lez Ecima Trujillo Torres, University of Illinois at Chicago, USA
Alev Kuruoglu, University of Southern Denmark, Denmark
Hazal Celik, University College Dublin, Ireland

Our study investigates the relationship between product consecration and market creation and expansion. Our findings indicate that the global Vitamin D market has expanded from 1996 to 2019 through a process of contested product consecration that involves the cultural and scientific consecration and commercial innovation of Vitamin D over time.

How Customer Identification Can Lead to Dysfunctional Behavior

Huy Quoc Tran, University of South-Eastern Norway, Norway
Marit Engeset, University of South-Eastern Norway
Luk Warlop, BI Norwegian Business School, Norway

Recent research explores the role of social identity in consumer contexts. In this study we document the negative effect of customer identification on impoliteness. We found that entitlement mediated this relationship and that this effect was conditional on self-control. We also plan to investigate other mechanisms underlying this phenomenon.

The Relationship Between Self-Construal and Neural Processes Associated With Conforming to Consumer-to-Consumer Recommendations

Arina Tveleneva, University of Wisconsin - Madison, USA
Xinyi Wang, University of Wisconsin - Madison, USA
Matthew Brook O'Donnell, University of Pennsylvania, USA
Emily B Falk, University of Pennsylvania, USA
Christopher N. Cascio, University of Wisconsin - Madison, USA

The results suggest that those who have a stronger interdependent view of the self compared to a weaker interdependent view of the self are potentially more likely to conform to social feedback when their opinions misalign with others. Interdependent self is also significantly associated with conflict monitoring and mentalizing.

When Does Diversity Help or Backfire? Impact of Cultural Diversity on Brand Perception

Esther Uduehi, University of Pennsylvania, USA
Julian K Saint Clair, Loyola Marymount University, USA
Mitchell Hamilton, Loyola Marymount University, USA
Americus Reed, University of Pennsylvania, USA

This paper is the first to show how diversity as a brand characteristic influences consumer perceptions of the brand's authenticity. We find that majority-focused brands embracing diversity increases in authenticity while a minority-focused brand embracing diversity may lose authenticity. This loss of authenticity is particularly felt by minority consumers.

Console War (and Peace?): Analysing Cross-Community Interactions in Gaming Discussion Forums on Reddit

Denis Utochkin, Norwegian School of Economics and Business Administration, Norway

In this paper I employ a mix of netnography machine learning and network analysis to examine 12 gaming communities on Reddit. Treating each individual community as inseparable from its immediate context I explore how multiple loyalties and identities are managed by consumers engaging in conversations in a multi-community context.

In Defense of Happy Hedonism: Moving Beyond Materialism and Its Negative Impact on Well-Being

Rita Coelho do Vale, Catolica Lisbon School of Business and Economics, Portugal
Rik Pieters, Tilburg University, The Netherlands

This research studies happy hedonism analyzing its relationship with consumer well-being. It explores the idea that pursuing pleasure through the mere consumption of experiences and objects might positively contribute to consumer well-being. Three laboratory studies were conducted to explore the happy hedonism phenomenon and to distinguishing it from consumer materialism.

The Meaning and Transformation of Taste Vocabulary

Rohan Venkatraman, University of Melbourne, Australia
Anna E Hartman, University of Melbourne, Australia
Ilkka Ojansivu, University of Melbourne, Australia
Erica Coslor, University of Melbourne, Australia

We conceptualize the vocabulary used in tasting notes as part of taste regimes. Through qualitative content analysis of whiskey tasting descriptions we found that consumers transformed institutionalised vocabularies to convey variable meanings extending our understanding of adaptation of the language of a taste regime.

"Luxurious and Responsible? Consumer Perceptions of Corporate Social Responsibility Efforts by Luxury Versus Mass-market Brands"

Marlene Vock, Amsterdam Business School, University of Amsterdam, The Netherlands

This research contributes to the inconclusive debate in the field of sustainable luxury on whether the adoption of Corporate Social Responsibility practices is beneficial for luxury brands or backfires a dilemma known as the 'CSR-Luxury paradox'. Different types of CSR practices might help to explain inconsistencies in previous findings.

The Effectiveness Of Online Recommendations For Private Labels Versus National Brands

Barbara Kobuszewski Volles, Ghent University, Belgium
Anneleen Van Kerckhove, Ghent University, Belgium
Maggie Geuens, Ghent University, Belgium

This research reveals that consumers when recommended with products online are more inclined to switch to private labels compared to national brands. We present two studies demonstrating this effect and propose that it occurs because recommendations serve more as a signal of quality for private labels than for national brands.

Magically Relieved or Taking Control? The Influence of Messages Aimed at Debt Distressed Consumers

Rory Waisman, University of Alberta, Canada
Mohammed El Hazzouri, Mount Royal University, Canada
Kelley Main, University of Manitoba, Canada
Gerald Häubl, University of Alberta, Canada

Marketing messages used by the debt-remedy industry differentially impact consumers' financial behaviors depending on the nature of the appeal and consumers' level of debt. Appeals that focus on debt-relief can backfire whereas messages about taking control of debt have distinct marketing and public-policy advantages.

What a Cute Lemon! The Effect of Whimsical Cuteness on Willingness-To-Pay For Imperfect Produce

Darlene Walsh, Concordia University, Canada
Camille Darriet, Concordia University, Canada

The goal of our research is to find a way to encourage consumers to purchase imperfect produce. As a first-step in achieving this goal we demonstrate that priming whimsical cuteness (i.e. adding "googly eyes" to imperfect produce) can increase consumers' willing-to-pay for imperfect produce. Future research ideas are also discussed.

A Discount Added is an Obstacle Created: The Impact of
Multiple Discounts on Consumer Decisions

Xin Wang, Nanjing University, China
Chunqu Xiao, Nanjing University, China
Hong Zhu, Nanjing University, China

Based on numerical cognition we conducted four experiments to explore the effect of multiple discounts and found that consumers preferred a single discount to multiple discounts. Cognitive fluency and perceived sincerity sequentially mediated the effect. Consumers concern for sales moderated the effect.

Don't Reveal It Yet! How Goal Disclosure on Social Media
Impedes Goal Revision and Commitment

Liangyan Wang, Shanghai Jiao Tong University, China
Zhining Yu, Shanghai Jiaotong University, China

People commonly disclose their personal goals publicly on social media platforms based on the conventional belief that disclosure increases goal commitment and improves performance. Results from two experimental studies suggest that this conventional belief only applies to easy goals but not for difficult goals.

Healthy-Angular, Unhealthy-Circular: The Effect of Shape on Consumers Health Choice

Jie Wang, Renmin University of China, China
Jing Jiang, Renmin University of China, China
Xiaodan Zhang, Peking University, China

This paper explored the matching effect between food healthiness and shape. We demonstrated that angular (vs. circular) shape increases consumers' preference for healthy options which is because a "healthy-angular unhealthy-circular" match could enhance consumers ease of processing and subsequently influences consumers choice.

Love or Luck? The Effect of Self-Referencing Narratives
on Used Product Consumption Behaviors

Yan Wang, Renmin, University of China, China
Jing Jiang, Renmin, University of China, China

This research investigates the impact of selling narratives created by sellers on buyers' purchase behaviors in the context of second-hand market. Across three experiments we find that self-focused (love-oriented) narratives drive low purchase intention but high willingness-to-pay whereas product-focused (luck-oriented) narrative generates both high purchase intention and willingness-to-pay.

Moderate Product-gift Complementarity Eliminates
Devaluation Effect in Free-Gift-With-Purchase Offers

Yusu Wang, Texas A&M University, USA
Nicholas J. Olson, Texas A&M University, USA

While past literature demonstrated a devaluation effect of the focal product in free-gift-with-purchase offers this research provides evidence supporting our argument that a moderate (vs. high) complementarity between the focal product and the free gift counters this devaluation tendency. Underlying mechanism is also accessed.

Red in the Environment Increases Preference For Competent Brands

Yansu Wang, Renmin University of China, China
Jun Pang, Renmin University of China, China
Lingyun Qiu, Peking University, China

Across four studies this research demonstrates that exposure to red cues in the environment increases consumer preference for competent but not warm brands. This effect is mediated by competitive orientation and is attenuated when consumers purchase products for others than for themselves.

Robot Anthropomorphism in the Workplace and Employees' Job Insecurity

Xue Wang, University of Hong Kong, China
Sara Kim, University of Hong Kong, China
Minki Kim, Korea Advanced Institute of Science and Technology, South Korea

In four studies we show that robot anthropomorphism in the workplace enhances employees' job insecurity due to an increase in social comparison. The findings contribute to the literature on robot anthropomorphism and job insecurity and provides practical implications to organizations in terms of how to design robots.

Signs Telling Me to Do What Others Do: The Effect of Exposure to Public Rules on Conformity

Xiaoran Wang, Renmin University of China, China
Jing Jiang, Renmin University of China, China
Yan Wang, Renmin University of China, China

This research takes a novel perspective by proposing an exposure effect of public rules on conformity. Across three experiments we find that in public consumption context exposure to public rules reminds consumers of the presence of others which increases their public self-awareness and hence the preference for majority-endorsed products.

The Dark Side of Precision: Numerical Information and Consumers' Unhealthy Choices

Jie Wang, Renmin University of China, China
Jing Jiang, Renmin University of China, China
Xiadan Zhang, Renmin University of China, China

The research explores how numerical precision affects consumers' health behaviors and how illusory control functions as an underlying mechanism. Across three studies we find that when the numerical information is expressed in a precise (vs. imprecise) format it tends to induce consumers' illusory control which subsequently increases risky health behaviors.

Visual Simplicity Signals Constructive Brand Authenticity

Yan Wang, Renmin University of China, China
Jing Jiang, Renmin University of China, China
Xiushuang Gong, Jiangnan University, China

Constructive brand authenticity is subjective and can be contextually determined. This research examines the consumer lay belief about the relationship between aesthetics and constructive brand authenticity. Across three experiments we find that consumers perceive a brand as more authentic when it is with visually simple (vs. complex) designs or displays.

The Case-Gender Congruity Effect: Consumer Choices
For Upper Versus Lowercase Brand Names

Na Wen, California State University Northridge, USA

A series of experiments find that the letter case of brand names (upper- vs. lower-case) affects consumer choices but that these effects depend on congruity between brand case and product gender. This research advances understanding of how seemingly subtle brand name characteristics affect gender perceptions and consumer behavior.

The Closer, The Worst: The Impact Of Social Distance to a Dissociative Group And
Consumer Choices

Na Wen, California State University Northridge, USA

Two experiments test the idea that consumers are less likely to buy a product if it is associated with a near (vs. distant) dissociative group—which is mediated by construal-level mindsets and moderated by group conformity. This work advances understanding of how different types of dissociative groups affect consumer behavior.

You Are More Patient When You Experienced More:
The Impact of Memory Markers on Consumers' Decisions in the Future

Yingting Wen, ESSEC Business School, France
Ayse Onculer, ESSEC Business School, France

This research investigates how retrospective time progression can influence consumers' decisions in the upcoming future. By using different numbers of memory markers two studies show that people experience different retrospective time progression over the same duration and they have different levels of patience on waiting and intertemporal choice.

The Value of Personal Information - Consumers' Valuations
and Preferences For Personal Data And Privacy

Claudia Wenzel, University of Zurich, Switzerland
René Algesheimer, University of Zurich, Switzerland

Data is the oil of our age. Despite its importance research is lacking consistent data value estimations. By combining current valuation methods this research offers a better estimate of the value consumers attribute to their data and by drawing on reference price theory minimizes the gap between different valuation methods.

The Unit-Size Effect Revised: A Win-Win Solution For Reducing Both Waist and Waste

Amber Werkman, University of Groningen, The Netherlands
Jenny van Doorn, University of Groningen, The Netherlands
Koert Van Ittersum, University of Groningen, The Netherlands

People consume less when food is presented in multiple smaller units compared to a few larger units however food waste will increase accordingly. We propose that this so-called unit-size effect is even more impactful during food selection when people select quantities themselves based on unportioned rather than portioned food.

When Do You Want This? How Delivery-scheduling
Impacts Motivation Among Online Shoppers

Sara Williamson, SUNY Old Westbury, USA
Courtney Szocs, Louisiana State University, USA

Online purchases require consumers to complete multiple sub-tasks such as product selection delivery-scheduling and payment. In this project we investigate how the sequence of these sub tasks can influence motivation in the purchase context. Specifically we investigate how scheduling delivery before making product choices can exhibit motivating effects.

Are Co-branding Products More Attractive? Understanding the Role of Consumer Innovativeness and Self-construal

Sihan Wu, Tsinghua University, China
Maggie Wenjing Liu, Tsinghua University, China

In this study we intend to develop and test a model considering that the consumers prefer co-branding product via consumer innovativeness. We further examined the moderation role of self-construal such that positive effect is stronger when individual is in a predominantly interdependent.

Effects of Masculinity and Femininity Incongruence on Consumer Responses to Brands

Xiu Wu, Concordia University, Canada
Bianca Grohmann, Concordia University, Canada

This research examines the effect of incongruence between consumers' gender identity and brand gender. Two studies find a significant main and interaction effect of masculinity and femininity incongruence on consumer-brand boundary—the perceived psychological distance between a consumer and a brand—and affective cognitive and relational brand responses.

Self-Other Differences in the Perceived Efficacy of Self-Enhancement Products

Kaiyang Wu, University of Wisconsin - Madison, USA
Evan Polman, University of Wisconsin - Madison, USA

We tested if judgments of self-enhancement products' efficacy differ according to whether a product user is the self or someone else. In two pre-registered studies we found that people believe that self-enhancement products will be more efficacious for others than for themselves and that usership moderates this self-other difference.

Maximizing What? The Effect of Maximizing Mindset on the Evaluation of Product Bundles

Lan Xia, Bentley University, USA
Nada Nasr Bechwati, Bentley University, USA

Do maximizers value product bundles higher than satisficers? We propose that it depends on whether maximizers try to maximize the value of the individual products or that of the entire bundle. The focus of the maximization is influenced by the presence of a discount. Results from three studies are presented.

Robots Don't Discriminate: Financial Resources, Age, and Preference of AI in Service

Lan Xia, Bentley University, USA

Do consumers prefer robots or humans in service contexts? Our studies show that controlling for self-efficacy and AI performance preferences for AI vary by customer characteristics such that older consumers of lower (vs. higher) financial status tend to prefer robots more due to the expected service they obtain.

Penny Wise and Pound Foolish- The Interaction Between Ease of Comparison and Cognitive Effort And Its' Impact On Preference And Choice Change

Na Xiao, Laurentian University, Canada

It is proposed that the interaction between ease of comparison and cognitive effort determines the importance of attributes. It is demonstrated that when cognitive effort to process information about choice-options is high (vs. low) consumers will give weight to ease-to-compare attributes in comparison therefore preference and choice change.

The Effect of Handwritten Typefaces on Consumer Evaluation

Chunqu Xiao, Nanjing University, China
Xin Wang, Nanjing University, China
Hejin Fang, Nanjing University, China
Haoyuan Wang, New York Statement University at Buffalo, USA
Hong Zhu, Nanjing University, China

Handwritten typefaces strengthen the impact of online reviews. Across three studies the current research found that handwritten typefaces led higher evaluation on the perceived sincerity of reviewers thus benefitted positively reviewed products. This effect diminished when the reviews were negative or consumers had greater domain knowledge.

How Can I Help When I Feel Rejected? The Interplay of Social Exclusion, Social Identity, and Prosocial Behavior

Xuan Xie, University of California Irvine, USA
Loraine Lau-Gesk, University of California Irvine, USA
Amber Gaffney, Humboldt State University, USA

This research explores prosocial behavior through social exclusion and social identity lens. Results suggested that when feeling rejected prototypical members displayed lower willingness-to-help whereas peripheral members have higher willingness-to-help. When feeling ignored such effect was attenuated for both peripherals and prototypicals. Prosocial behavior alleviates some negative consequences of social exclusion.

Let's Get Serious About Play: A Hedonic Vs. Eudaimonic Investigation of Goal-Based Mixed Affective Experiences

Xuan Xie, University of California Irvine, USA
Sayantani Mukherjee, Central Washington University, USA
Loraine Lau-Gesk, University of California Irvine, USA

This research investigates factors of goal-based mixed play experiences. Perceived effort corresponds positively to consumer judgment and perceived fun of the mixed (vs. pure positive) play experiences. Outcome-oriented thinking encourages a eudaimonic lens unaltered by cognitive load while process-oriented thinking shifts to a hedonic lens moderated by cognitive load.

Performance Diversity and Team Performance Expectations

Vivian (Jieru) Xie, Virginia Tech, USA
Rajesh Bagchi, Virginia Tech, USA

We investigate the effects of performance diversity on expectations of team performance. We find that perceivers expect less diverse teams to perform better. We demonstrate the underlying process and delineate one approach via which these expectations could be reversed.

The Impact of Corporate Environmental Transgressions on Consumer Negative Reactions: The Role of Political Ideology

Chunyan Xie, Western Norway University of Applied Sciences, Norway
Richard P. Bagozzi, University of Michigan, USA

We experimentally test a psychological mechanism underlying consumer negative reactions toward the firm as a function of perception of corporate environmental transgressions. Results showed that social disgust and attitude mediates the relationship between perceived corporate environmental transgressions and consumer reactions. Further political ideology moderates effects of transgressions on social disgust.

The Impact of Financial Perception on Agent Preference of Intelligent Assistant

Chunya Xie, Renmin University of China, China
En-Chung Chang, Renmin University of China, China

Four experiments indicate that financial affluent reduces participants' preference for AI provider of intelligent assistant. Financial affluent leads to a high sense of entitlement which reduces AI preference. Assistant type moderates the effect. When the intelligent assistant is not instructional the effect of financial perception on agent preference reverses.

Why People Are Crazy For Chewing? An Exploratory Study of the Effect of Chewing on Mental Construal

jialiang xu, University of Manitoba, Canada
Fang Wan, University of Manitoba, Canada
Norbert Schwarz, University of Southern California, USA
Wenqing Wu, University of Manitoba, Canada

Oral-sensory information different from other sensory information can be received by different ways (chewing/ swallowing/ drinking). This perspective has not studied by previous research. Our work examines that chewing (vs swallowing) activates people's concrete mental construal which may help consumers focus on the current moment and appreciate experience of eating.

Need to Evaluate as a Predictor of Sharing and Seeking Online Recommendations

Mengran Xu, Ohio State University, USA
Rebecca Walker Reczek, Ohio State University, USA
Richard Petty, Ohio State University, USA

In this research we characterize who is likely to engage in sharing and seeking online word of mouth as a function of their need to evaluate an individual difference measure consisting of two motives the need to express attitudes and the need to acquire information in order to have attitudes.

Swear by My Family: Explore Consumer Attitudes Toward Brands Named After People

Fei (Katie) Xu, Hong Kong Polytechic University, China
Yuwei Jiang, Hong Kong Polytechic University, China

Consumers are more interested to purchase from brands which are named after people's last names than from brands containing people's first names. This effect is found to be mediated by brand trust and moderated by consumers' domain-specific knowledge.

No-Modification Allowed! Saying No to a Consumer's Modification Request Can Increase Product Evaluation

Amanda Pruski Yamim, Grenoble Ecole de Management, France
Adilson Borges, NEOMA Business School, France

Through three studies we show that the presence of non-modification policies can increase tastiness evaluation and willingness to pay because they make consumers think the chef put more effort into the food creation. The positive effect of non-compliance is contingent on consumers' initial beliefs that the chef has high expertise.

Before or After? The Order Effect of Donors' Personally Identifiable Information on Donation Amount

Li Yan, University of Technology Sydney, Australia
Xue Wang, University of Hong Kong, China
Minjung Koo, Sungkyunkwan University, South Korea
Hean Tat Keh, Monash University, Australia

Across five studies we found that individuals donate a higher amount if their personally identifiable information is requested before they indicate the donation amount. This finding makes important theoretical contributions and offer practical implications for charitable organizations by identifying a simple "nudge" that encourages donors to give higher amounts.

Why Should I Improve Myself? Perceived Economic Mobility and Consumer's Interest in Self-Improvement Products

Chun-Ming Yang, Ming Chuan University, Taiwan

Across three studies we provide convergent evidence suggesting that the constraints perceived by consumers increased when they had a low perceived economic mobility (PEM) which in turn influenced their interests in self-improvement products. This study contributes to the literature of PEM by extending its downstream consequences.

Contestations of Entrepreneurship and Marketing in Creative Maker Tribes

Amy Yau, Cardiff University, UK

The ethnographic study explores the narratives of becoming and being a creative maker entrepreneur and how the makers imbue themselves as brands to start and develop their business. It explores how makers create offline and online commercial communities and tribes with other makers and consumers in the mass-market dominated marketplace.

Serif For the Conservatives: The Effects of Typeface on The Persuasiveness of Political Campaign

Jiwon Yi, Hongik University, South Korea
Nara Youn, Hongik University, South Korea

This research investigated the effect of congruence between serif (vs. sans-serif) typeface and the conservative (vs. liberal) political ideology on the campaign effectiveness. Through two experiments we provided a support for the positive effect of serif typefaces on political campaign evaluation of the conservatives and unveiled underlying psychological process.

Immediate Incentives in Prosocial Contexts

Y. Rin Yoon, Cornell University, USA
Kaitlin Woolley, Cornell University, USA

Prior research provides mixed evidence for the effect of financial incentives on prosocial behavior. Three studies (N = 982) fill this gap. We find that immediate (vs. delayed) incentives increase prosocial behavior when prosocial motivation is low but that this effect attenuates when prosocial motivation is high.

Ethnic Identity and Patience in Intertemporal Monetary Decisions

Jiaqi Yu, University of Chicago, USA
Oleg Urminsky, University of Chicago, USA
Stephanie Chen, London Business School, UK

Ethnic identity importance predicts consumers' patience in making intertemporal monetary decisions. Two studies based on evidence from Asians and Caucasians in the U.S. and the U.K. conclude that people who consider their ethnic identity more important value the present over the future and make more impatient time discounting choices.

Multiple Social Identities Increase Torelence of Unethical Behaviors

Irina Y. Yu, Chinese University of Hong Kong, China
Li Huang, Hofstra University, USA
Morgan X. Yang, The Hang Seng University of Hong Kong, China

Consumers possess various social identities and generally show an identity congurent behavior when an identity is momentarily salient. What will happen when multiple identities are salient? We find that the activation of multiple social identities enhances consumers' moral relativism belief and increases their tolerance of unethical/immoral behaviors.

Refunded Money is More Likely to be Spent

Tianjiao Yu, Washington University in St Louis, USA
Cynthia Cryder, Washington University, USA
Robyn LeBoeuf, Washington University, USA

We test how consumers' willingness to spend depends on the transaction history of the money they have available. Specifically we find that money refunded from previous purchases is more likely to be spent than non-refunded money. This research extends prior findings about mental accounting and fungibility.

Sustainability as the Guilt-Relief Pill For Luxury Purchases

Shubin Lance Yu, Peking University, China
Nabanita Talukdar, Hult International Business School, USA
Sangeeta Trott, ITM-SIA Business School, India

Sustainability claims are not widely used by luxury brands because sustainability is considered incompatible with luxury. The results of two experimental studies suggest that for luxury products with a high price a sustainability claim can reduce the anticipated guilt of purchases which in turn leads to higher purchase intention.

Is First the Worst? Understanding Consumers' Tendency to Postpone the Better Outcome

Ozge Yucel-Aybat, Pennsylvania State University Harrisburg, USA
Marina Carnevale, Fordham University, USA

This research investigates the tendency of consumers to postpone their preferred item to the end. Two studies demonstrate that long-term (vs. short-term) oriented consumers are more likely to save their favorite product for last because they value improvements over time more.

Boosting the Resale Value: Effects of Expired Warranty and Repair Conditions of Secondhand Products

Ulku Yuksel, University of Sydney, Australia
Nguyen T Thai, University of Wollongong, Australia
Vince Mitchell, University of Sydney, Australia

Secondhand retailers rarely communicate negative information such as manufacturer warranties being expired or secondhand products being repaired. We show that consumers associate secondhand products with expired warranties with higher (lower) resale values than those with no warranties when these products have been repaired (never been repaired) and explain the process.

Repetition Or No Repetition? Effects Of Repetitive Numbers On Bundling Promotion

Jintao Zhang, Drexel University, USA
Hongjun Ye, Drexel University, USA
Siddharth Bhatt, Pennsylvania State University, Harrisburg, USA
Haeyoung Jeong, Drexel University, USA
Rajneesh Suri, Drexel University, USA

Consumers are constantly making decisions on numbers along with their journey of consumption. Our study examines the effect of repetitive numbers on bundling price (i.e. 2 for $2.22 vs. 2 for $$2.12) that consumers have higher intentions to purchase bundling products with repetitive number prices.

Save Time For Better Life! The Effect Of Time Saving On Quality Perception

Jintao Zhang, Drexel University, USA
Hongjun Ye, Drexel University, USA
Siddharth Bhatt, Pennsylvania State University, Harrisburg, USA
Haeyoung Jeong, Drexel University, USA
Rajneesh Suri, Drexel University, USA

Consumers form their perceptions of quality with different signals. This study examines a novel signal of quality – time – as consumers would associate time saved when shopping with the perceptions of quality of the products the more time consumers save the better quality of the products they perceive.

Food Label Halos and Consumer Perceptions of Food Healthfulness

Yijun Zhao, Renmin University of China, China

This paper demonstrates that label halos bias dieters' estimates about the healthfulness of vice foods containing such labels. Dieters tend to draw a directional conclusion about food healthfulness to mediate the guilt associated with consuming indulgent food. Providing corrective information to dieters can mitigate these effects.

The Impact of Social Crowding on Cross Sensory Products—— Based on the Brand Alliance Perspective

Yijun Zhao, Renmin University of China, China

This research defines the cross sensory product (CSP) which refers to the product with different sensory attributes provided by two or more co-brands in brand alliance and suggest that feeling crowded makes consumers need more arousal which in turn makes them prefer cross sensory product.

Time, Endowment Effect, and Happiness

Wenxue Zheng, Cornell University, USA
Ashley V. Whillans, Harvard Business School, USA

This project demonstrates an endowment effect of time such that people expect higher compensation for time losses than for identical time gains. We also find initial evidence for a link between this endowment effect and happiness.

Where Does My Time Go?! The Trap of Segregated Resources

Wenxue Zheng, Cornell University, USA
David R. Just, Cornell University, USA
Jura Liaukonyte, Cornell University, USA

This project showed that time follows reversed arithmetic rules of mental accounting. Through hypothetical questionnaires that measured WTP WTA willingness to wait level of irritation we find that aggregated (vs. segregated) time was preferred and participants have a higher WTA and WTP for the aggregated time losses and time gains.

How Crowdedness Enhances Consumers' Healthy Lifestyle

Wanyi Zheng, University of Hong Kong, China
He (Michael) Jia, University of Hong Kong, China
Echo Wen Wan, University of Hong Kong, China

Social crowdedness is ubiquitous and has important implications for marketers. This research demonstrates that in a crowded environment consumers are more likely to engage in health-improving consumption which can boost their immune system and thus make themselves less vulnerable to contagious diseases that become more salient under crowdedness.

A Helping Hand: How Online and In-store Shopping Environments Change Information Search For Haptic Products

Lingrui Zhou, Duke University, USA
Nicolette Sullivan, London School of Economics, UK
Gavan Fitzsimons, Duke University, USA

What information do consumers search for when shopping for haptic products? The current research uses both behavioral data and computer mouse tracking analysis to examine how consumers search for and weigh various attributes across different shopping environments (online in-store or a combination of both).

AI is Better When I'm Sure: The Influence of Certainty Level of Consumer Needs on Their Willingness to Use AI Customer Service

Yimin Zhu, Sun Yat-sen University, China
Yingyue Liu, Sun Yat-sen University, China
Xiang Fang, Oklahoma State University, USA

This paper explores the effect of certainty level of consumer needs on their willingness to use AI customer service as well as its moderating effect and mediating effect. The findings make important theoretical contributions to AI research in the service context and provide useful guidelines for companies to use AI.

Device, Fast and Slow: How Devices Influence Consumer Decisions

Shuqi Zhu, University of Warwick, UK
Sarah Wei, University of Warwick, UK
John M. Rudd, University of Warwick, UK
Yansong Hu, University of Warwick, UK

How the devices (mobile versus stationary) consumers use influence how they approach a purchase decision? We argue that consumers are less likely to employ deliberative processing when they use mobile devices compared to when they use stationary devices. Evidence from three studies supports this theorizing.

Can Handwritten-appearing Typefaces Boost the Effectiveness of Social Norms? An Experimental Investigation on Sustainable Consumer Behavior

Vita Eva Maria Zimmermann-Janssen, Heinrich Heine University Düsseldorf, Germany
Carina Sophia Hütte, Heinrich Heine University Düsseldorf, Germany
Julia Kluger, Heinrich Heine University Düsseldorf, Germany

Descriptive normative information (DNI) about a majority's sustainable behavior proved to be especially persuasive when others are present. As handwriting can evoke human presence perceptions we tested experimentally whether DNI's influence on sustainable behavior can be increased if presented in a handwritten-appearing (vs. machine-written) typeface under factual social absence.

The More, the Worse – When the Communication of High Majority Sizes Decreases the Impact of Descriptive Normative Information on Consumers' Willingness to Donate

Vita Eva Maria Zimmermann-Janssen, Heinrich Heine University Düsseldorf, Germany

The ability of descriptive normative information (DNI) about majorities' charitable behavior to motivate donations is currently discussed in reaction to diverging findings. Drawing on altruism models and impact philanthropy we propose to reconsider crowding-out predictions and provide experimental evidence for DNI's diminishing persuasiveness at high (vs. low) majority sizes communicated.

Time of Day and Construal Level Interact to Influence Engagement With Information

Ozum Zor, Rutgers University, USA
Kihyun Hannah Kim, Rutgers University, USA
Ashwani Monga, Rutgers University, USA

Social media messages that match with a high-level construal engage consumers more in the morning whereas those that match a low-level construal engage consumers more in the evening. Empirical evidence comes from an experiment and a Twitter dataset. These findings have implications for both theory and practice.

Film Festival 2020

"Coworkers Lifestyle"
Máté Bencze, Corvinus University of Budapest, Hungary

Outside In: When Social Dynamics Infiltrate the Extraordinary Experience of the Fair
Baptiste Cleret, University of Rouen, France
Boris Collet, University of Rouen Normandy, France
Cerise Thorel, University of Rouen Normandy, France

Stanislavskij's Reflexive Videography to Explore the Representational World of the Researcher
Michele Corengia, Università della Svizzera italiana, Switzerland

Airbnb Butterfly Effect: How Consumption Transformations Reverberate on Social and Cityscapes
Marlon Dalmoro, University of Vale do Taquari, Brazil
Diego Costa Pinto, Nova IMS - Information Management School, Portugal
Celso Zanini, Nova IMS - Information Management School, Portugal

The Disruptive 'Other'? Exploring Human-Animal Relations in Tourism
Minni Haanpää, University of Lapland, Finland
Tarja Salmela, University of Lapland, Finland
José-Carlos García-Rosell, University of Lapland, Finland
Mikko Äijälä, University of Lapland, Finland

Too Big To Care: Uncovering the Ugly Truth of Brand Relationships in the Video Game Industry
Jacob Lee Hiler, Ohio University, USA
Elana Harnish, Ohio University, USA

Pac-Man & the Pack Mentality: Nostalgia & Socialization Factors in Gaming Choice
Avery Kerns, Ohio University, USA
Jacob Lee Hiler, Ohio University, USA

Impact of Religious Differences on Marketplace Configurations
Ameya Mittal, Indian Institute of Technology Bombay, India
Akshaya Vijayalakshmi, Indian Institute of Management Ahmedabad, India
Nitisha Tomar, University of Wisconsin - Madison, USA
Ankur Kapoor, Indian Institute of Management Udaipur, India

Sustainup
Dr. Iris Mohr, St. John's University, USA

Dignity as a Gift: an Immersion in the Gastronomic Experience at Refettorio Paris
Ophelie Elise Mugel, Ferrandi Paris, France

Winter Texans' Motivations to Temporarily Relocate: Exploring Costs of Living
Ross Murray, The University of Texas Rio Grande Valley, USA
Suwakitti Amornpan, The University of Texas Rio Grande Valley, USA
Michael Minor, The University of Texas Rio Grande Valley, USA

Lost in an Emodity: Self-Reflexive Ethnographer Portraits

Joonas Rokka, Emlyon Business School, France
Maira Lopes, Emlyon Business School, France
Vincent Dewaguet, Emlyon Business School, France
Anissa Pomies, Emlyon Business School, France
Lydia Ottlewski, University of St. Gallen, Switzerland

Come Come !

Thomas Stenger, University of Poitiers, France
Olivier Coussi, University of Poitiers, France

Knowledge Forums

Where Consumer Behavior Meets Language: Applying Linguistic Methods to Consumer Research

Chairs:
Ann Kronrod, University of Massachusetts Lowell, USA
Grant Packard, York University, Canada
Sarah G Moore, University of Alberta, Canada
Jonah Berger, University of Pennsylvania, USA

Participants:
Jeffrey Inman, University of Pittsburgh, USA
Robert Meyer, University of Pennsylvania, USA
L. J. Shrum, HEC Paris, France
Ashlee Humphreys, Northwestern University - Medill, USA
Nicholas Lurie, University of Connecticut, USA
Andrea Webb Luangrath, University of Iowa, USA
Jeff Lee, American University, USA
Matthew D Rocklage, University of Massachusetts, USA
Charles Zhang, University of California Riverside, USA
Ruth Pogacar, University of Calgary, Canada
Ivan Gordeliy, Georgetown University, USA
Shiri Melumad, University of Pennsylvania, USA
Amir Grinstein, Northeastern University, USA
Francisco Villarroal Ordenes, University of Massachusetts, USA
Guang-Xin Xie, University of Massachusetts Boston, USA
Zoey Chen, University of Miami, USA

What can we discover by applying linguistic methods to consumer research? This Knowledge Forum introduces and discusses the multifaceted opportunities of applying linguistic research methods to explore language in the marketplace and employs a hands-on workshop approach to sprout novel research ideas that use multiple methods of linguistic inquiry.

Forum

Forum on the Research and Interpersonal Culture of ACR

Chairs:
Tiffany White, University of Illinois at Urbana-Champaign, USA

Presenters:
Joel Huber, Duke University, USA
Darren Dahl, University of British Columbia, Canada
Anirban Mukhopadhyay, Hong Kong University of Science and Technology, China
Laura Peracchio, University of Wisconsin - Milwaukee, USA
Sharon Shavitt, University of Illinois at Urbana-Champaign, USA

The goal of the forum is to explore the factors that have made ACR culturally successful but ultimately vulnerable. Tiffany White will moderate six scholars and an active audience to discuss ACR's unique research culture and the impact on that culture of publication norms successful collaborations global heterogeneity and the demands from university promotion systems.

Forum
Back to the Future: A Virtual Roundtable of Senior Academics
Sharing Insights from Consumer Research on Technology

Chairs:
Gizem Yalcin, Erasmus University Rotterdam, The Netherlands
William Fritz, Oxford University, UK

Discussants:
Ana Valenzuela, Baruch College, USA
Andrew T. Stephen, Oxford University, UK
Bernd Schmitt, Columbia University, USA
Christian Hildebrand, University of Geneva, Switzerland
Donna L. Hoffman, George Washington University, USA
Klaus Wertenbroch, INSEAD, Singapore
Markus Giesler, York University, Canada
Rebecca Walker Reczek, Ohio State University, USA
Rhonda Hadi, Oxford University, UK
Robert Meyer, University of Pennsylvania, USA
Russell W. Belk, York University, Canada
Stefano Puntoni, Erasmus University Rotterdam, The Netherlands
Szu-chi Huang, Stanford University, USA
Thomas Novak, George Washington University, USA

This roundtable brings together a diverse group of senior academics to offer guidance to early-career researchers who are interested in studying technology in consumer research. Discussants will talk about theoretical methodological empirical and substantive (e.g. publication process career management) challenges in this research area.

Forum
Political "Consumption": Motivations, Decision-Making and Implications

Chairs:
Anastasiya Pocheptsova Ghosh, University of Arizona, USA
Jennifer Savary, University of Arizona, USA

Discussants:
Adam Duhachek, University of Illinois at Chicago, USA
Cait Lamberton, University of Pennsylvania, USA
Clayton R Critcher, University of California Berkeley, USA
David Crockett, University of South Carolina, USA
Erick M. Mas, Vanderbilt University, USA
Gita Johar, Columbia University, USA
Melanie Wallendorf, University of Arizona, USA
Monika Lisjak, Arizona State University, USA
Nailya Ordabayeva, Boston College, USA
Neeru Paharia, Georgetown University, USA
Nooshin Warren, University of Arizona, USA
Ronald Paul Hill, American University, USA
Sharon Shavitt, University of Illinois at Urbana-Champaign, USA
Uzma Khan, University of Miami, USA

Consumer engagement in politics can be direct (e.g. political donations campaign merchandise purchases) or indirect (e.g. politicized consumption policy advocacy). This forum brings together thought leaders from CP CCT and Strategy to identify these behaviors integrate extant knowledge and envision a path forward for this promising but underexplored research domain.

Forum
Creating Boundary-Breaking, Marketing-Relevant Consumer Research

Chair:
Simona Botti, London Business School, UK

Participants:
Fleura Bardhi, City University of London, UK
Eileen Fischer, York University, Canada
Donna L. Hoffman, George Washington University, USA
Robert Kozinets, University of Southern California, USA
Donald Lehmann, Columbia University, USA
John Lynch, University of Colorado, USA
Deborah MacInnis, University of Southern California, USA
Christine Moorman, Duke University, USA
Page Moreau, University of Wisconsin - Madison, USA
Vicki G. Morwitz, Columbia University, USA
Connie Pechmann, University of California Irvine, USA
Oded Netzer, Columbia University, USA

Consumer research often fails to have broad impact. We propose a framework that identifies potential reasons (implicit boundaries) and solutions (boundary-breaking opportunities); we illustrate this framework with an example; we discuss additional reasons solutions and examples in small groups moderated by the organizers; we summarize these discussions in plenary.

Forum
Consumer Health and Medical Decision Making: 2020 and Beyond

Chairs:
Dipankar Chakravarti, Virginia Tech, USA
Haiyang Yang, Johns Hopkins University, USA
Meng Zhu, Johns Hopkins University, USA

Presenters:
Angela Y. Lee, Northwestern University, USA
Anirban Mukhopadhyay, Hong Kong University of Science and Technology, China
Brent McFerran, Simon Fraser University, Canada
Carey K. Morewedge, Boston University, USA
Dawn Iacobucci, Vanderbilt University, USA
Jeff Inman, University of Pittsburgh, USA
Leonard Lee, National University of Singapore, Singapore
Peggy Liu, University of Pittsburgh, USA
Pierre Chandon, INSEAD, France
Priya Raghubir, New York University, USA
Punam Keller, Dartmouth College, USA
Ronald Paul Hill, American University, USA
Stacy Wood, North Carolina State University, USA
Vikas Mittal, Rice University, USA

The global health landscape has been changing rapidly. This has created the need for a new integrated perspective on consumer-relevant health topics through the lens of psychology marketing and economics. This roundtable will discuss emerging topics methodological approaches and future directions on consumer health and medical decision-making.

FORUM
Shedding Light on the Invisibles: Extending Consumer Theories, Methods, and Insights to Include Financially Vulnerable Consumers

Chairs:
Gergana Y. Nenkov, Boston College, USA
Linda Court Salisbury, Boston College, USA

Participants:
Simon Blanchard, Georgetown University, USA
Fred Feinberg, University of Michigan, USA
Ronald Paul Hill, American University, USA
Nina Mazar, Boston University, USA
Martin Mende, Florida State University, USA
Nailya Ordabayeva, Boston College, USA
Julie L. Ozanne, University of Melbourne, Australia
Maura Scott, Florida State University, USA
Abigail Sussman, University of Chicago, USA
Remi Trudel, Boston University, USA
Nancy Wong, University of Wisconsin - Madison, USA
Min Zhao, Boston College, USA

This interactive knowledge forum focuses on financially vulnerable consumer segments frequently excluded from financial decision-making research (e.g. low-income consumers unbanked or underbanked credit invisibles). Participants will discuss how consumer researchers can enhance theories models and participant samples to be more inclusive of financially vulnerable consumers and improve their financial well-being.

FORUM
Bringing Consumer Culture Theoretics to Policy Debate

Chairs:
Eric Arnould, Aalto University, Finland
Søren Tollestrup Askegaard, University of Southern Denmark, Denmark
Guliz Ger, Bilkent University, Turkey

This roundtable aims at providing a platform for discussing strategies for knowledge dissemination pertaining to consumer research in particular consumer culture theoretics and transformative consumer research for better policy-making concerning governance of consumption-related issues in relation to social and environmental sustainability.

FORUM
M-Turk is dying. Don't die with it. An interactive workshop on collecting data from more difficult and interesting sources.

Chair:
Broderick Lee Turner, Virginia Tech, USA

Should we all stop collecting data on Amazon's Mechanical Turk? It is rife with problems including non-naivety bot-panics fraudulent responses and bored workers. This knowledge forum provides some fun exercises to help researchers old and new wean themselves from their M-Turk habit and consider some alternatives data collection methods.

<div align="center">

FORUM
Shining a Light on Maladaptive Consumption: The Journey so Far and the Roads Less Traveled

Chairs:
Meryl P. Gardner, University of Delaware, USA
Caroline Roux, Concordia University, Canada
Shailendra Pratap Jain, University of Washington, USA

Participants:
Paul M Connell, Stony Brook University, USA
Brennan Davis, California Polytechnic State University, USA
Benét DeBerry-Spence, University of Illinois at Chicago, USA
Pamela Scholder Ellen, Georgia State University, USA
Paula Fitzgerald, West Virginia University, USA
Marcia Flicker, Fordham University, USA
Michael Kamins, Claremont Graduate University, USA
Peggy Liu, University of Pittsburgh, USA
Ingrid Martin, California State University Long Beach, USA
Marlys Mason, Oklahoma State University, USA
Hieu Nguyen, California State University Long Beach, USA
Carly Pacanowski, University of Delaware, USA
Janis Pappalardo, USA Federal Trade Commission, USA
Martin Reimann, University of Arizona, USA
Ainslie Schultz, Providence College, USA
Christine Skubisz, University of Delaware, USA
Jerome Williams, Rutgers University, USA

</div>

This interactive session will bring together researchers representing various paradigms methods and approaches to studying maladaptive consumption and ACR attendees interested in investigating the topic. We will assess the main questions studied in the literature in order to identify issues that have received less attention and develop cross-paradigmatic collaborations.

<div align="center">

FORUM
Field Experiments: A Practical Tutorial

Chairs:
Rajesh Chandy, London Business School, UK
Stephen Anderson, Stanford University, USA
Praveen Kumar Kopalle, Dartmouth College, USA

</div>

This tutorial will address practical aspects of planning and executing field experiments. We will use examples of successful and failed research projects to illustrate a toolkit for field experiments. We will then engage in a facilitated discussion of ways to apply the toolkit to participants' research questions.

Author Index

ASSOCIATION FOR CONSUMER RESEARCH